Marrickville Road East

Streetscape Manual Master Plan



Document Control

Date	Revision Number	Revision Details	Issued	Approved
23.03.2017	01	Draft issue 01 - For Discussion	AR	DP
29.05.2017	02	Draft issue 02 - For Discussion	DP	DP
04.07.2017	03	Draft issue 03 - For Approval	DP	DP
22.09.2017	04	Draft Issue 04 - For Approval	DP	JB
23.04.2018	05	Final make up and changes - For Approval	AR/DP	JB
10.08.2018	06	Draft - For Council	DP	JB

Executive Summary

The Public Domain Planning team has engaged with the community, across Council, with business, and State Government agencies to develop an integrated public domain improvement plan for Marrickville Road (East). The Marrickville Road (East) Public Domain Master Plan supports existing uses, while planning for future development and increased pedestrian and bicycle activity movements from the Marrickville Town Centre to the Sydenham Station area.

The former Marrickville Council had adopted the updated Our Place, Our Vision – Marrickville Community Strategic Plan (CSP) with a vision that articulated the desired character of public spaces as:

"In 2023, Marrickville has innovative urban planning that protects the character and heritage of the area. Public spaces are enticing, clean and well maintained, lively and accessible, with a street life that connects the community and welcomes visitors. Industrial areas remain an important part of the local community, while high technology, creative and eco-enterprises thrive."

The master plan fulfils this vision along Marrickville Road (East) and the vision was further supported through extensive community and business engagement with requests for the following elements:

- > Provision of traffic calming measures along the street, to provide a safe street environment for users;
- > Planting of additional shade trees and general greening of the street;
- > Provision of pedestrian and bicycle infrastructure including seating, bicycle lanes and bike racks:
- > Provision of additional and safer pedestrian crossings;
- > Upgrading and improvement to pedestrian pavements; and
- > Provision of better pedestrian lighting along the street.

Through community and stakeholder engagement and detailed site analysis, Council has prepared a public domain master plan with multifunction outcomes that benefits both the community and Council. The master plan proposes improving safety, permeability, pedestrian amenity and shade through the following initiatives:

- > Install new furniture elements including pedestrian seats, drink fountains, rubbish bins and bicycle racks
- > Provide pedestrian priority threshold treatments to pedestrian crossings at road intersections:
- > Provide an additional north-south pedestrian crossing point along Marrickville Road (East)
- > Provide kerb blister enlargements at street intersections with rain-gardens in the planting areas. The kerb alignment has been designed to facilitate turning circles for 19m rigid vehicles and any new planting to be low to maintain required sightlines at intersections
- > New pedestrian pavements of concrete with two different textures (broom finished and shot-blast, sandblast or saw cut finishes)
- > Provide a separated bicycle lane along Marrickville Road, connecting with the regional routes to the west (Meeks Road), north (along Sydney Street and Railway Avenue);
- > Retain key existing tree specimens
- > Replace low quality trees with new advanced trees appropriate for their location (i.e. lower spreading tree canopies below overhead electrical infrastructure; and tall and large canopies where space allows)
- > All tree plantings to have expanded tree pits or structural soil zones to maximise growing medium for trees
- > New pedestrian lighting along the street
- > Retain existing car parking configuration and business driveway accesses

The plans have included testing vehicle movements on each of the intersections to allow for existing vehicle movements. The intersections have also be tested for potential future changes in flow and direction of traffic, as this has been identified by external and internal stakeholders as potential outcomes of future traffic studies. The proposed plans can allow for these changes without impacting the master plan design.

In May and June 2018, Council completed a public exhibition process for the draft Marrickville Road (east) Public Domain Master Plan. The online documents received 596 visits and 57 submissions. From the 57 submission Council received 94% support for the plans. The community feedback provide minor updates

The design of the public domain has carefully considered the ability for Council to implement the plans with its available funds and budget. The master plan highlights a series of projects that can be delivered in stages. Where funding shortfalls exist, the document will be used for grant applications to secure alternative funding sources.

Following the completion of the master plan, the project shifts to implementation phases for the master plans strategies to be realised. The master plan is a 10 year plan for the streetscape and will be delivered in stages.



Contents

Sec	etion	Page 04	
)1	Project Context		
)2	Site Analysis	14	
)3	Community Engagement	66	
)4	Design Principles	70	
)5	Proposed Design Options	74	
)6	Master Plan	80	
)7	Implementation Plan	98	
	Appendix	106	

01_project context section





Project Context O

01_ Project Context

Overview

The Public Domain Planning team has been engaging with the community, across Council, with businesses and State agencies to develop an integrated public domain improvement plan for Marrickville Road East. The Marrickville Road East Master Plan has been occurring concurrently with the Sydenham Station Creative Hub planning project. The brief for the Marrickville Road East Master Plan has been to support existing provides us with a focus; enabling us to uses, while planning for future development and increased pedestrian and bicycle activity, particularly from the Marrickville Town Centre to the Sydenham Station area.

In 2013, the former Marrickville Council adopted the updated Our Place, Our Vision -Marrickville Community Strategic Plan that has guided planning within the Marrickville local government area (LGA). The vision articulates the desired character of public

"In 2023, Marrickville has innovative urban planning that protects the character and heritage of the area. Public spaces are enticing, clean and well maintained, lively and accessible, with a street life that connects the community and welcomes visitors. Industrial areas remain an important part of the local community, while high technology, creative and eco-enterprises thrive."

Master plan strategies in this report will enhance and support the existing uses in the study area as well as potential future uses complementing the strategic vision for the

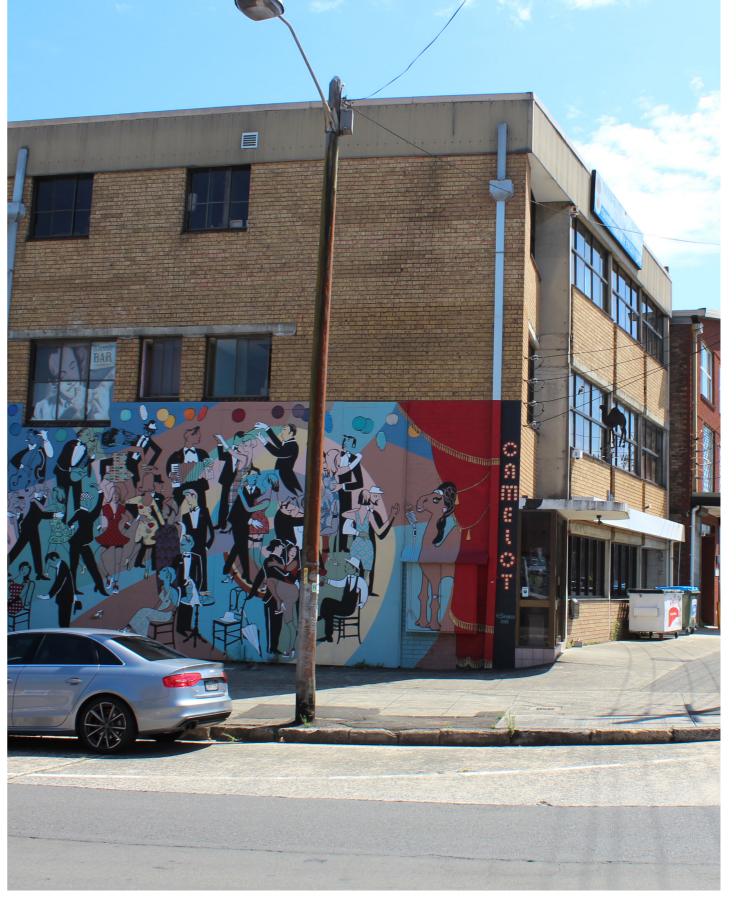
The pedestrian and cycle connection between the Marrickville town centre and Sydenham Station is a critical element for the scope of this project. The high level of pedestrian and bicycle traffic that use the footpath environment shall be acknowledged and enhanced without detracting from the existing industrial uses. Master plan strategies will improve the safety of users and maintain vehicles movements required for industrial activity.

Strategic Alignment

Council's streets service multiple community needs as demonstrate by the extensive list of relevant outcomes in the *Our Inner West* 2036: A community Strategic Plan for the Inner West Community (CSP).

The ongoing management of the streets are consistent with the CSP, promoting a shared vision of the community and Council. It also allocate the required resources to translate our vision into action.

The following pages outline how this report and its proposals will integrate with and support, our community's strategic outcomes.



An existing business and street art at the intersection of Marrickville Road East and Railway Parade.

Community Strategic Plan

OUR INNER WEST 2036

(A community Strategic Plan for the Inner West Community

ALIGNMENT OF THE MARRICKVILLE ROAD (EAST)
STREETSCAPE IMPROVEMENT MASTER PLAN WITH THE
COMMUNITY STRATEGIC PLAN AND DELIVERY PROGRAM

KEY RESULT AREAS

These are the big picture results which the community would like Council and its many partners to focus on achieving

OUTCOME STATEMENT

These are detailed outcomes under each KRA. They are more specific than the KRAs, but still focus on the end result rather than how to get there

KEY RESULT AREAS

STRATEGIC DIRECTION 1 - An ecologically sustainable Inner West

STRATEGIC DIRECTION 2 - Unique, liveable, networked neighbourhoods

STRATEGIC DIRECTION - Creative communities and a strong economy

STRATEGIC DIRECTION - Caring, happy, healthy communities

OUTCOMES

- **1.1** The people and infrastructure of Inner West contribute positively to the environment and tackling climate change
- **1.2** Inner West has a diverse and increasing urban forest that supports connected habitats for flora and fauna
- **1.3** The community is water sensitive, with clean, swimmable waterways
- **1.4** Inner West is a zero emissions community that generates and owns clean energy
- **2.1** Development is designed for sustainability and makes life better
- **2.2** The unique character and heritage of neighbourhoods is retained and enhanced
- **2.3** Public spaces are high-quality, welcoming and enjoyable places, seamlessly connected with their surroundings
- **2.5** Public transport is reliable, accessible, connected and enjoyable
- 3.1 Creativity and culture are valued and celebrated
- 3.3 The local economy is thriving
- 3.4 Employment is diverse and accessible
- **3.5** Urban hubs and main streets are distinct and enjoyable places to shop, eat, socialise and be entertained
- **4.1** Everyone feels welcome and connected to the community
- **4.3** The community is healthy and people have a sense of wellbeing
- **4.4** People have access to the services and facilities they need at all stages of life
- **4.5** Council is financially viable and provides value for money in the delivery of its services.
- **5.1** People are well informed and actively engaged in local decision making and problem solving
- **5.2** Partnerships and collaboration are valued and recognised as vital for community leadership and making positive changes
- **5.3** Government makes responsible decisions to manage finite resources in the best interest of current and future communities

OUR INNER WEST 2036

(A community Strategic Plan for the Inner West Communit

ALIGNMENT OF THE MARRICKVILLE ROAD (EAST)
STREETSCAPE IMPROVEMENT MASTER PLAN WITH THE
COMMUNITY STRATEGIC PLAN AND DELIVERY PROGRAM

DELIVERY PROGRAM OBJECTIVES

These guide the specific actions related to this plan and define how to achieve outcomes

STRATEGY OBJECTIVES

- **1.1.2** Reduce urban heat and manage its impact
- **1.1.5** Provide green infrastructure that supports increased ecosystem services
- **1.2.2** Maintain and increase Inner West's tree canopy and urban forest, and enhance biodiversity corridors
- **1.3.1** Collaborate to deliver water-sensitive plans, decisions and infrastructure
- **1.4.2** Develop a transport network that runs on clean renewable energy
- **1.5.2** Provide local reuse and recycling infrastructure
- **2.1.1** Pursue integrated planning and urban design across public and private spaces to suit community and local environment needs
- **2.1.2** Identify and pursue innovative and creative solutions to complex urban planning and transport issues
- **2.1.3** Improve the quality, and investigate better access and use of existing community assets
- **2.2.2** Manage change with respect for place, community history and heritage
- **2.3.1** Plan and deliver public spaces that fulfil and support diverse community needs and life
- **2.5.2** Advocate for, and provide, transport infrastructure that aligns to population growth
- **2.6.1** Deliver integrated networks and infrastructure for transport and active travel
- **2.6.2** Pursue innovation in planning and providing new transport options
- **2.6.3** Ensure transport infrastructure is safe, connected and well maintained
- **3.1.1** Grow Inner West's reputation as a leading creative and cultural hub, celebrating and supporting diverse creative industries and the arts
- **3.1.2** Create opportunities for all members of the community to participate in arts and cultural activities
- **3.2.1** Position Inner West as a place of excellence for creative industries and services and support them to thrive
- **3.3.3** Promote Inner West as a great place to live, work, visit and invest in
- **3.4.1** Support local job creation by protecting industrial and employment lands
- **3.5.1** Promote unique, lively, safe and accessible urban hubs and main streets day and night
- **3.5.2** Enliven community life by delivering and supporting events, public art, cultural celebrations and entertainment
- **3.5.3** Pursue a high standard of planning, urban design and development that supports urban centres
- **4.1.1** Foster inclusive communities where everyone can participate in community life

Project Context

01_ Project Context

Community Strategic Plan

OUR INNER WEST 2036

A community Strategic Plan for the Inner West Community

DELIVERY PROGRAM OBJECTIVES

These guide the specific actions related to this plan and define how to achieve outcomes

STRATEGY OBJECTIVES

4.1.3 Empower and support vulnerable and disadvantaged community members to participate in community life

ALIGNMENT OF THE MARRICKVILLE ROAD (EAST)

STREETSCAPE IMPROVEMENT MASTER PLAN WITH THE

COMMUNITY STRATEGIC PLAN AND DELIVERY PROGRAM

4.1.4 Increase and promote awareness of the community's history and heritage

4.3.1 Provide the facilities, spaces and programs that support wellbeing and active and healthy communities

4.3.2 Provide opportunities for people to participate in recreational activities they enjoy

4.4.1 Plan and provide services and infrastructure for a changing and ageing population

5.1.1 Support local democracy through transparent communication and inclusive participatory community engagement

5.2.1 Support local capacity for advocacy

5.2.3 Collaborate with partners to deliver positive outcomes for the community, economy and environment

5.3.1 Undertake visionary, integrated, long term planning and decision making, reflective of community needs and aspirations

5.3.2 Ensure responsible, sustainable, ethical and open local government

5.3.3 Deliver innovation, excellence, efficiency, effectiveness and probity in Council processes and services

OUR INNER WEST 2036

A community Strategic Plan for the Inner West Community

ALIGNMENT OF THE MARRICKVILLE ROAD (EAST)
STREETSCAPE IMPROVEMENT MASTER PLAN WITH THE
COMMUNITY STRATEGIC PLAN AND DELIVERY PROGRAM

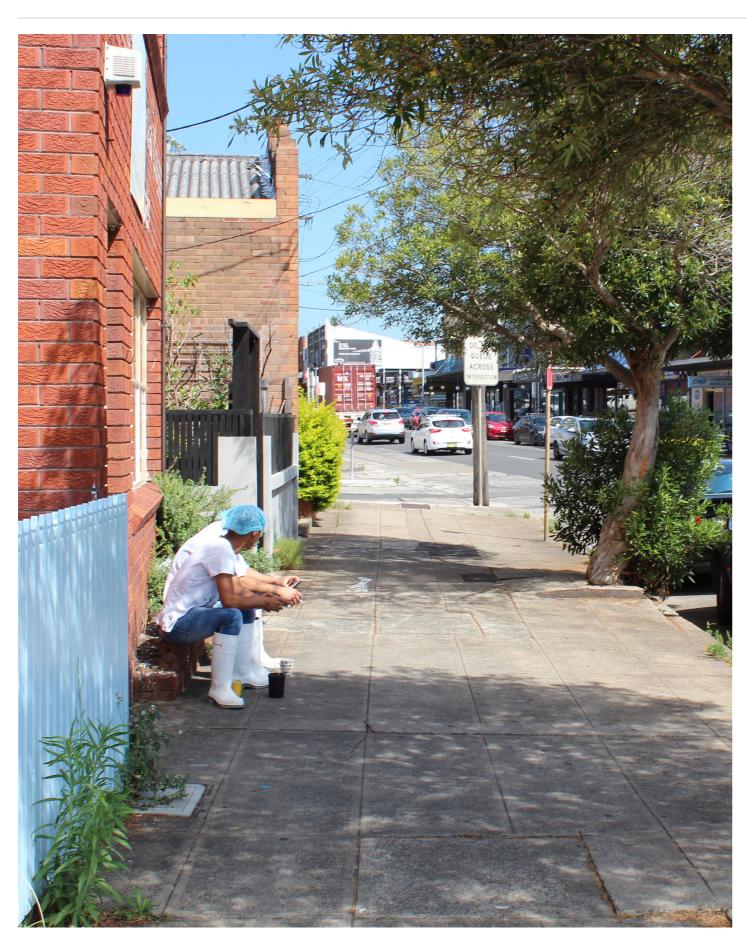
ACTIONS

The detailed set of actions which Council will undertake to help achieve the community vision are not contained in the Community Strategic Plan, but are specified in its Delivery Programs and Operational Plan

ACTIONS

- 1. Complete community engagement to determine how Marrickville Road East is used, how the community want it used and how the community would like the street to look in the future.
- 2. Undertake existing site appraisal and analysis of the street and its connections.
- 3. Develop design principles for the design of the street.
- 4. Outline design strategies that articulate proposed street upgrades.
- 5. Provide an opinion of probable costs for the proposed street upgrades.
- 6. Provide a list of prioritised upgrades with financial implications integrated into the Long Term Financial Plan and Asset Management Plan. Ensure the priorities are aligned with feedback as described during the engagement sessions.

08



Project methodology

The project methodology was undertaken in eight phases, with some occurring concurrently to meet project deadlines. The methodology produced a process that ensured best practice outcomes provide for user needs.

The eight phases include:

Phase 01: The project brief was written including project program, methodology, develop project objectives, project aims, and identify engagement strategy and stakeholders.

Phase 02: Undertake community engagement to understand what the community like and dislike about the streets and understand how it is being used. Investigate what the community would like to see changed or upgraded.

Phase 03: Undertake extensive site analysis to establish opportunities and constraints. Elements to be considered include: access, safety, legislative requirements including Council policies, existing trees and vegetation, site history, bicycle proposals, vehicle access, maintenance, flooding, drainage issues, topography, geology, biodiversity and microclimate.

Phase 04: Develop draft plans including design options with streetscape strategies. Precedent imagery and detailed text are to support illustrative plans.

Phase 05: Feedback from internal stakeholders was provided to update documents and ensure all disciplines are included.

Phase 06: An opinion of probable costs with proposed upgrades groups as potential deliverable projects developed. Coordinate with the finance team to integrate project costs with the long term financial plan, asset management plan and forward capital works plans.

Phase 07: Use the documents for community comment through an exhibition period. Use the feedback obtained to update the documents to ensure the plans meet community expectations.

Phase 08: Finalise documents and report the proposals for Council adoption.

How to use this document

This report is proposed to be a holistic reference guide for the proposed streetscape improvements along Marrickville Road East. The document is divided to different sections for ease of reference.

01 Project Context

The project context provides an introduction and background to the project including definitions, framework, strategic alignment, project methodology and objectives.

02 Site Analysis

The physical characteristics of the street are described in plans, words and images. The site is fully analysed capturing Council strategies, underground services and classifications of streets, ownership and other items that influence the designed outcomes.

03 Community Engagement

This section outlines the process undertaken to derive at project outcomes and the feedback received from the community.

04 Design Principles

The design principles establish the lens through which decisions are made for street upgrades. The principles provide a spatial representation of the objectives.

05 Proposed Design Options

The design process - including all considered but discarded design options - feature in this section.

06 Master Plan

This section of the report outlines the overall design outcomes, with strategies write in text supported with images and illustrative plans.

07 Implementation Plan

The proposed upgrades are costed via an opinion of probable costs. The costs are grouped as potential projects and are prioritised according to asset condition, cost benefit, related strategy priorities and need as requested through community feedback.

Appendix

This section analyses potential circulation changes and establishes that the proposed design has taken this possibility under consideration.

01_ Project context

Location

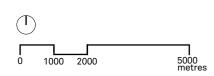
The Inner West Council area is located five kilometres west of the Sydney Central Business District (CBD) and includes the former Marrickville, Ashfield and Leichhardt Local Government Areas (LGA). The Inner West Council has a resident population of 185,000 people and extends from near Sydney Airport and the Cooks River in the south, east to Erskineville and Redfern, north to Sydney Harbour and adjoins Five Dock, Burwood and Campsie in the west.

Legend

10

Marrickville Road East Area

Inner West LGA Boundary





Plan of the Inner West Council Local Government Area (LGA) within the context of greater Sydney.

01_ Project Context - Inner West Context

Location

The study area is located at the south-west corner of the LGA, beneath the main north-south Sydney airport runway (34L / 16 R) in the suburb of Marrickville. Nearby areas include Tempe to the south, Sydenham to the east, Marrickville industrial employment lands to the north and the Marrickville town centre to the

Legend



Inner West LGA Boundary



Marrickville Road East Area



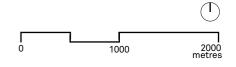
Residential Area



Industrial Area



Parkland



The location of the Marrickville Road East study area within the context of the greater Inner West Council Local Government Area (LGA).

01_ Project Context - Marrickville Context

Location

- The site is comprised of three roads: > Marrickville Road between Meeks Road and Railway Parade;
- > Railway Parade; and
 > Gleeson Avenue (stopping outside the train

The roads form part of the key urban road network, having connections with Princes Highway, Marrickville Road (beyond Meeks Road), Victoria Road and Sydenham Road.

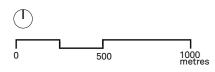
The site is adjacent the South, Illawarra and Bankstown railway lines and Sydenham railway station.

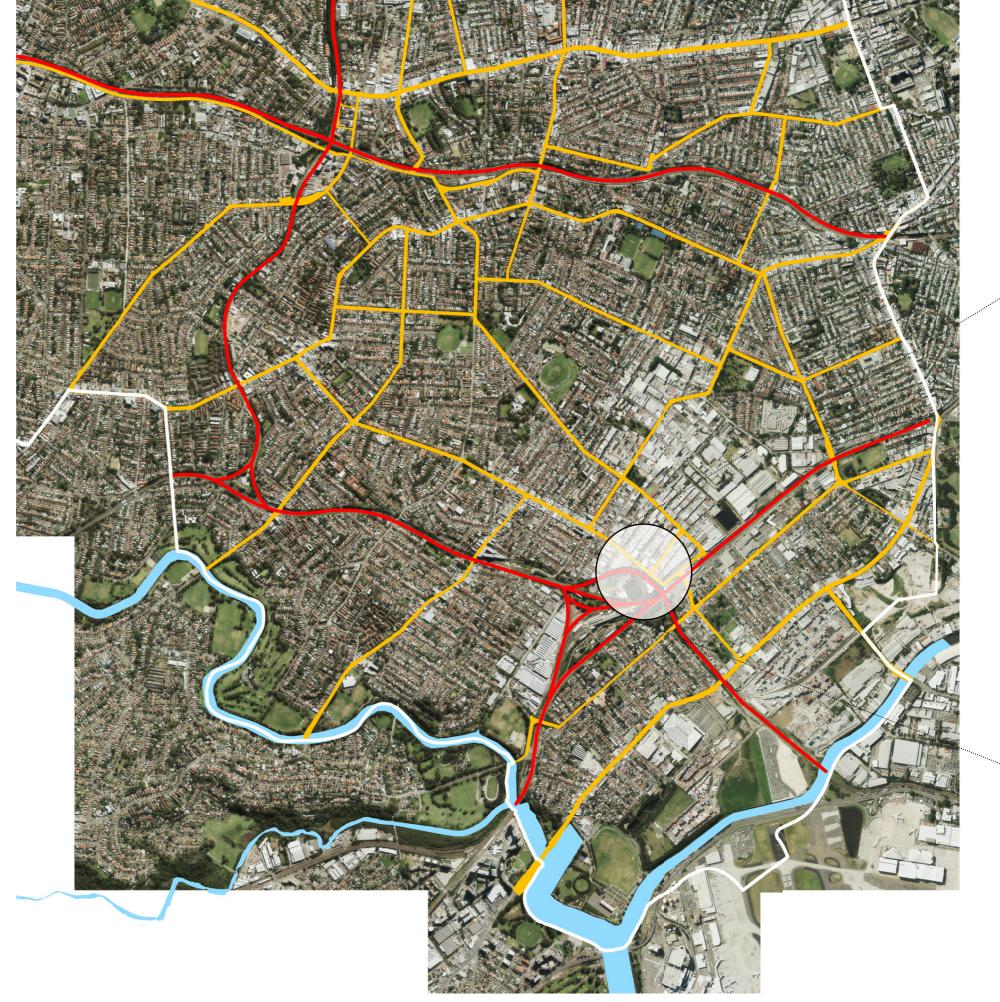
Legend

Marrickville Road East Area Train Line Major Roads Cooks River









The location of the study area within the suburb of Marrickville.

Marrickville Road East Streetscape Improvements

01_ Project Context - Marrickville Road East

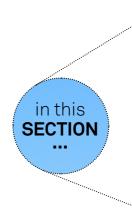
Scope of Work

The study includes a review of public domain areas located along Marrickville Road East, Railway Parade and Gleeson Avenue. The study includes the review of pedestrian pavements, street trees, shade, street furniture (seating, bins, drink fountains), shade, traffic movements, bicycle connections and other elements that provide a safe place for pedestrian and cyclists.

The review of the street will include connections from Marrickville Road along Buckley Street, Barclay Street and Sydney Street. The study will review the sites edge conditions and the pedestrian and bicycle connection with Sydenham railway station and Marrickville town centre. The gateway entry area to Fraser Park will be considered to improve pedestrian safety and access to the park.



02_site analysis





Site Analysis

Zoning

The former Marrickville Local Environment Plan (LEP) 2011 outlines the permissible land uses across the LGA. The plan outlines the land use context in which the site is located.

Legend

Marrickville Road East Area

Zone

B1 Neighbourhood Centre

B2 Local Centre

B4 Mixed Use

B5 Business Development

B6 Enterprise Corridor

B7 Business Park

IN1 General Industrial

IN2 Light Industrial

R1 General Residential

R2 Low Density Residential

R3 Medium Density Residential
R4 High Density Residential

RE1 Public Recreation

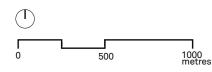
RE2 Private Recreation

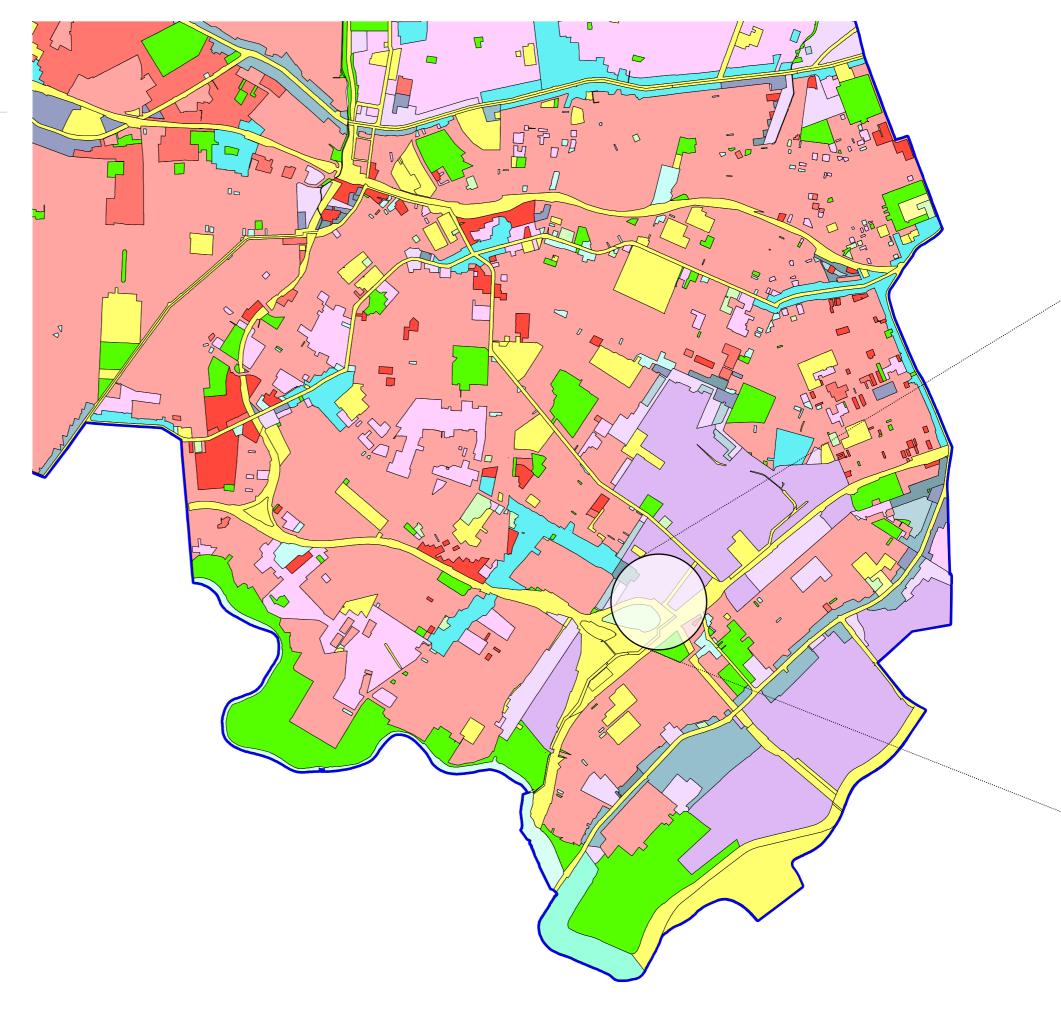
SP1 Special Activities

SP2 Infrastructure

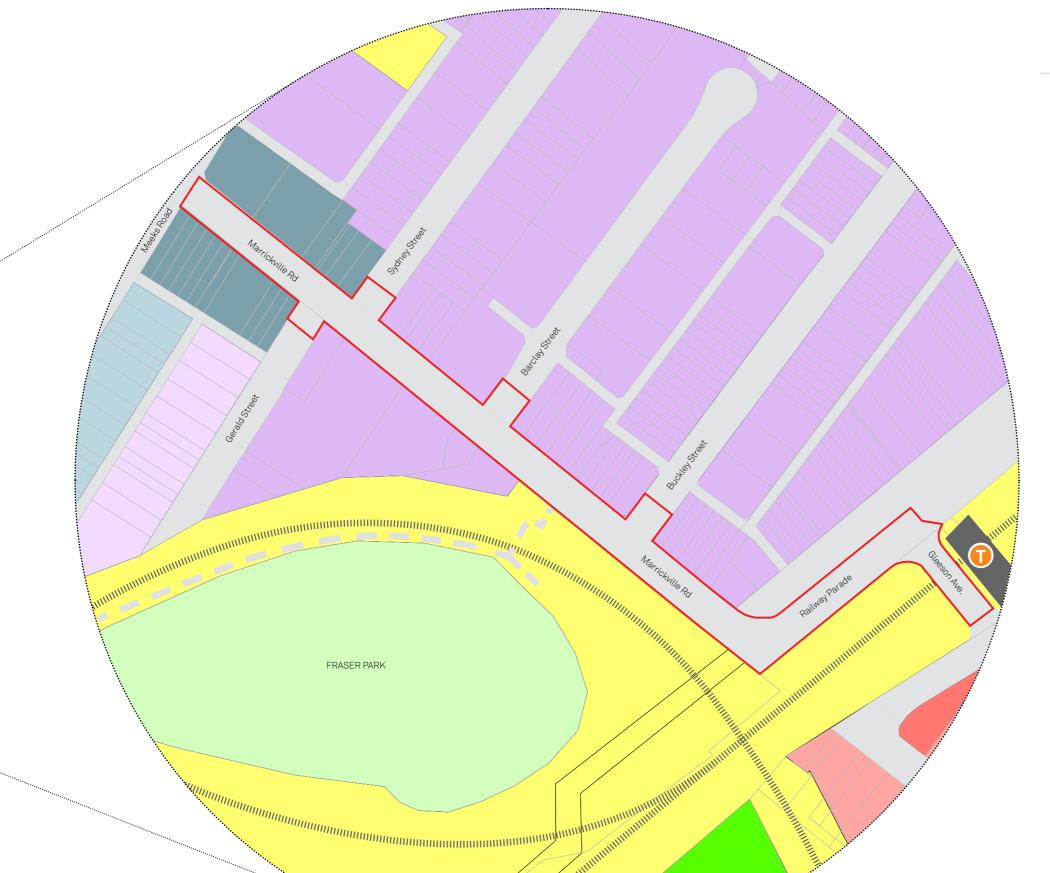
W1 Natural Waterways

W2 Recreational Waterways





The study site with the existing zoning within the context of the Marrickville region.



Zoning

The site in accordance with the existing former Marrickville LEP 2011 outlines the area north of the site is zone IN1 General Industrial and IN2 Light Industrial. The western end of the site along Marrickville Road is B5 business Development and the area near the railway line and Sydenham train station is SP2 Infrastructure.

Legend



Marrickville Road East



Project Scope



Sydenham Station



Train Line

Existing Service Road into Fraser Park

Business Development

Enterprise Corridor

B5 B6

General Industrial Light Industrial

Low Density Residential

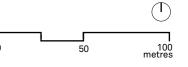
R2 R3 RE1

Medium Density Residential Public Recreation

Private Recreation

Infrastructure

17

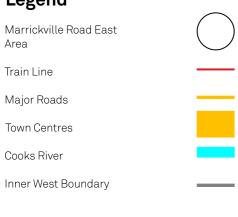


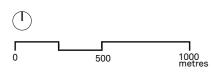
TILLMAN PARK

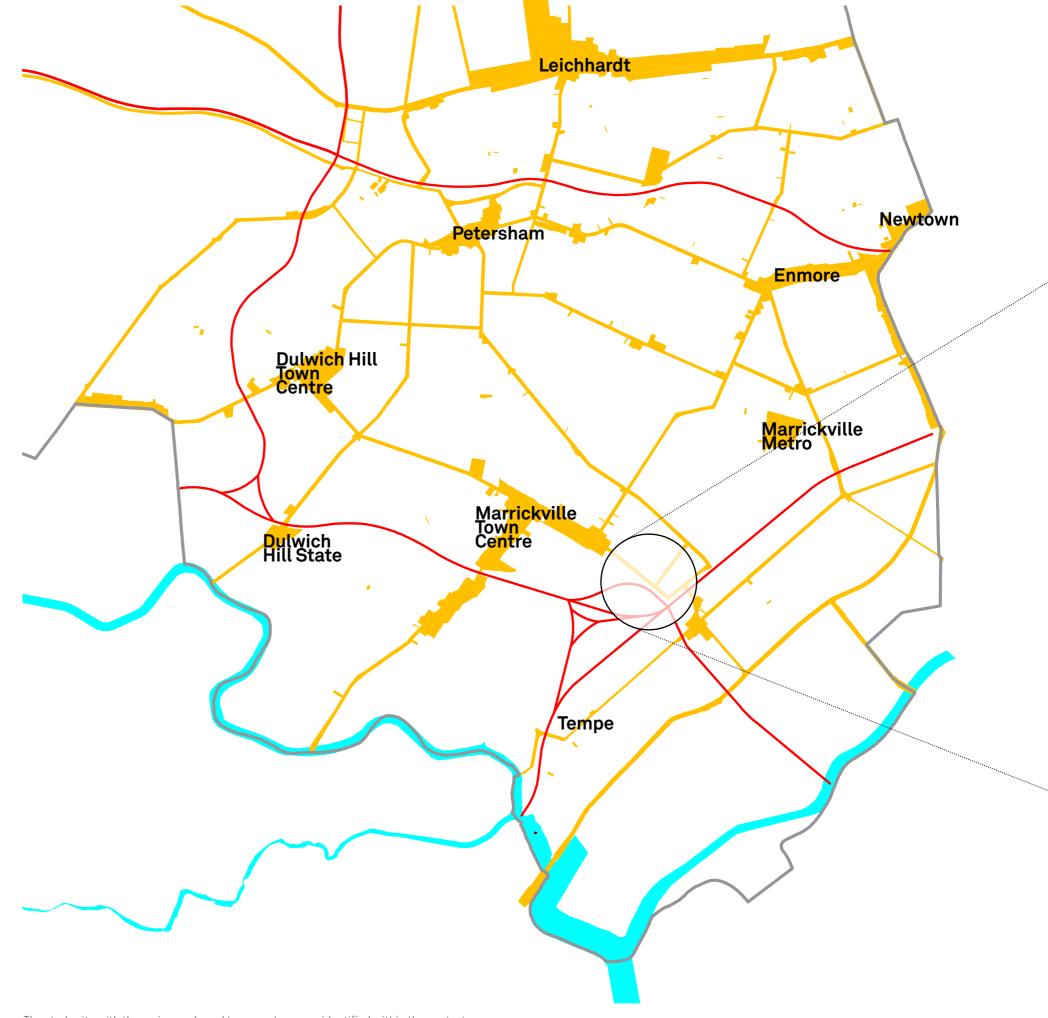
Major Roads & Town Centres

The main roads and regional town centres have been mapped for context within the broader Inner West of Sydney.

Legend







The study site with the major roads and town centre areas identified within the context of the Marrickville region.

FRASER PARK FRASER PARK

02_ Site Analysis - Marrickville Road East

Half Meter Contours

The contours reveal that the biggest slope within the study area is located along Railway Parade, from the station down towards Marrickville Road East.

Legend



Marrickville Road East Area

Project Scope



Sydenham Station

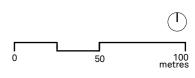


11111111111

0.5 Meter Contours

Train Line





TILLMAN PARK

Site Analysis

Biodiversity

The map highlights Marrickville Road East within the broader Marrickville open space and priority biodiversity area context. The area has a well distributed network of parks which can be broadly classified in two:

1_Urban

2_ River Parklands

The closest parks to the study area are Fraser Park, Tillman Park, Sydenham Green and Wicks Park. Except for Wicks Park, which is north-west of the site, the others are located to the south and south-east.

Legend

Train Line

Marrickville Road East Area

Major Roads

Parks

Biodiversity Priority Areas: Locally Indigenous / Sydney Basin Planting

Cooks River

Inner West Boundary

Local Native Plants for Verges in Biodiversity Streets

Plant species (continues in following page)

Climbers

Hardenbergia violacea Hibbertia scandens

Sedges

Carex inversa
Cyperus gracilis
Ficinia nodosa
Isolepis inundata
Juncus usitatus
Schoenus melanostachys

Ferns

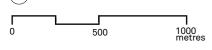
Adiantum aethiopicum Christella dentata Hypolepis mulleri Pteridium esculentum

Grasses Aristida vagans Bothriochloa macra Cymbopogon refractus Dichelachne crinata Echinopogon caespitosus Entolasia marginata Entolasia stricta Eragrostis brownii Imperata cylindrica Microlaena stipoides Oplismenus aemulus Poa affinis Rhytidosperma longifolia Rhytidosperma tenuior Themeda australi

Groundcovers

Carpobrotus glaucescens Centella asiatica Commelina cynaea Cotula australis Dianella caerulea Dichondra repens Geranium homeanum Glycine clandestina Goodenia hederacea Hibbertia diffusa Hydrocotyle penduncularis Lomandra longifolia Pelargonium inodorum Persicaria decipiens Pimelea linifolia Pomax umbellata Pratia purpurascens Senecio hispidulus Veronica plebeia Viola hederacea Wahlenbergia gracilis Xanthosia pilosa







Biodiversity

The southern boundary of the study site along Marrickville Road is highlighted as a 'Biodiversity Priority Area'. The rest of the site is nominated to form part of the 'Urban Habitat Mosaic'.

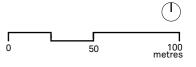
The former Marrickville Council Biodiversity Strategy 2011-2021 outlined Strategy 4.2.2 which aims to 'enhance local and regional connectivity for Biodiversity Values and Priority Biodiversity Areas' and this includes key directions to 'map opportunities for plantings of native shrubby plants in parks, streets..' and also to 'promote/support verge gardens... and other plantings throughout the Urban Habitat Mosaic. Combined with the Marrickville Urban Forest Strategy 2011, this has resulted in a 2015 / 2016 trial to increase tree and understory vegetation in nine new tree pits along Railway Parade and Buckley Street.

A review of the trial in August 2016 proposed 10 recommendations for further implementations of these strategies:

- > Ongoing maintenance of the beds to be incorporated into general verge maintenance.
- > Council to consider continuing to densely (up to 8 plants /m2) plant mixed local species as understory in tree pits across Sydenham to increase the urban habitat mosaic.

 Where traffic is an issue, consider planting larger, more resilient plants such as Lomandra along the edges.
- > It is suggested that the Coordinator of Parks and Streetscapes is contacted to determine if a low barrier or border can be placed on the high side of Bed One as well as tough plantings such as Lomandra, and that the down pipe running from the adjacent building across Council owned land can be fixed. This may avoid soil and mulch loss during heavy rain.
- > New bed placement should consider truck and car movements and be made visible through barriers and staking.
- > Council rangers investigate the damage to trees and beds in Buckley St and Railway Parade.
- > Council's Tree Management Coordinator consider more durable staking for trees planted in high traffic areas.
- > More heat observations on verge plantings could be undertaken to assess the type of plantings that can reduce heat. Further local multi species plantings could be done in Sydenham to reduce the heat effect.
- > Businesses need to be engaged with any further plantings to ensure that the size and placement will work and to take into account local knowledge.
- > Consider placing a street bin near the corner of Bed 6 on Buckley St note that the Waste Project Officer has a street bin available, and it should possibly include signs.

These recommendations shall be included in future works proposed along Marrickville Road East.



21

Heritage

The map outlines all heritage listed items within the south of the Inner West Council.

Legend

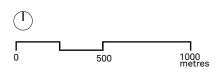
22

Marrickville Road East
Area

Heritage Items

Cooks River

Inner West Boundary





The study site with the heritage items within the context of the Marrickville region.

Heritage

The brick retaining walls on both Railway Parade and Marrickville Road are of Local heritage significance. Constructed as part of the Bankstown railway in 1895, the walls act as retaining for the cut and fill required for the railway infrastructure. While the walls were commonly constructed for the railway, these are of local significance due to their height, size and location with the two walls forming an important streetscape element.

The Sydenham Railway Station inclusive of all platform buildings, awnings, parcel office, waiting shed, brick faced platforms, Gleeson Avenue overbridge and brick perimeter wall are of state heritage significance. The overbridge is a 1920s addition, but highlights the station development over time.

Legend



Marrickville Road East Area







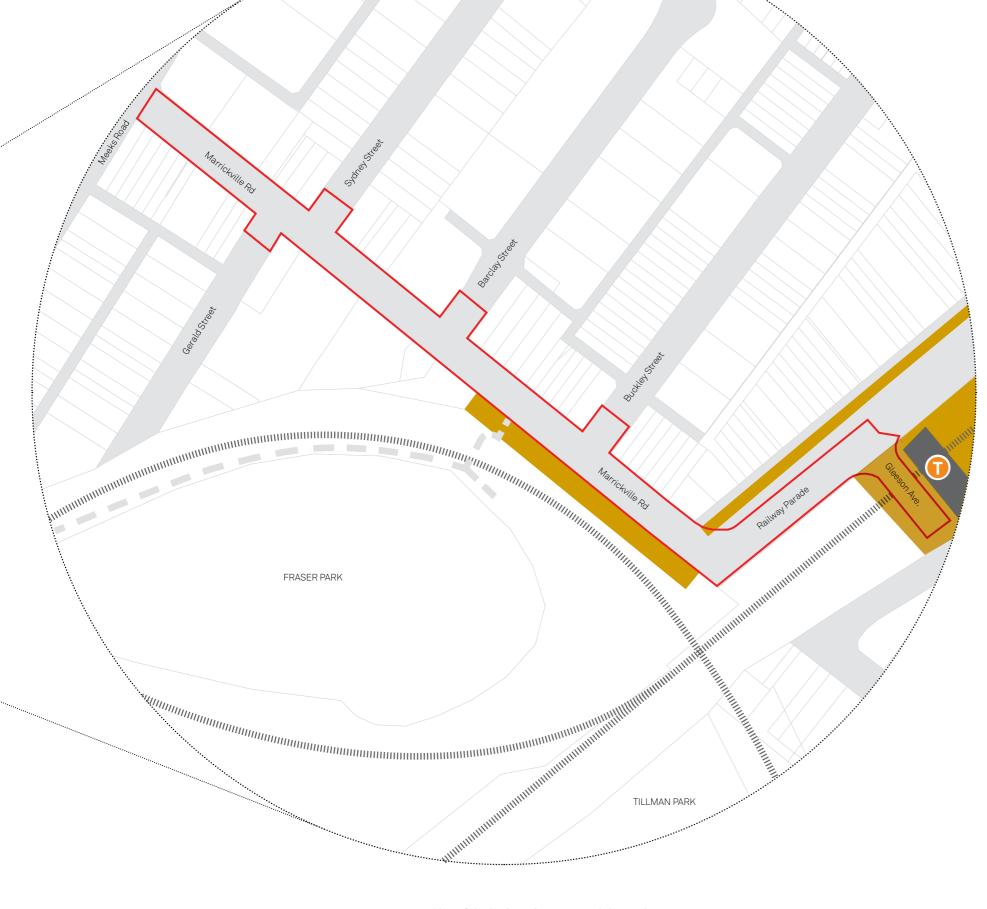
Heritage Items



Train Line

Existing Service Road into Fraser Park

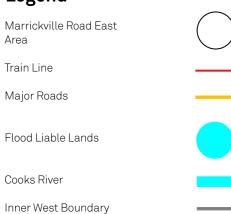




Flood Liable Land

The study area is part of the Cooks River catchment. The low part of the site along Marrickville Road was once part of the drained Gumbramorra Swamp. The map shows the 'Flood Liable Land' from the 2011 Development Control Plan (DCP). Flood Liable Land is detailed as land within a flood planning area, and land likely to be affected by the probable maximum flood (PMF) of the Cooks River. The map also includes the Flood Planning Area (overland flow). It identifies land in accordance with Council's flood tagging policy, which includes land likely to be affected by the 100-year flood overland flow event.

Legend







The study site with flood liable lands within the context of the Marrickville region.

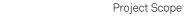
Flooding Liable Land

The implementation of public domain upgrades along Marrickville Road, must consider the requirements within Chapter 2.22 Flood Management within the DCP 2011. In general, items including depth and nature of possible floodwater, flood classification of the area and the risk proposed by floodwaters. Streetscape works shall not increase the flood hazard or risk to properties.

Legend



Marrickville Road East Area





Flooding Liable Land

Sydenham Station

ШШШ

Train Line

Existing Service Road into Fraser Park





TILLMAN PARK

Astronome and the state of the

Site Analysis

Acid Sulphate Soils

Acid sulphate soils have been classified based on the likelihood of the acid sulphate soils being present in particular areas and at certain depths.

There are five classifications:

Class 1

Acid sulphate soils in a class 1 area are likely to be found on and below the natural ground surface. Any works* will trigger the requirement for development consent.

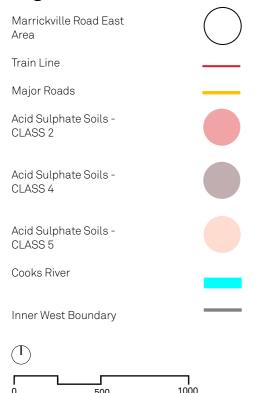
Class 2

Acid sulphate soils in a class area are likely to be found below the natural ground surface. Any works* beneath the natural ground surface, or works* which are likely to lower the water table, will trigger the requirement for development consent.

Class 3

Acid sulphate soils in a class 3 area are likely to be found beyond 1 metre below the natural ground surface. Any works* that extend beyond 1 metre below the natural ground surface, or works 2 which are likely to lower water table beyond 1 metre below the natural ground surface, will trigger the requirement for development consent.

Legend



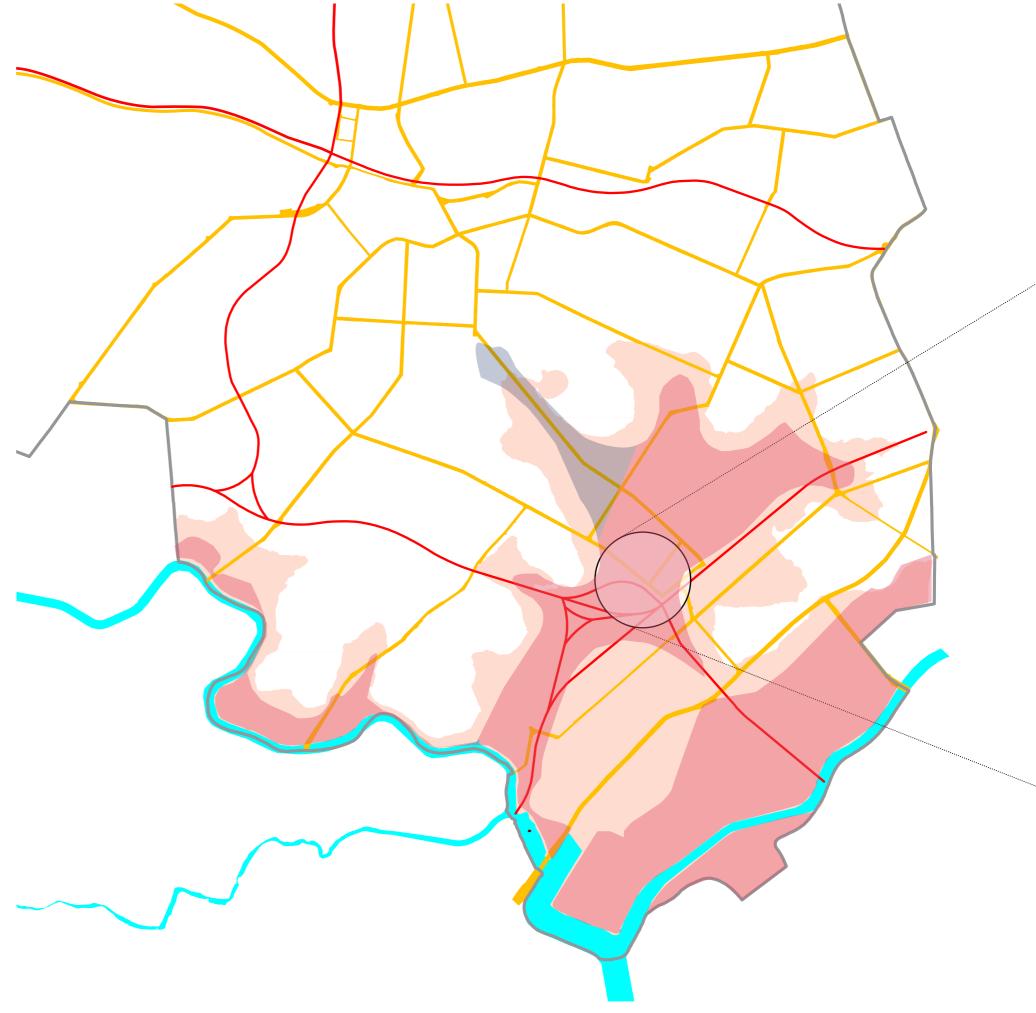
Class 4

Acid sulphate soils in a class 4 area are likely to be found beyond 2 metres below the natural ground surface. Any works* that extend beyond 2 metres below the natural ground surface, or works* which are likely to lower the water table beyond 2 metres below the natural ground surface, will trigger the requirement for development consent.

Class 5

Acid sulphate soils are not typically found in Class 5 areas. Areas classified as Class 5 are located within 500 metres on adjacent class 1,2,3 or 4 land. Works* in a class 5 area that are likely to lower the water table below 1 metre Australian Height Datum on adjacent class 1, 2, 3 or 4 land will trigger the requirement for development consent.

Note: * 'Work' is defined as any works that disturb more than one (1) tonne of soil, or lower the water table.



The study site with acid sulphate soils identified within the context of the Marrickville region.

Acid Sulphate Soils

The map shows almost the entire scope area is classified as Class 2:

Acid sulphate soils in a class 2 area mean Acid Sulphate Soils are likely to be found below the natural ground surface.

Excavation beneath the natural ground surface, or works which are likely to lower the water table, will trigger the requirement for development consent.

Legend



Marrickville Road East Area

Project Scope



Sydenham Station

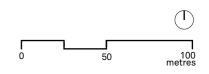
CLASS 2 - Acid Sulphate Soils

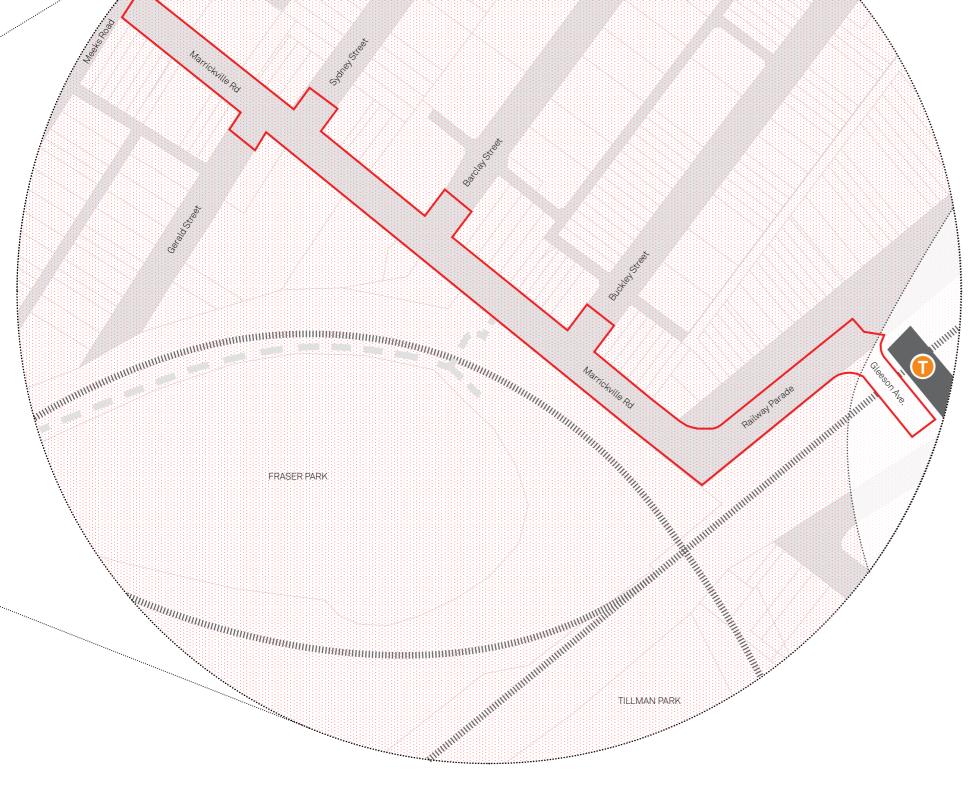


CLASS 5 - Acid Sulphate Soils

11111111111

Train Line





Bicycle network

The site connects with regional cycle links heading west through Marrickville into Dulwich hill. Nearby connections head north along Sydney Street towards Enmore and Newtown, and south connecting to the Cooks River cycleway via Meeks Road. Cycle link east connected to major routes along Unwins Bridge Road and those heading east to the Alexandria Canal.

Legend

Marrickville Road East

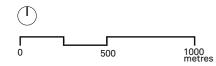
Existing Cycle Routes

Suggested Cycle Routes

Cooks River







The study site with identified bicycle routes across the Marrickville region.

Bicycle network

The cycle link along Marrickville Road is currently a combination of on and off road cycle routes including footpath shared zones. Currently bicycle users are in conflict with pedestrians on the southern side of Marrickville Road; where poor form street trees, driveways and shop fronts combined with sections of narrow footpath to constrain the safe use of the pathway area. A detailed cycle study of the configuration of the route is occurring concurrently with the Marrickville East project. Each project group is collaborating on the project outcomes.

Legend



Marrickville Road East Area

Project Scope

Existing Cycle Routes

Suggested Cycle Routes

Sydenham Station

Train Line

Existing Service Road into Fraser Park





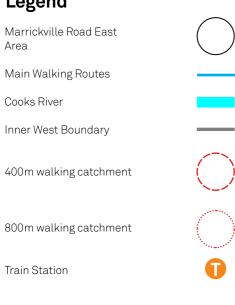
TILLMAN PARK

A derice de la constitution de l

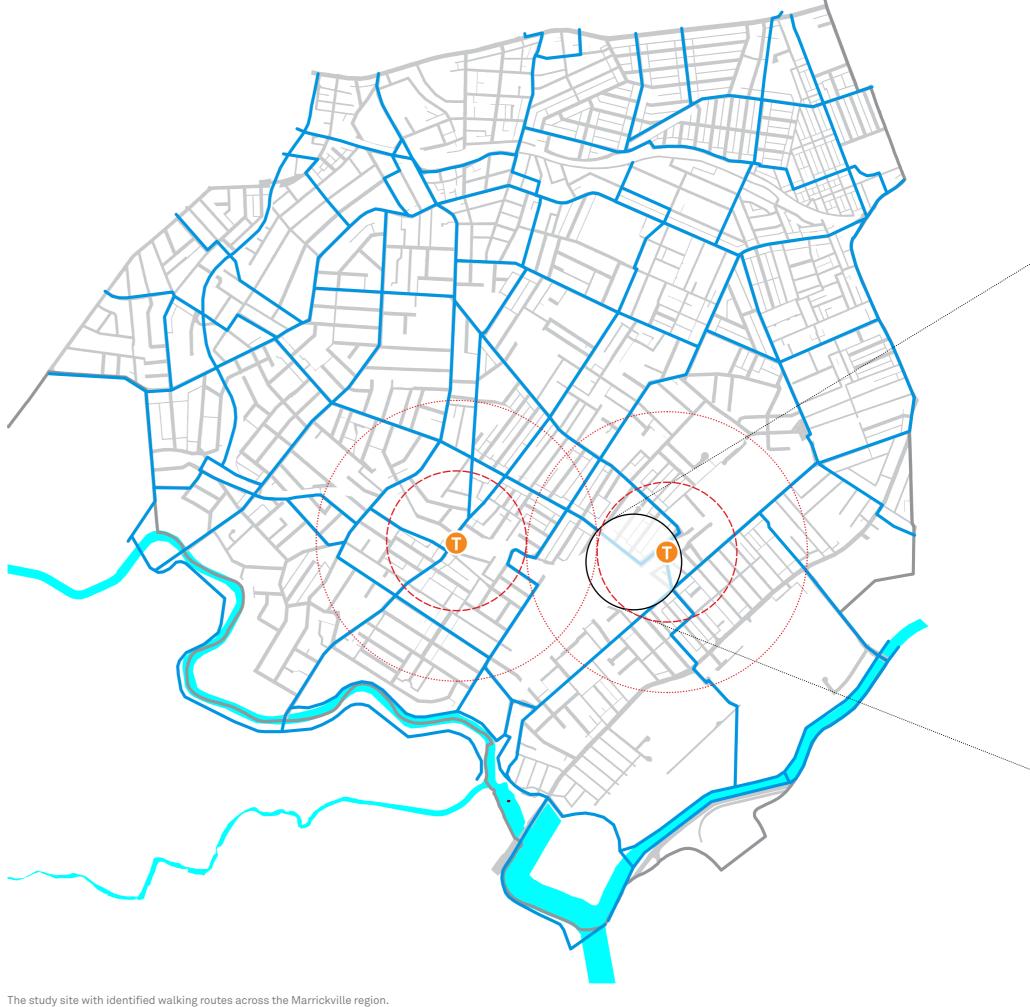
Main Walking Routes

All streets within the site are mapped as part of the former Marrickville Council's walkable Streets Network. Both Marrickville and Sydenham railway stations are pedestrian attractors, particularly for commuters to the city. The catchments for these stations extend well beyond the site, and overlap with each other.

Legend



1000 metres



Marrickville Road East Streetscape Improvements

Main Walking Routes

Both sides of the road provide accessible pathways along Marrickville Road, Railway Parade and Gleeson Avenue. The southern side of Marrickville Road however appears more popular, potentially due to the less number of roads that are required to be crossed when walking the street. Both sides of the road lack basic pedestrian amenity items and are impacted severely by the speed, volume and size of vehicles using the thoroughfare. The section from Gleeson Avenue to Buckley Street is particularly impacted as it acts as a key urban connector for industrial vehicles. Both sides of the road are also dominated by expanses of concrete with limited shade. Street trees of poor form constrict the footpath at various locations, however is worst along the southern side of Marrickville Road East.

Legend



Marrickville Road East Area

Project Scope



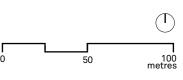
Main Walking Routes

Sydenham Station

Train Line

Existing Service Road into Fraser Park





TILLMAN PARK

A der control of the second of

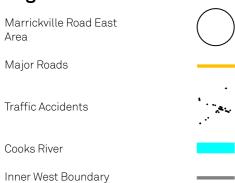
Site Analysis

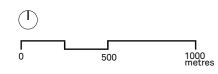
Traffic Accidents

Black dots represent the accidents that occurred over the last 5 years in the southern area of the Inner West Council.

While many are concentrated along major roads, the map highlights the smaller streets also host a number of traffic accidents.

Legend





32



The study site with vehicle accidents across the Marrickville region.

Traffic Accidents

The location of traffic accidents are highlighted within the study area. The congregation of accidents highlights places of conflict and should be the focus of improving the street environment to make it safe for all users. Mapping the location of accidents highlights that traffic accidents in the study area mostly occurred at road intersections.

Legend



Marrickville Road East

Project Scope



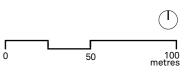
Train Line

Existing Service Road





into Fraser Park



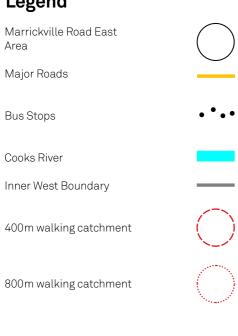
TILLMAN PARK

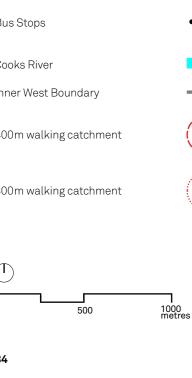
EPASER PARK

Bus Stops

The study site road system accommodates bus transport as part of the greater public transport network across the LGA. The M30, 418 and 425 buses operated by transport for NSW travel along Railway and Marrickville

Legend







The study site with bus routes across the Marrickville region.

Bus Stops

The M30, 418 and 425 buses have one stop in each direction within the study area.

Legend

Marrickville Road East Area





Bus Stops

Kerb Line

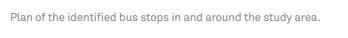
Train Line



Sydenham Station

Existing Service Road into Fraser Park





TILLMAN PARK

FRASER PARK

B

B

35

1111111

Traffic & Parking

The streets include a number of existing constraints that cannot be altered without serious impact to the existing use of the street. Key constraints that have been identified within the site include:

- > Driveway width and locations;
- > Bus stop locations;
- > Bus clearway requirements; and
- > AusRoad sightline requirements at intersections.

Each of the existing conditions have been mapped on plans to ascertain the existing street conditions.

Legend

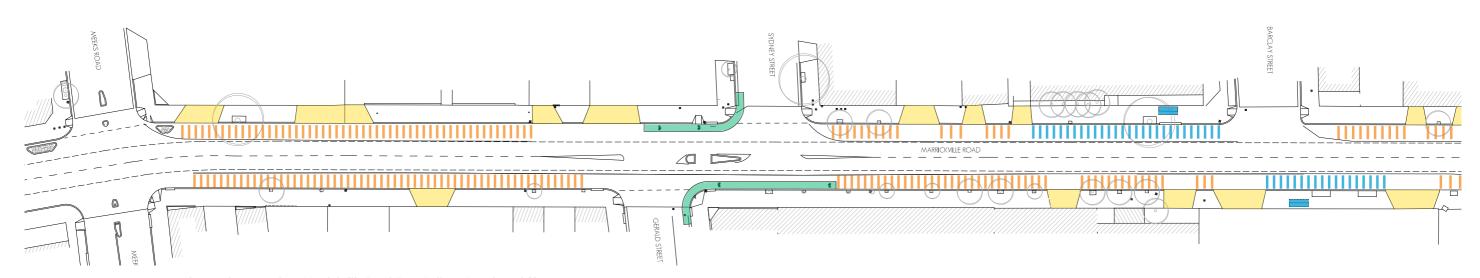
Designated Parking Area

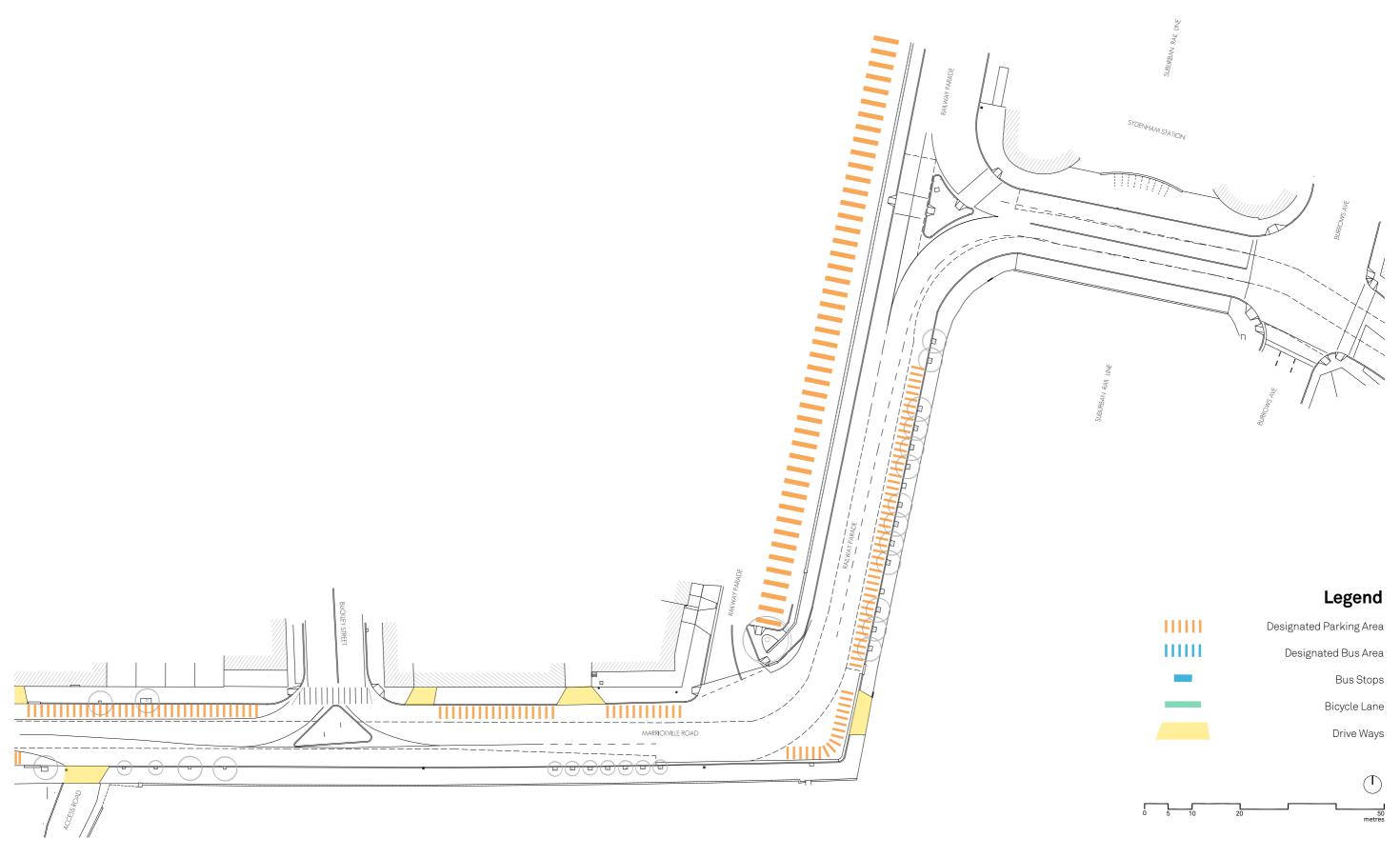
Designated Bus Area

Bus Stops

Bicycle Lane

Drive Ways





Pedestrian footpaths

Pathway width has a significant impact on design outcomes along a streetscape. The pathway width plan captures the typologies of the existing street including width within the study area. This has been used to analyse what can occur along the street in the different design options.

Legend

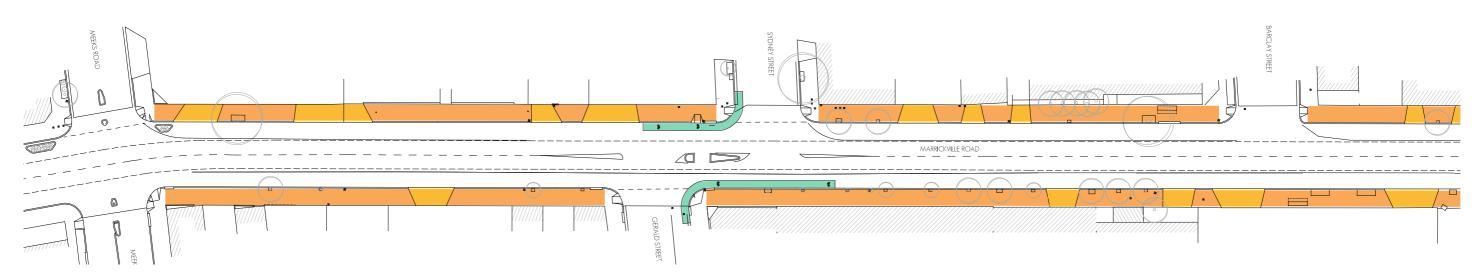
>4 meters wide

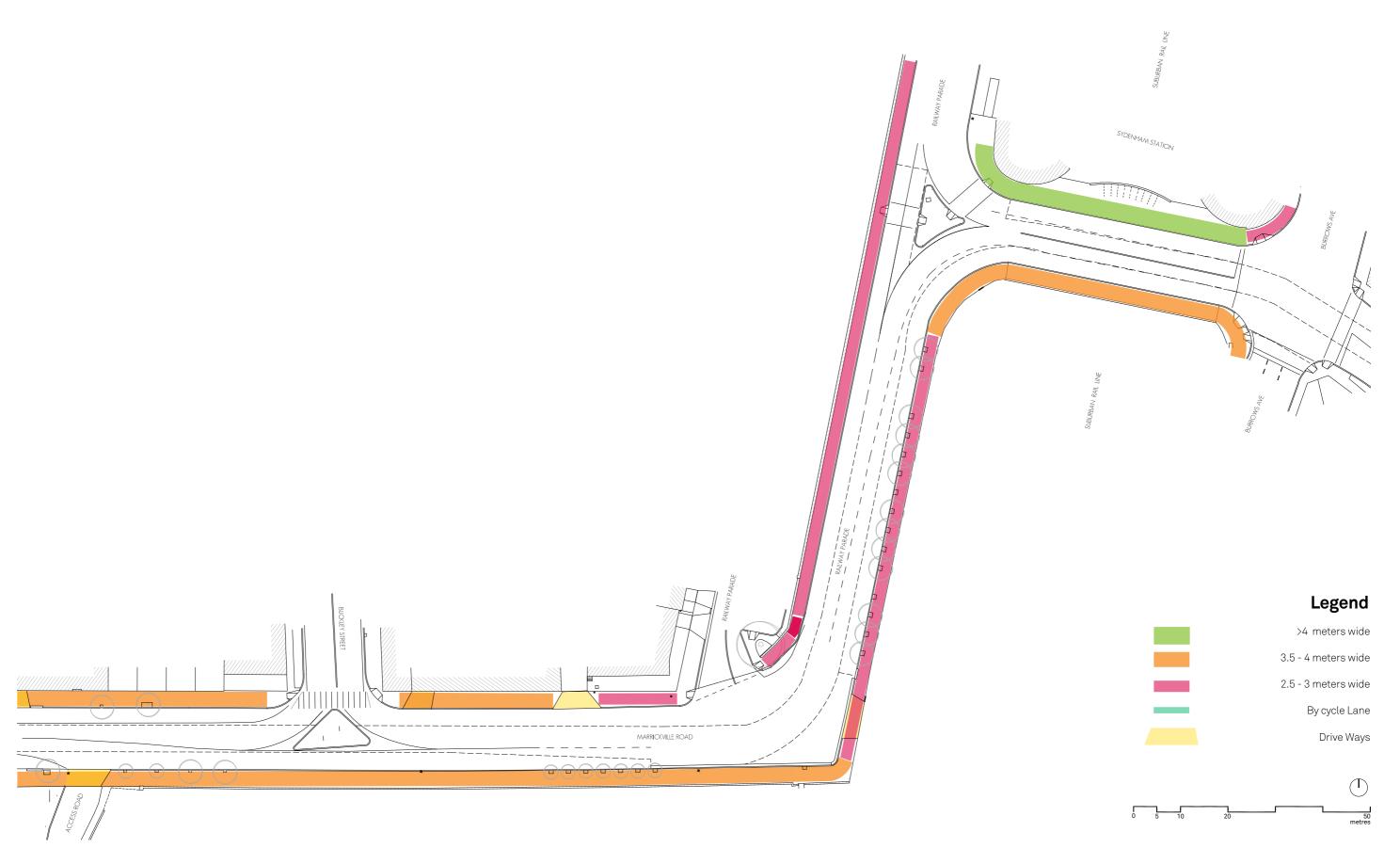
3.5 - 4 meters wide

2.5 - 3 meters wide

Bicycle Lane

Drive Ways





Existing Trees

All existing trees have been mapped with data including: Botanical name, common name, height, spread and general age recorded for analysis.

All trees have been assessed on site. A retention value has been assigned to each one tree.

01

Asset Number: TRS29201 Botanical Name: Eucalyptus melliodora Height: 8m Canopy Spread: 6m

Canopy Sprea DBH: **30cm** Age: **Mature**

02 / 02a

Asset Number: TRS28869
Botanical Name: Tristaniopsis laurina
Height: 4m
Canopy Spread: 5m
DBH: 18cm
Age: Mature

03

Asset Number: TRS28868
Botanical Name: Tristaniopsis laurina
Height: 3m
Canopy Spread: 3m
DBH: 13cm
Age: Mature

04

Asset Number: TRS29137
Botanical Name: Auranticarpa rhombifolia
Height: 4m
Canopy Spread: 1m
DBH: 10cm
Age: Semi Mature

Legend

High Retention Value

Medium Retention Value

Low Retention Value

05

Asset Number: TRS28924
Botanical Name: Tristaniopsis laurina
Height: 2m
Canopy Spread: 1m
DBH: 3cm

06

Age: Young

Asset Number: TRS28923
Botanical Name: Tristaniopsis laurina
Height: 2m
Canopy Spread: 1m
DBH: 3cm
Age: Young

07

Asset Number: TRS29138
Botanical Name: Callistemon salignus
Height: 7m
Canopy Spread: 5m
DBH: 35cm
Age: Mature

08

Asset Number: TRS28925
Botanical Name: Tristaniopsis laurina
Height: 5m
Canopy Spread: 4m
DBH: 25
Age: Mature

09

Asset Number: TRS28924
Botanical Name: Tristaniopsis laurina
Height: 2m
Canopy Spread: 1m
DBH: 3cm
Age: Young

10

Asset Number: TRS28921
Botanical Name: Tristaniopsis laurina
Height: 4m
Canopy Spread: 3m
DBH: 21cm
Age: Mature

11

Asset Number: TRS28926 Botanical Name: Tristaniopsis laurina Height: 6m Canopy Spread: 4m DBH: 18cm Age: Mature

12

Asset Number: TRS28920 Botanical Name: Tristaniopsis laurina Height 4m Canopy Spread 4m DBH 19cm Age: Mature

13

Asset Number: TRS28919
Botanical Name: Tristaniopsis laurina
Height: 5m
Canopy Spread 4m
DBH: 20cm
Age: Mature

14

Asset Number: TRS28918
Botanical Name: Tristaniopsis laurina
Height: 5m
Canopy Spread: 5m
DBH: 24cm
Age; Mature

15

Asset Number: TRS28917 Botanical Name: Tristaniopsis laurina Height: 4m Canopy Spread: 3m DBH: 17cm Age: Mature

16/16b

Asset Number: TRS28916
Botanical Name: Tristaniopsis laurina
Height: 5m
Canopy Spread: 6m
DBH: 25cm
Age: Mature

17

Asset Number: TRS28927 Botanical Name: Eucalyptus mannifera Height: 15m Canopy Spread: 44m DBH: 60cm Age: Mature

18

Asset Number: TRS28928
Botanical Name: Tristaniopsis laurina
Height: 5m
Canopy: Spread 4m
DBH: 24cm
Age: Mature

19

Asset Number: TRS28911
Botanical Name: Tristaniopsis laurina
Height: 5m
Canopy Spread: 4m
DBH: 17cm
Age: Mature

20

Asset Number: TRS28929
Botanical Name: Tristaniopsis laurina
Height: 4m
Canopy Spread: 2m
DBH: 14cm
Age: Mature

21 / 21a / 21b

Asset Number: N/A
Botanical Name Macadamia Integrifolia
Height 1m
Canopy Spread 0.5m
DBH 2cm

22

Age Young

Asset Number TRS28930 Botanical Name Tristaniopsis laurina Height 2m Canopy Spread 1m DBH 5cm Age Semi Mature

2

Asset Number TRS28909
Botanical Name Tristaniopsis laurina
Height 2
Canopy Spread 1
DBH 1cm
Age Young

24

Asset Number TRS28908
Botanical Name Melaleuca bracteata
Height 5m
Canopy Spread 7m
DBH 26cm
Age Mature

25

Asset Number TRS28907
Botanical Name Melaleuca bracteata
Height 5m
Canopy Spread 4m
DBH 20cm
Age Mature

26

Asset Number TRS28906
Botanical Name Stenocarpus sinuatus
Height 4m
Canopy Spread 1m
DBH 4cm
Age Young

27

Asset Number: TRS28905 Botanical Name: Stenocarpus sinuatus Height: 3m Canopy Spread: 1m DBH: 5cm

2

Age: Young

Age: Young

Asset Number: TRS28904
Botanical Name: Stenocarpus sinuatus
Height: 3m
Canopy Spread: 1m
DBH: 4cm

29

Asset Number: TRS28903 Botanical Name: Stenocarpus sinuatus Height: 3m Canopy Spread: 1m DBH: 4cm Age: Young

30

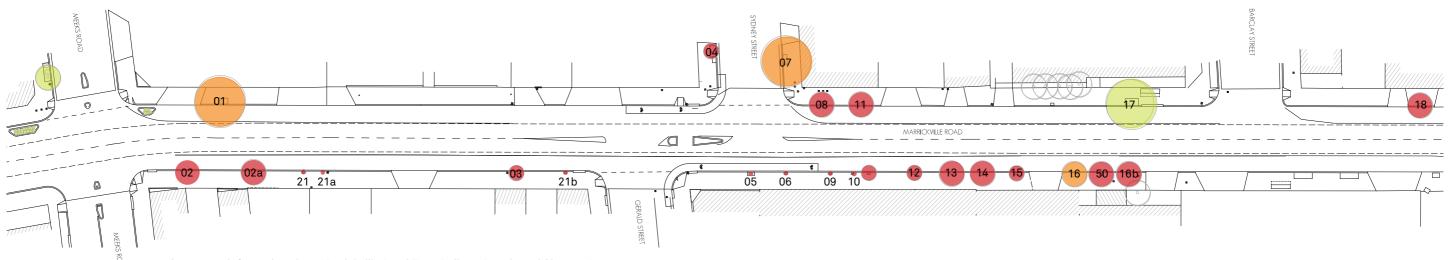
Asset Number: TRS28902
Botanical Name: Stenocarpus sinuatus
Height: 3m
Canopy Spread: 1m
DBH: 4cm
Age: Young

31

Asset Number: TRS28901
Botanical Name: Stenocarpus sinuatus
Height: 3m
Canopy Spread: 1m
DBH: 3cm
Ag: Young

32

Asset Number: TRS28900
Botanical Name: Stenocarpus sinuatus
Height: 4m
Canopy Spread: 1m
DBH: 5cm
Age: Young



Asset Number: TRS28899 Botanical Name: Stenocarpus sinuatus Height: 2m Canopy Spread: 1m

DBH: 2cm Age: Young

Asset Number: TRS28898 Botanical Name: Stenocarpus sinuatus Height: 3m Canopy Spread: 1m DBH: 2cm Age: Young

Asset Number: TRS28897 Botanical Name: Stenocarpus sinuatus Height: 2m Canopy Spread: 1m

DBH: 1cm Age: Young

36

Asset Number: TRS28896 Botanical Name: Stenocarpus sinuatus Height: 2m Canopy Spread: 1m DBH:3cm

Asset Number: TRS28931 Botanical Name: Robinia pseudoacacia Height: 7m Canopy Spread: 10m

DBH: 39cm Age: Mature

Age: Young

Asset Number: TRS28895

Botanical Name: Lophostemon confertus Height: 3m Canopy Spread: 2m DBH: 12cm Age: Semi Mature

Asset Number: TRS28894 Botanical Name: Syzygium australe Height: 1m Canopy Spread: 1m DBH: 2cm

Age: Young

Asset Number: TRS28893 Botanical Name: Lophostemon confertus Height: 4m Canopy Spread: 2m DBH: 12cm Age: Semi Mature

Asset Number: TRS28892 Botanical Name: Syzygium australe Height: 1m Canopy Spread: 1m DBH: 2cm Age: Young

42

Asset Number: TRS28891 Botanical Name: Lophostemon confertus Height: 4m Canopy Spread: 2m DBH: 16cm Age: Semi Mature

Asset Number: TRS28890 Botanical Name: Syzygium australe Height: 1m Canopy Spread: 1m DBH:1cm

Age: Young

Asset Number: TRS28889 Botanical Name: Lophostemon confertus Height: 4m Canopy Spread: 2m DBH:8cm Age: Semi Mature

Asset Number: TRS28888 Botanical Name: Lophostemon confertus Height: 4m Canopy Spread: 2m DBH: 16cm

Age: Semi Mature

Asset Number: TRS28887 Botanical Name: Syzygium australe Height: 1m Canopy Spread: 1m DBH: 1cm Age: Young

Asset Number: TRS28886 Botanical Name: Lophostemon confertus Height:4m Canopy Spread: 2m DBH:8cm Age: Semi Mature

48 / 48b

Asset Number: TRS28885 Botanical Name: Syzygium australe Height: 1m Canopy Spread: 1m DBH: 1cm Age: Young

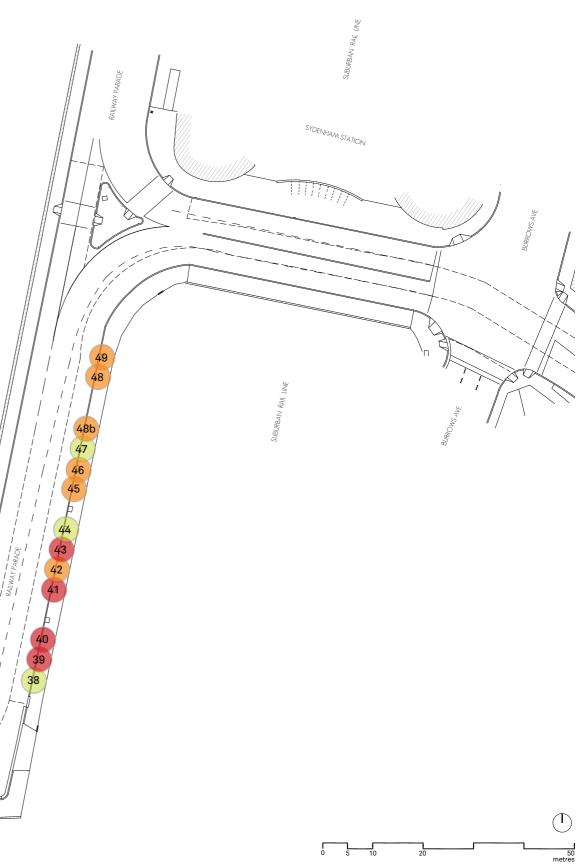
Asset Number: TRS28884 Botanical Name: Lophostemon confertus Height: 3m Canopy Spread: 2m DBH: 8cm Age: Semi Mature

Asset Number: N/A Botanical Name: Schefflera actinophylla

MARRICKVILLE ROAD

Height:4m Canopy Spread: 2m DBH: 8cm Age: Semi Mature

02_ Site Analysis - Marrickville Road East





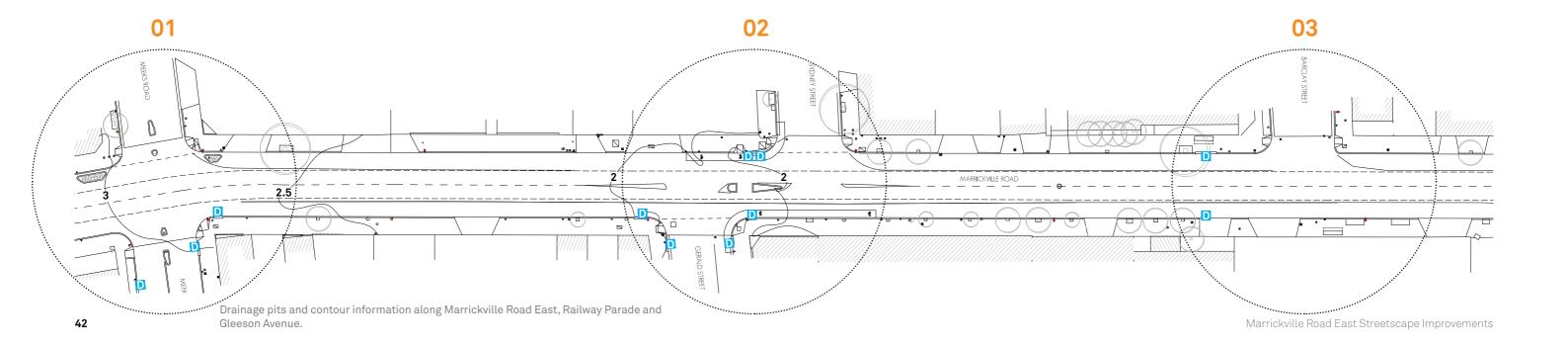
Contours & Rain Water

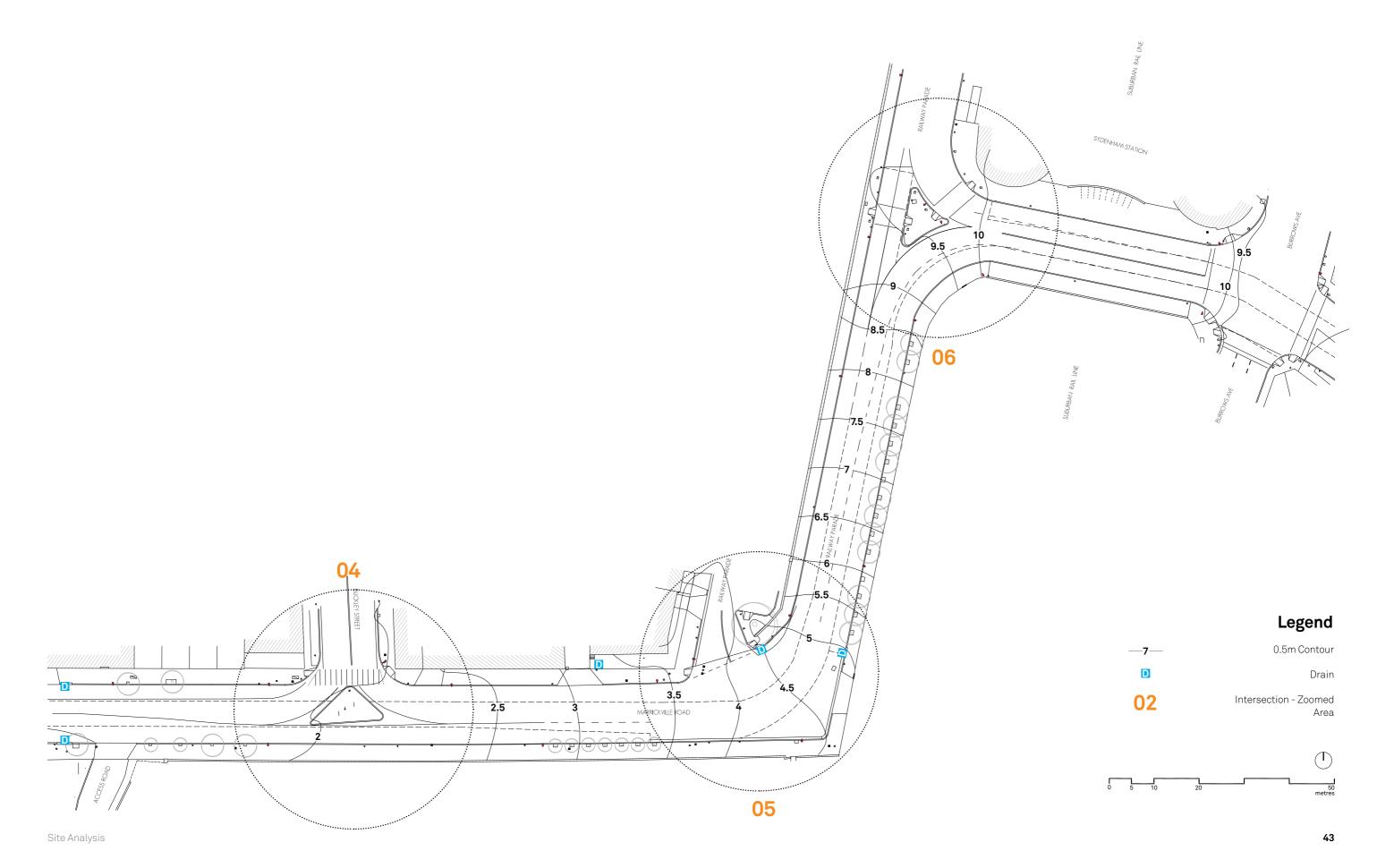
The site slope and drainage pit locations have been mapped to design the street, including water sensitive urban design elements. All existing pits have been retained and used in the final design options.

Legend

Area

0.5m Contour D Drain 02 Intersection - Zoomed





Infrastructure_Street Intersections

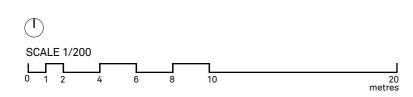
Existing infrastructure elements have been mapped along the street.

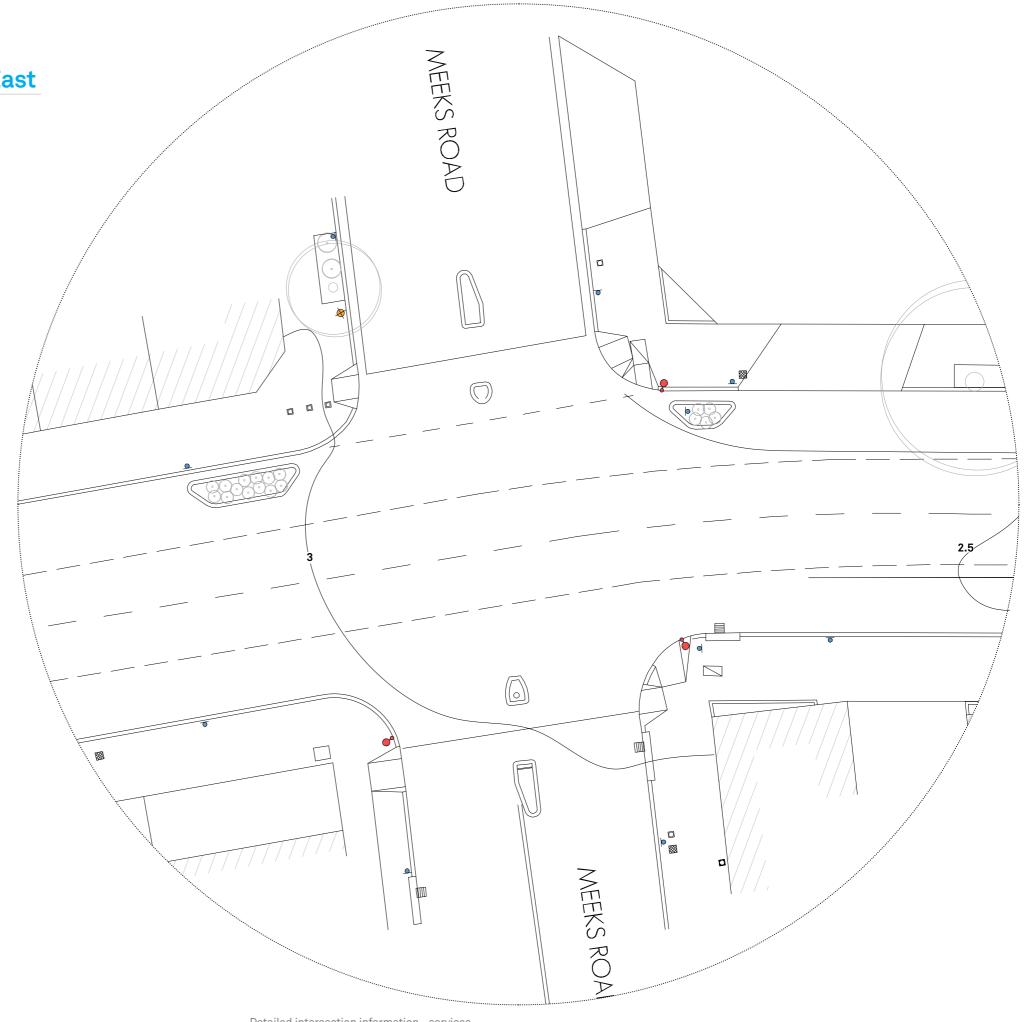
All vertical infrastructure have been colour-coded for easy reference with the legend.

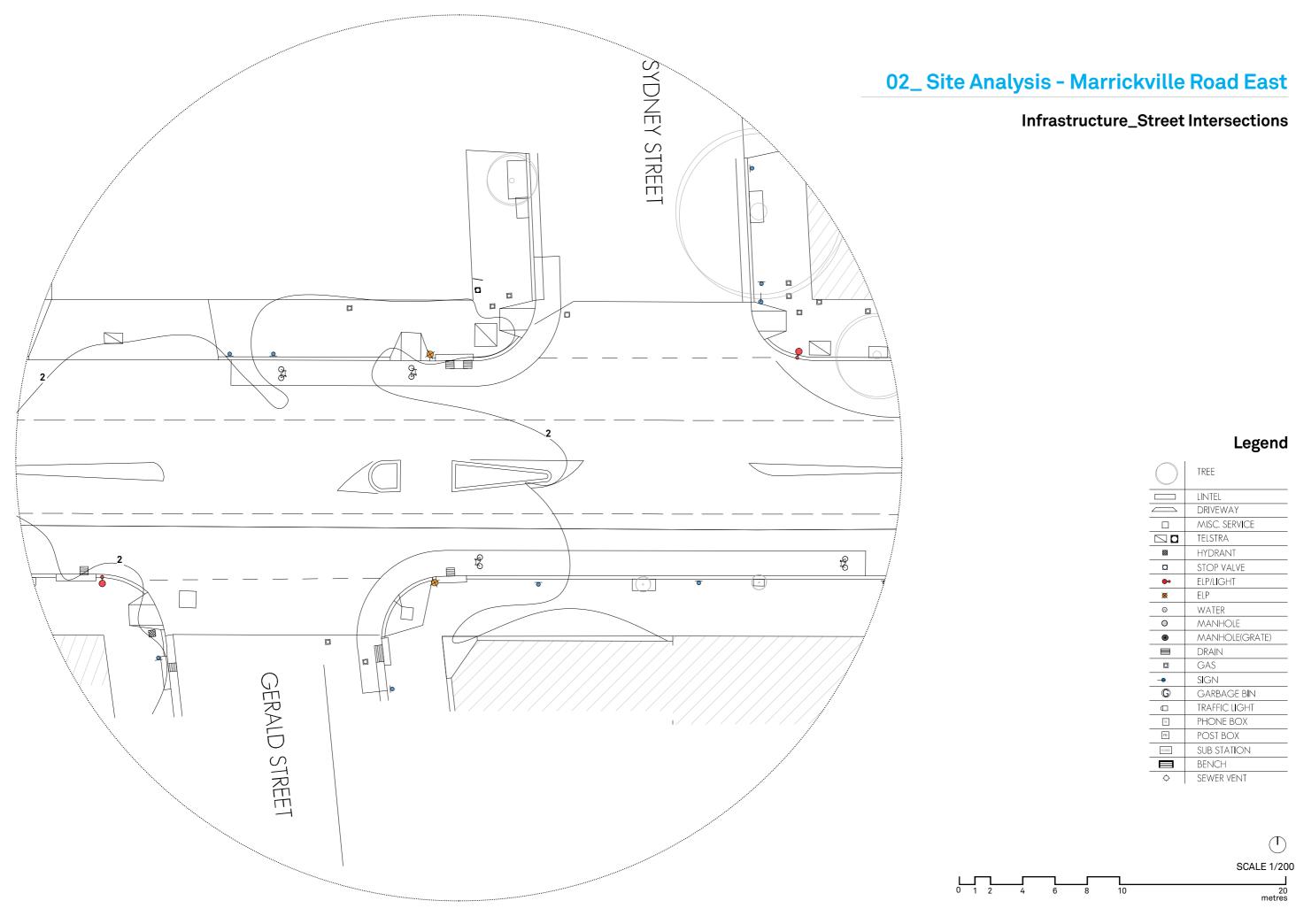
The following pages show each of the intersections.

Legend

	TREE
	LINTEL
	DRIVEWAY
	MISC. SERVICE
	TELSTRA
•	HYDRANT
	STOP VALVE
••	ELP/L I GHT
×	ELP
00	WATER
0	MANHOLE
•	MANHOLE(GRATE)
	DRAIN
	GAS
-	SIGN
©	GARBAGE B I N
	TRAFFIC L I GHT
18	PHONE BOX
PB	POST BOX
EC0000	SUB STAT I ON
	BENCH
	SEWER VENT







20 metres

 (T)

Infrastructure_Street Intersections

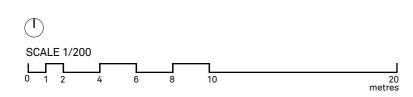
Existing infrastructure elements have been mapped along the street.

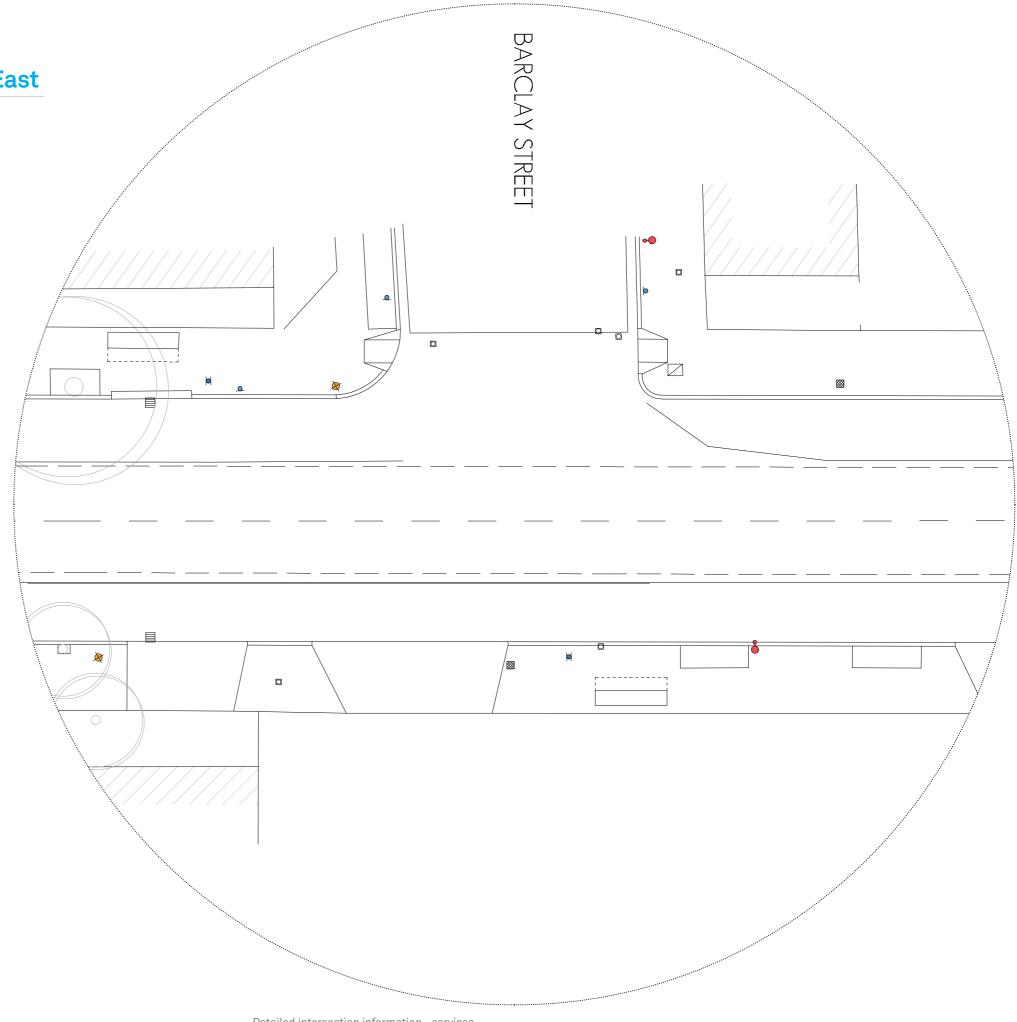
All vertical infrastructure have been colour-coded for easy reference with the legend.

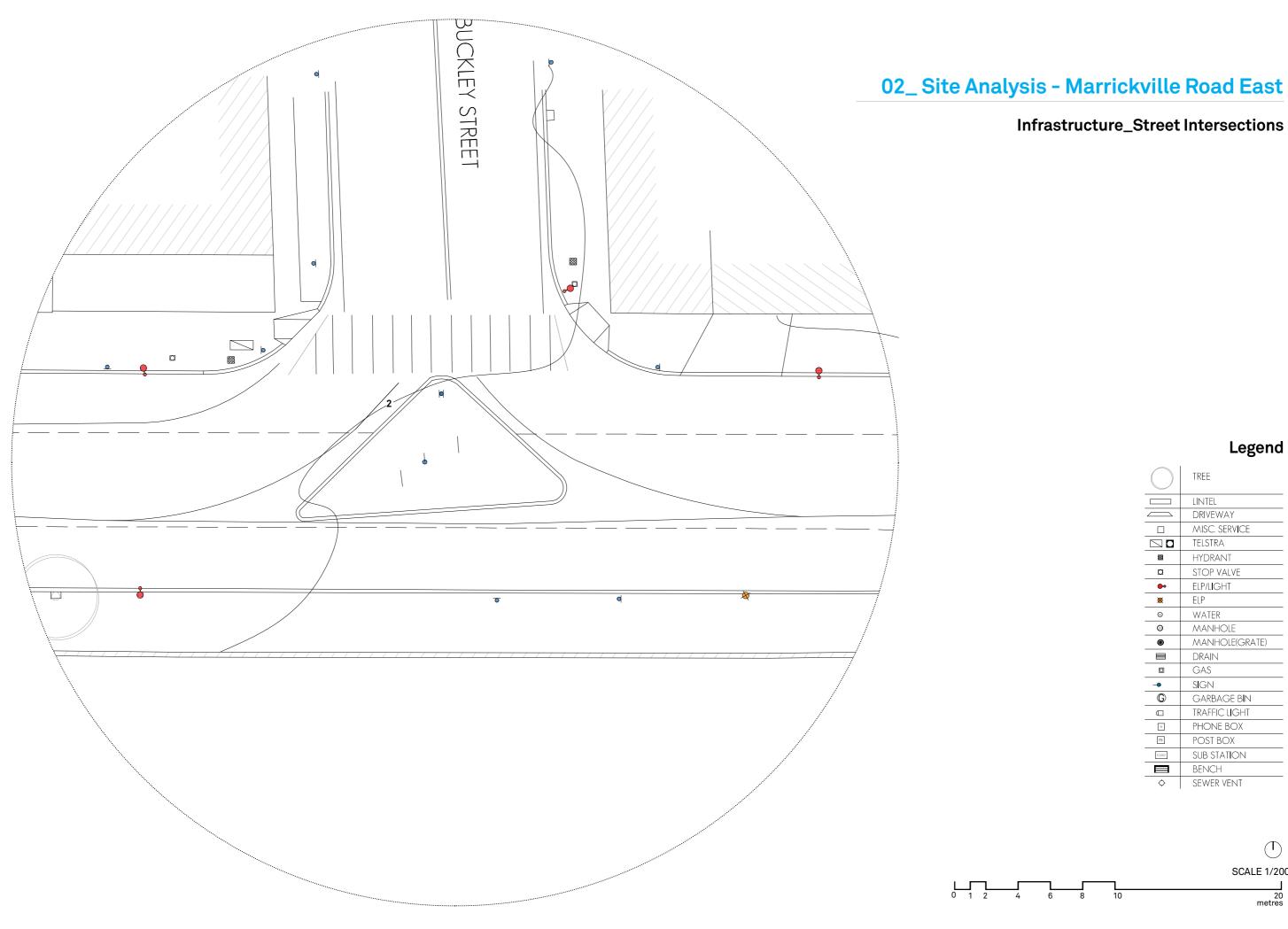
The following pages show each of the intersections.

Legend

	TREE
	LINTEL
	DRIVEWAY
	MISC. SERVICE
	TELSTRA
	HYDRANT
	STOP VALVE
••	ELP/L I GHT
×	ELP
0	WATER
0	MANHOLE
•	MANHOLE(GRATE)
	DRAIN
	GAS
-	SIGN
G	GARBAGE B I N
	TRAFFIC L I GHT
18	PHONE BOX
PB	POST BOX
ECDOOO	SUB STAT I ON
	BENCH
	SEWER VENT







 \bigcirc

20 metres

SCALE 1/200

Legend

Infrastructure_Street Intersections

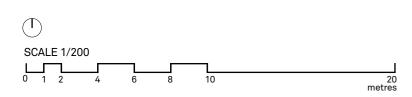
Existing infrastructure elements have been mapped along the street.

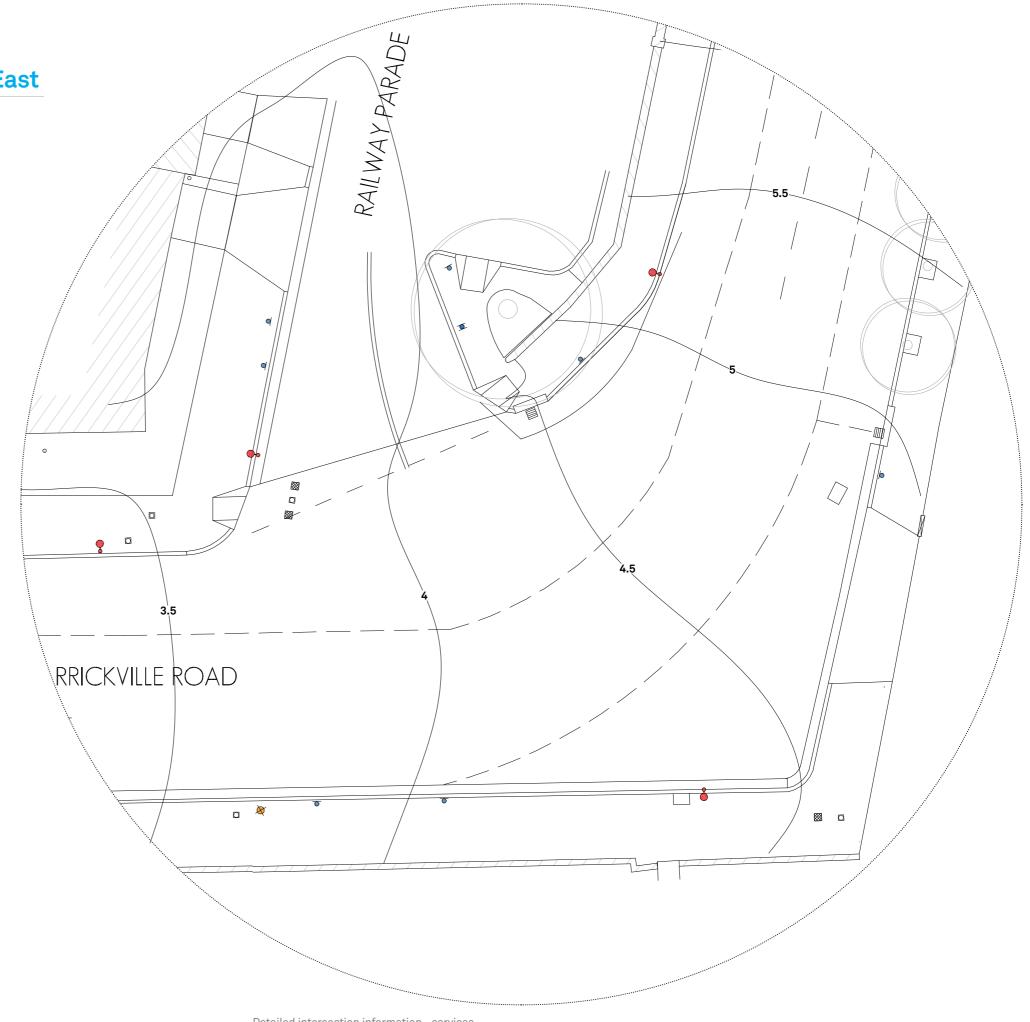
All vertical infrastructure have been colourcoded for easy reference with the legend.

The following pages show each of the intersections.

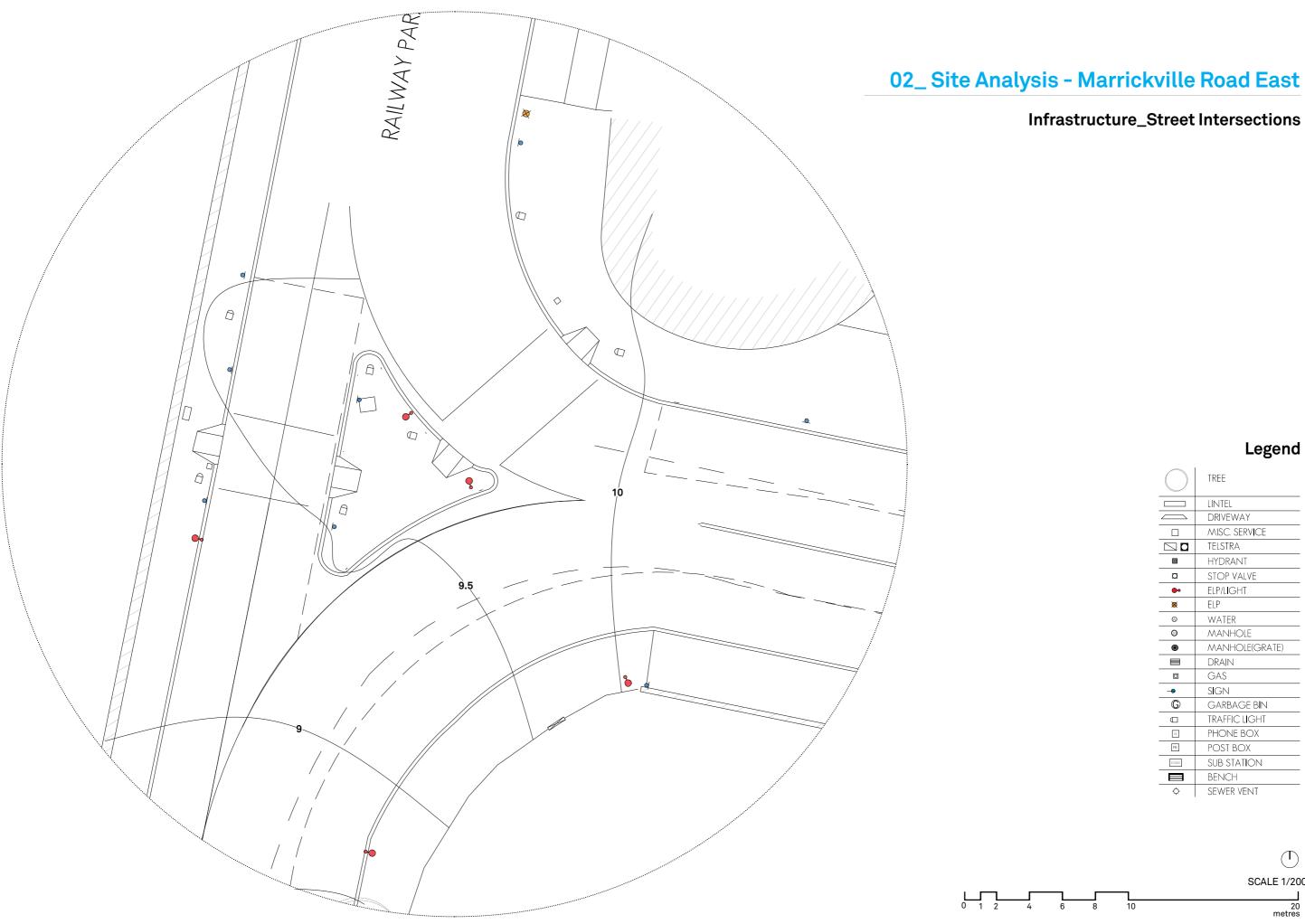
Legend

	TREE
	LINTEL
	DRIVEWAY
	MISC. SERVICE
	TELSTRA
	HYDRANT
	STOP VALVE
••	ELP/L I GHT
×	ELP
0	WATER
0	MANHOLE
•	MANHOLE(GRATE)
	DRAIN
	GAS
-	SIGN
G	GARBAGE B I N
	TRAFFIC L I GHT
18	PHONE BOX
PB	POST BOX
ECEDOO	SUB STAT I ON
	BENCH
	SEWER VENT



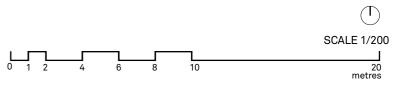


Detailed intersection information - services.



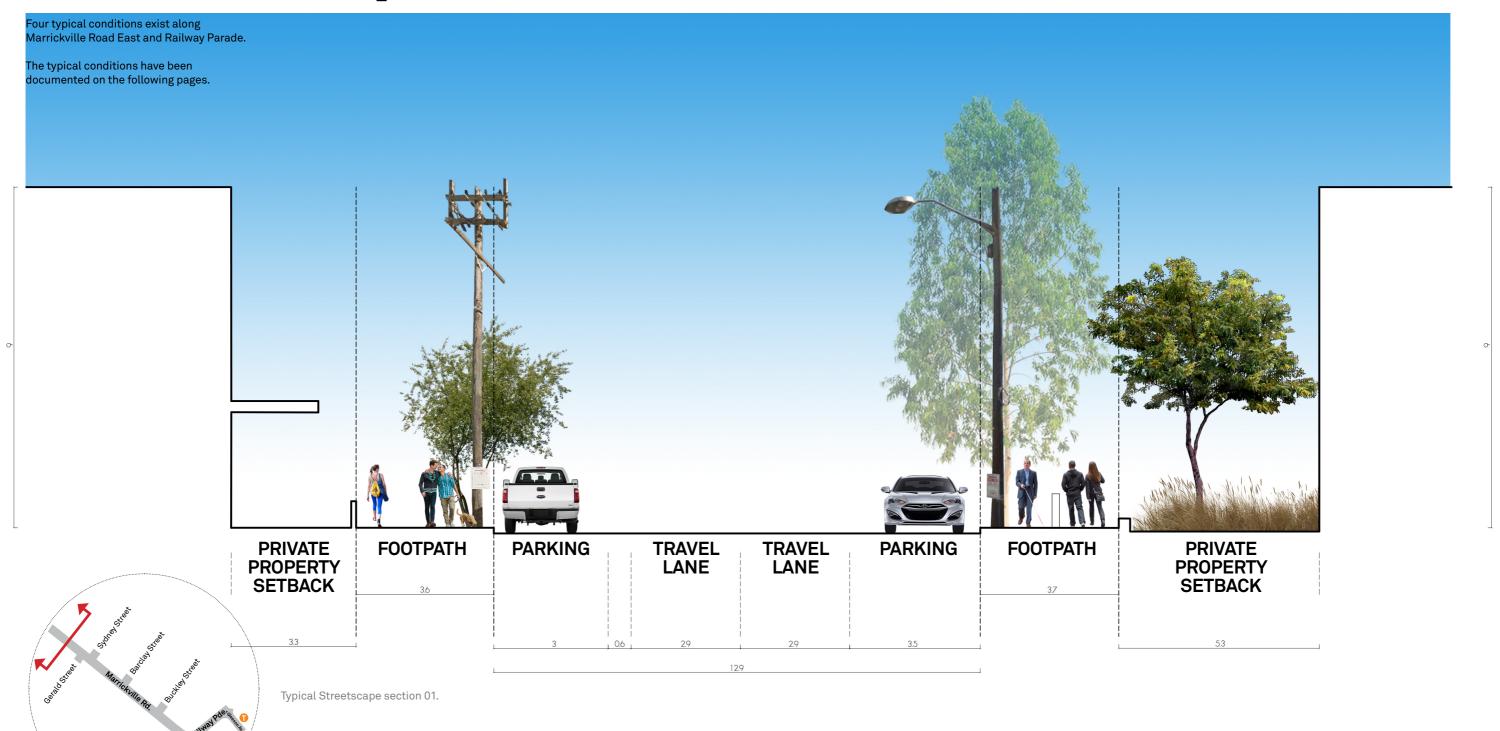
Legend

	_
	TREE
	LINTEL
	DRIVEWAY
	MISC. SERVICE
	TELSTRA
	HYDRANT
	STOP VALVE
••	ELP/L i GHT
×	ELP
00	WATER
Ø	MANHOLE
•	MANHOLE(GRATE)
	DRAIN
	GAS
-	SIGN
©	GARBAGE B I N
	TRAFFIC L I GHT
TB	PHONE BOX
PB	POST BOX
EC0000	SUB STAT I ON
	BENCH
	SEWER VENT



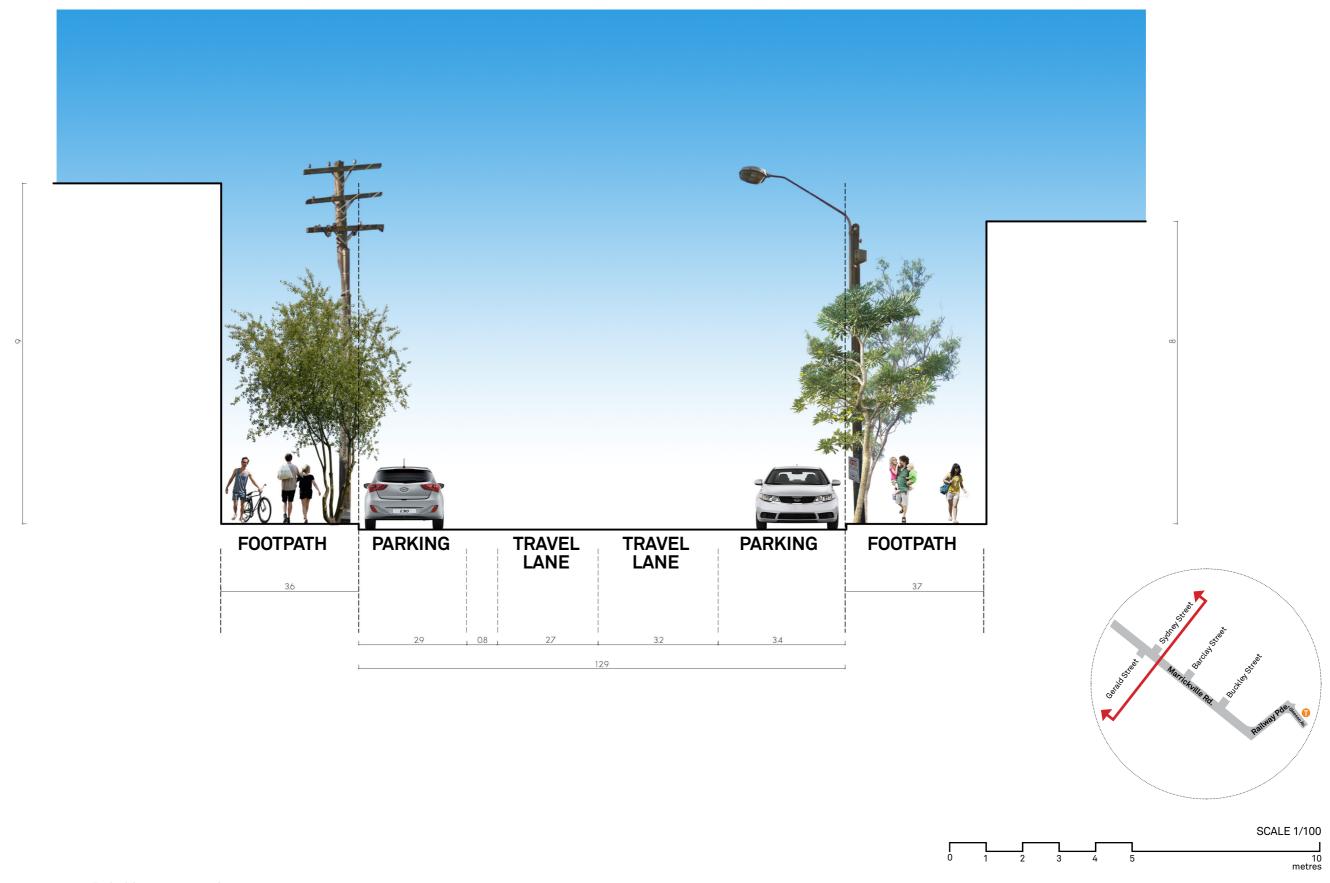
SCALE 1/100

EXISTING CONDITIONS Street Section 01_TWO-WAY STREET

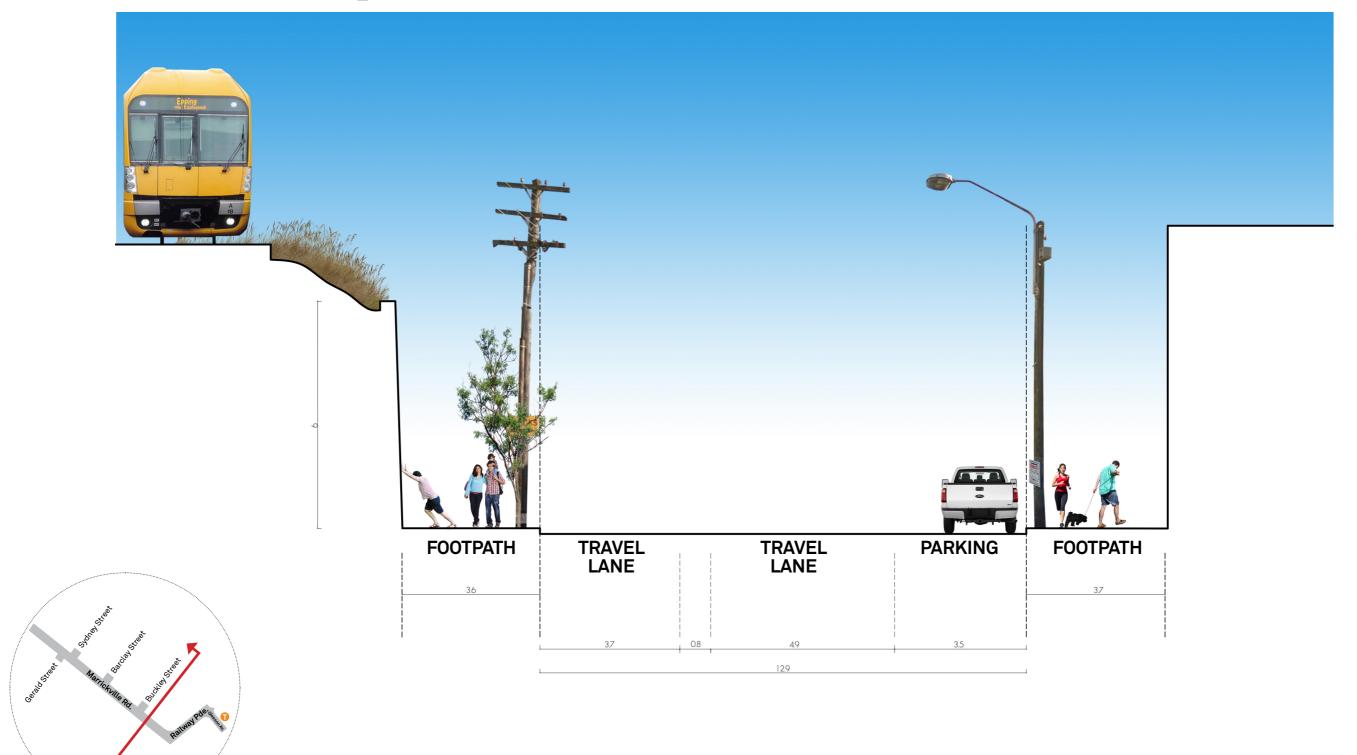


Marrickville Road East Streetscape Improvements

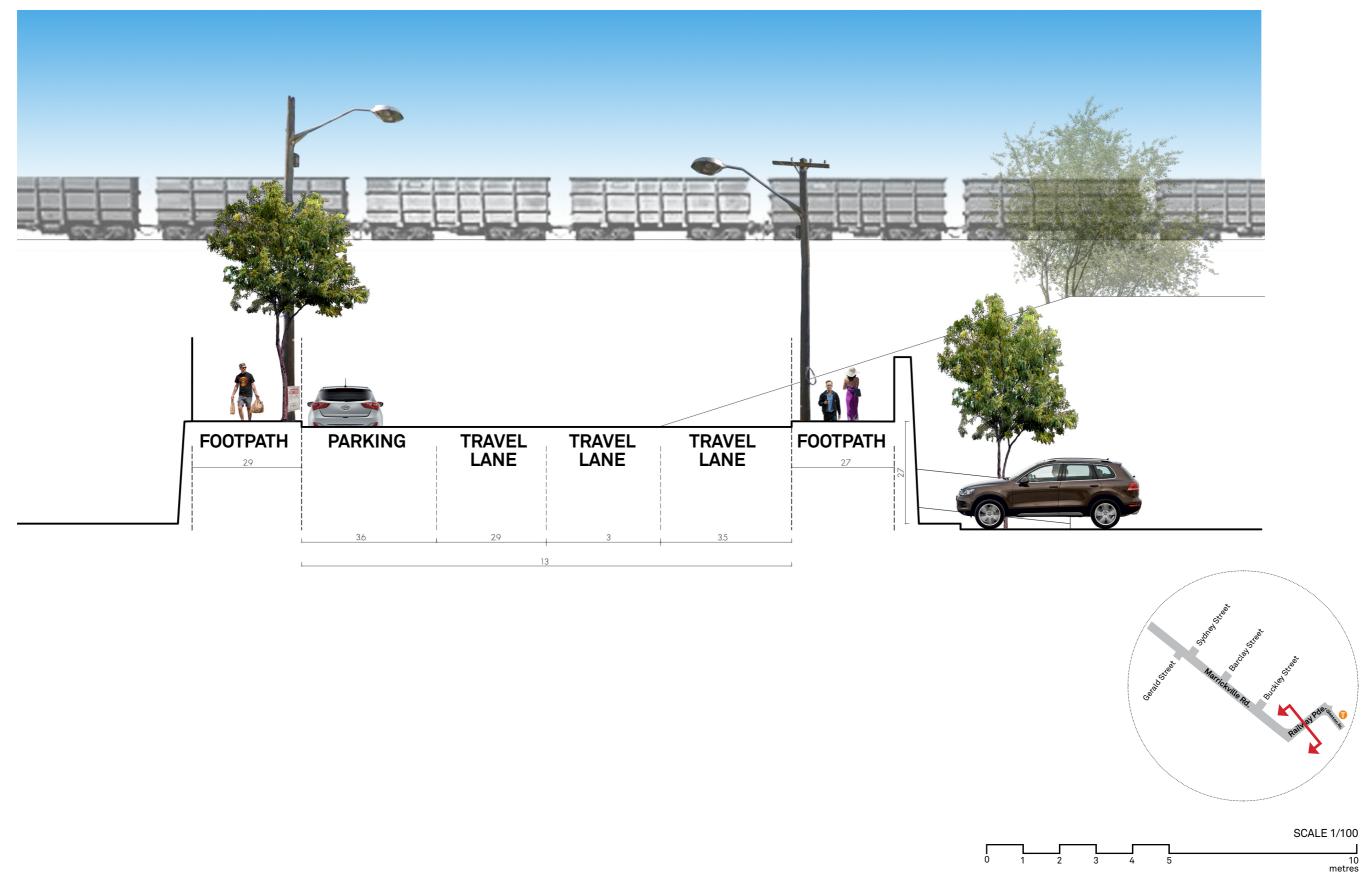
EXISTING CONDITIONS Street Section 02 _ TWO-WAY STREET



EXISTING CONDITIONS Street Section 03_ ONE-WAY STREET



EXISTING CONDITIONS Street Section 04 _ ONE-WAY STREET



Typical Streetscape section 04.

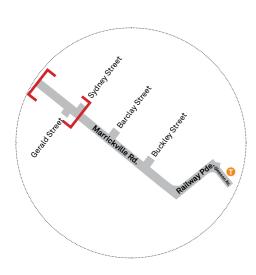
EXISTING PHOTO REPORT

Marrickville Road - Between Meeks Road and Sydney Street



Meeks and Marrickville Roads intersection Image taken from N-E corner

The existing conditions and use have been captured as a photo record over the following pages.









Marrickville Road's south side, close to Meeks Rd. Looking west.

EXISTING PHOTO REPORT Marrickville Road - Between Meeks Road and Sydney Street







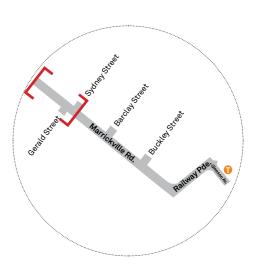
Marrickville Road. North side



Sydney Street. View from Marrickville Road.



From left to right, Sydney Street, Marrickville Road and Gerald Street



EXISTING PHOTO REPORT

Marrickville Road - Between Sydney Street and Barclay Street



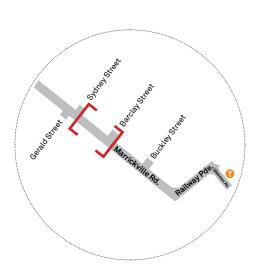
Marrickville Road's north side, close to Sydney Street Looking east



Pavement detail. Marrickville Road, north side.



Pavement detail. Marrickville Road, north side., close to Barclay St.





Marrickville Road's north side, existing bus stop. Footpath damaged by existing Eucalyptus Mannifera (high retention value).



Marrickville Road's north side, existing bus stop. Tactile indicators

56

EXISTING PHOTO REPORT Marrickville Road - Between Sydney Street and Barclay Street



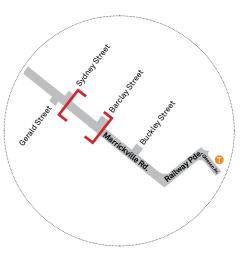
Marrickville Road's south side, close to Meeks Rd. Looking west.



Marrickville Road's north side, existing bus stop. View from Barclay St.



Barclay Street from Marrickville Road's corner



EXISTING PHOTO REPORT

Marrickville Road - Between Barclay Street and Railway Parade



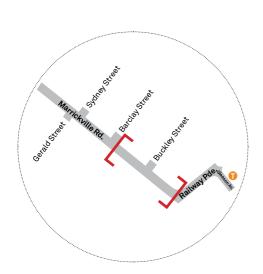
Marrickville Road's north side, close to Barclay Street Looking east



Marrickville Road, north side approaching Buckley Street.



Intersection between Marrickville Road and Buckley Street, Image taken from the south side..





Intersection between Marrickville Road and Buckley Street, Image taken from the north-west corner..



Heavy traffic entering Buckley Street from Marrickville Road. Image taken from the north-west corner..

5

EXISTING PHOTO REPORT Marrickville Road - Between Barclay Street and Railway Parade



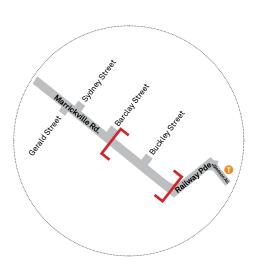
Marrickville Road's south side. Heritage listed retaining brick wall. Looking west



Marrickville Road's south side. Corner with Fraser Park's access lane



Intersection between Marrickville Road and Railway Parade, looking south.

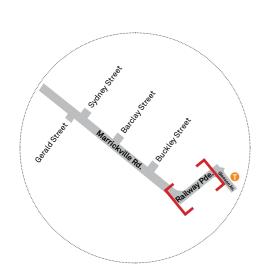


EXISTING PHOTO REPORT

Railway Parade - Between Marrickville Road and Gleeson Avenue



Railway Parade aspect from the intersection with Marrickville Road.





Railway Parade's lower end. Western footpath



Railway Parade's upper half. Western footpath

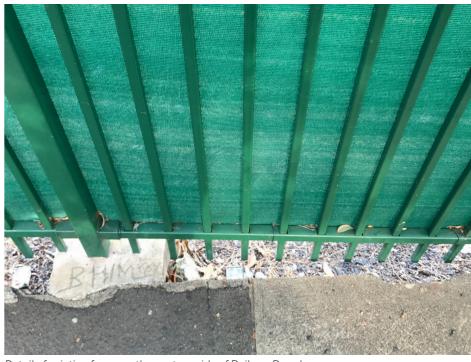
EXISTING PHOTO REPORT Railway Parade - Between Marrickville Road and Gleeson Avenue



Cyclist riding down the hill on the eastern side of Railway Parade.



Pedestrian walking down the hill on the eastern side of Railway Parade.



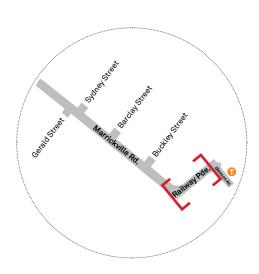
Detail of existing fence on the eastern side of Railway Parade.



Southernmost corner of Railway Parade.



Marrickville Road aspect from Railway Parade's lower end. Looking west.

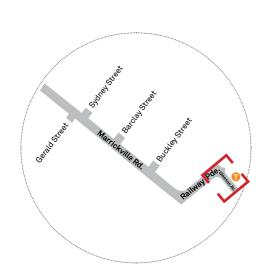


EXISTING PHOTO REPORT

Gleeson Avenue - Between Railway Parade and Burrows Avenue



Aspect of Sydenham Station and Gleeson Avenue from the intersection with Railway Parade.





Traffic lights and pedestrian crossing to access Sydenham Station from Railway Parade's west side.

Pedestrians crossing Gleeson Avenue from the south side in a non designated area.



EXISTING PHOTO REPORT Gleeson Avenue - Between Railway Parade and Burrows Avenue







Allocated bicycle racks, Sydenham Station's entry.



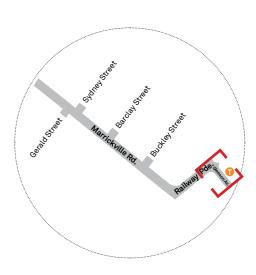
Pedestrian crossing Gleeson road towards Railway Parade.



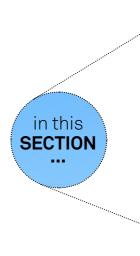
 $\label{thm:cond} \textit{Heavy traffic passing by Sydenham Station on Gleeson Road}$



A cyclist riding on the footpath entering Railway Parade from Gleeson Road..



03_community engagement





Community Engagement

03_ Community Engagement

Overview

The Marrickville Road East Master Plan project has required both internal (Council stakeholders) and external (Community Stakeholders) engagement. Public Domain Planning has acted to coordinate and spatially locate Council strategies within the road environment of Marrickville Road East while ensuring the plan is a shared vision between Council and the Community. The following diagrams summarises the process the team has undertaken to derive at project outcomes.

GROUP MANAGER INTERNAL ENGAGEMENT ENVIRONMENT WSUD **MANAGER INVEST & DESIGN BIODIVERSITY PLANNING** TRANSPORT PLANNING **WALKABLE STREETS COMMUNICATIONS ENGAGEMENT STRATEGIES** CIVIL RD. DESIGN **STANDARDS TREE EXTERNAL PUBLIC DOMAIN MANAGEMENT ENGAGEMENT PLANNING BIKEWAY PLANNING** COMMUNITY (concurrent project underway) **ENGAGEMENT** INFORMATION **ASSET PLANS** LIBRARY & FORWARD FINANCIAL PLAN **HISTORY HERITAGE** BUSINESS CORPORATE RMS + SYDNEY METRO **STRATEGY** ARTS &

Organisational chart featuring collaboration, information sharing and engagement.

PLANNING

DEPARTMENT OF

OWNERS

01_

02_

03_

CULTURE

MAINTENANCE

Engagement Diagram

Engagement approach

The community engagement approach considered the high levels of engagement that have recently occurred in Marrickville East. Therefore the engagement was via a simple online survey of seven questions that related to:

- > The purpose of why respondents use Marrickville Road East;
- > The transport mode to get to or from Marrickville Road;
- > When respondents use Marrickville Road East the most;
- > Respondents perception of safety along the streetscape;
- > Understanding any issues respondents have with their street environment; and
- > What streetscape pedestrian amenities items (trees, seating, bins etc.) need upgrading along Marrickville Road East.

Information was disseminated to the community via a number means including Inner West Courier, email, Council website and a letter box mail out. A total of 1440 residents received the letter box mail out, centred on the nearby streets extending to Sydenham Road and west to Illawarra Road.

All advertising material provided details for the Inner West Council 'Your Say Inner West' website. The site contained information outlining key dates, an overview of the project and a link to the online survey.

The your Say Inner West website received 100 visits to the Marrickville Road East survey page. From the 100 visits, 26 surveys were completed.

Engagement summary

The feedback received from the community has been summarised in the following list. Each section has the question asked with a number correlating to the number of times respondents selected the answer.

The reasons why people visit Marrickville Road East:

> Live in or near the area 20 > Travel through the area 23

Method of travel to visit Sydenham Station along Marrickville Road East:

	Day	Evening	Nigh
Walking	23	17	12
Vehicle	17	13	9
Bicycle	8	3	3

Purpose of visiting Marrickville Road East for respondents included:

	Day	Evening	Night
Walk along the street	19	17	10
Walking along the street with a stroller	6	1	0
Cycle along the street	11	4	3
Visit a local business	18	10	8
Visit Fraser Park	6	5	1
Visit for leisure purposes	10	8	8
Use the bus stops	14	10	4

Do respondents feel safe along the streetscape during the day?

Very safe 5 Quite safe 12 Ok 8

Do respondents feel safe along the streetscape at night?

Quite safe 6 Ok 11 Quite unsafe 6 Very unsafe 2

Common comments from respondents regarding safety:

_Respondents generally felt their personal safety (from attack by strangers) was good during the day, but had safety concerns about traffic and pedestrians / cyclists along the streets;

_Some respondents noted that the streets are not safe at night due to fast traffic; _Most respondents highlighted that at night the streets lack activation, casual surveillance and pedestrian lighting, which leads to the streets not feeling safe for street users.

What would respondents like to see improved along Marrickville Road East:

improved along Marrickville Road East.	Low priority	Moderate priority	High priorit
	Low priority	- Wiodorato priority	
More Sating	15	4	1
Better lighting	1	4	18
More bins	5	11	5
More shade	3	5	13
Greener streets	3	4	16
Drinking fountains	11	9	1
More public/street art	8	7	6
Better footpaths and kerb ramps	0	6	15
Safer pedestrian crossings	0	1	22
Cycle parking	4	6	11

The most commonly raised items to improve the streetscape environment include:

- > Provide traffic calming measures along the street;
- > Planting of shade trees and low plantings;
- > Provision of cycle infrastructure including bike racks and cycle lanes;
- > Additional pedestrian crossings across Marrickville Road East;
- > Footpath surfaces need to be improved, widened to provide a safe pedestrian environment; and
- > Provision of pedestrian lighting along the streets.

04_design principles





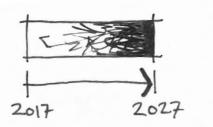
Design Principles

04_ Design Principles

Design Principles Explained

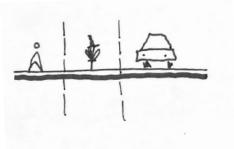
The Marrickville Road East Master Plan has been developed with the following eight design principles:

01.



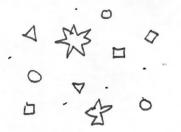
Implement project over time with new work to build on prior work. The master plan is a 10 year plan.

02.



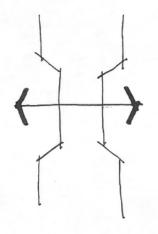
Provide safe separation of street

03.

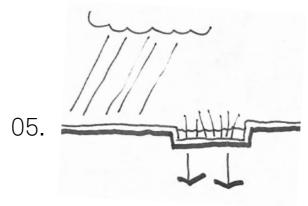


Maintain urban diversity and design with the existing industrial sense of place.

04.



Minimise pedestrian time in the road environment. Ensure sight lines are also maintained



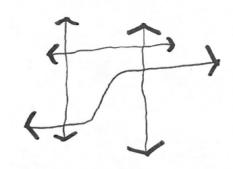
Maximise WSUD for stormwater treatment and infiltration.

06.



Maximise value for money.
Ensure street elements can be easily replaced and maintained.

07.

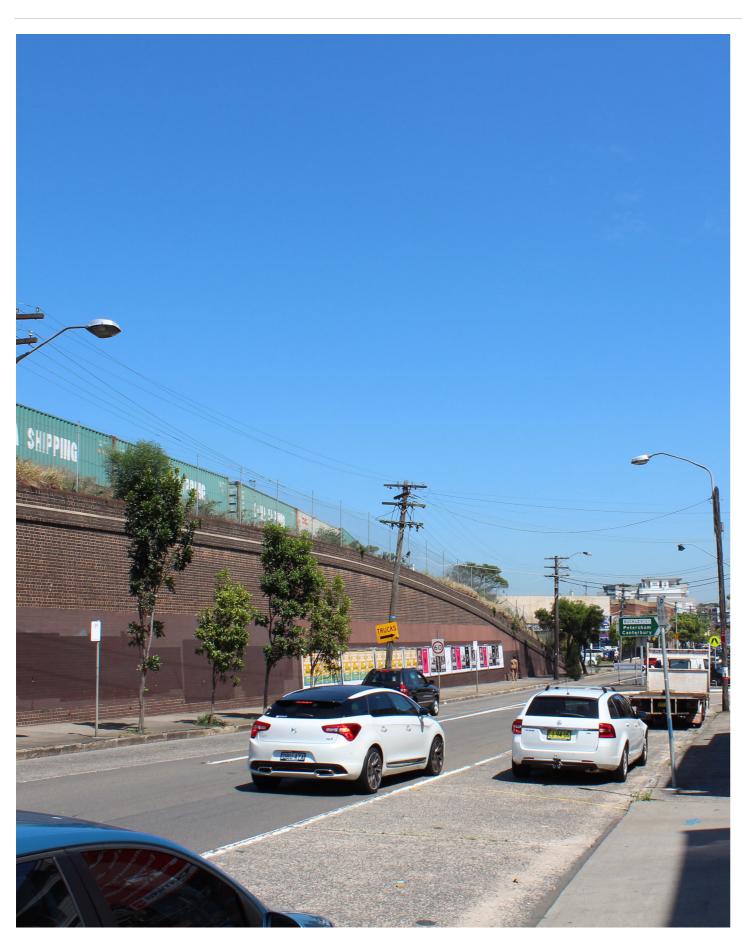


Provide for regional connections [pedestrian - bicycle - car - truck].

08.



Provide for change of land uses and street uses over time.



Design Objectives

Urban Cohesion

- the Marrickville town centre and Sydenham
- _Establish the urban infrastructure necessary for the establishment of the Sydenham creative hub;
- _Consolidate and promote multifunctional infrastructure along Marrickville Road East.

Placemaking

- _Engage with the community to identify and facilitate the improvement of key sites;
- _Explore cohesion strategies within the public climate where possible; realm to develop Marrickville Road East as a _Increase the urban tree canopy; key urban connector between the Marrickville _Establish green corridors; town centre and the Sydenham Station;
- _Provide distinct treatments for pedestrian and cycling areas;
- _Explore shade, shelter, finer grain lighting and seating opportunities.

Ground Plane

- _Simplify and consolidate ground plane finishes to maximise the perception of pedestrian safety;
- _Acknowledge climate through the reduction of asphalt where possible and the introduction of light colour schemes;
- _Explore street furniture as an integral part of the ground plane;
- _Reveal and de-clutter the street. Identify and eliminate fixed elements currently blocking the pedestrian flow;
- _Eliminate barriers and improve access and inclusion throughout;
- _Maximise softscape elements where practical.

- _Investigate opportunities to use canopy-like elements to bring cohesion and continuity from the Marrickville town centre precinct to Sydenham station;
- _Investigate opportunities to use vegetation within the streetscape to improve weather protection.

Public Art

- _Celebrate Marrickville Road East as a place through the arts and culture;
- _Engage with the local art and business community to adopt the Marrickville Public Art Strategy, 'People, Place + Art';
- _Consolidate an 'arts precinct' featuring temporary and permanent commissions in conjunction with the Sydenham Creative Hub; _Public domain as a 'canvas' for an active and vibrant street life.

Night Time Activation

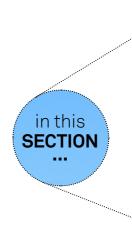
- _Facilitate and promote connectivity between _Facilitate business and street life for a night time economy;
 - _Further develop the fine grain of public street lighting systems;
 - _Explore strategies to embed lighting as an activation element.

Living Environment

- _Provide a public domain that helps enhance and develop native planting at all different
- _Factor and utilise vegetation to regulate

- _Incorporate WSUD rain gardens;

05_proposed design options





Design 73

05_ Design Options

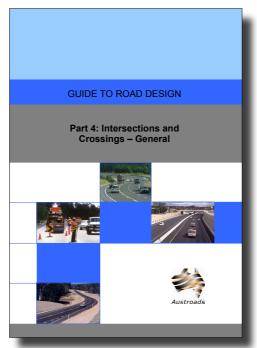
Engineering standards

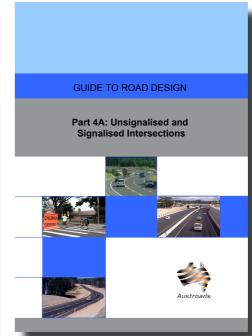
The design of the streetscape is based on engineering requirements, Council policy, Road Authority requirements and Australian Standards. The following are the minimum documents consulted:

- > Ausroads;
- > RMS Landscape Guidelines;
- > Australian Standards; > L.A.T.M. Parking numbers to remain the same; and
- > Marrickville Street Tree Master Plan

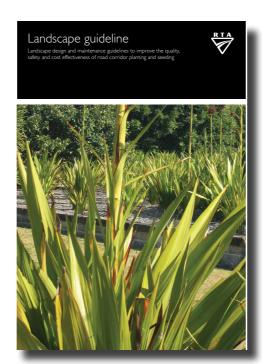
The master plan complies with all relevant standards and guidelines.

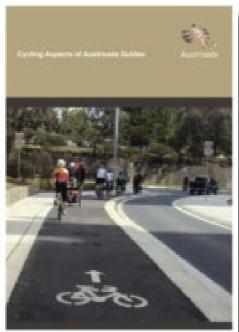














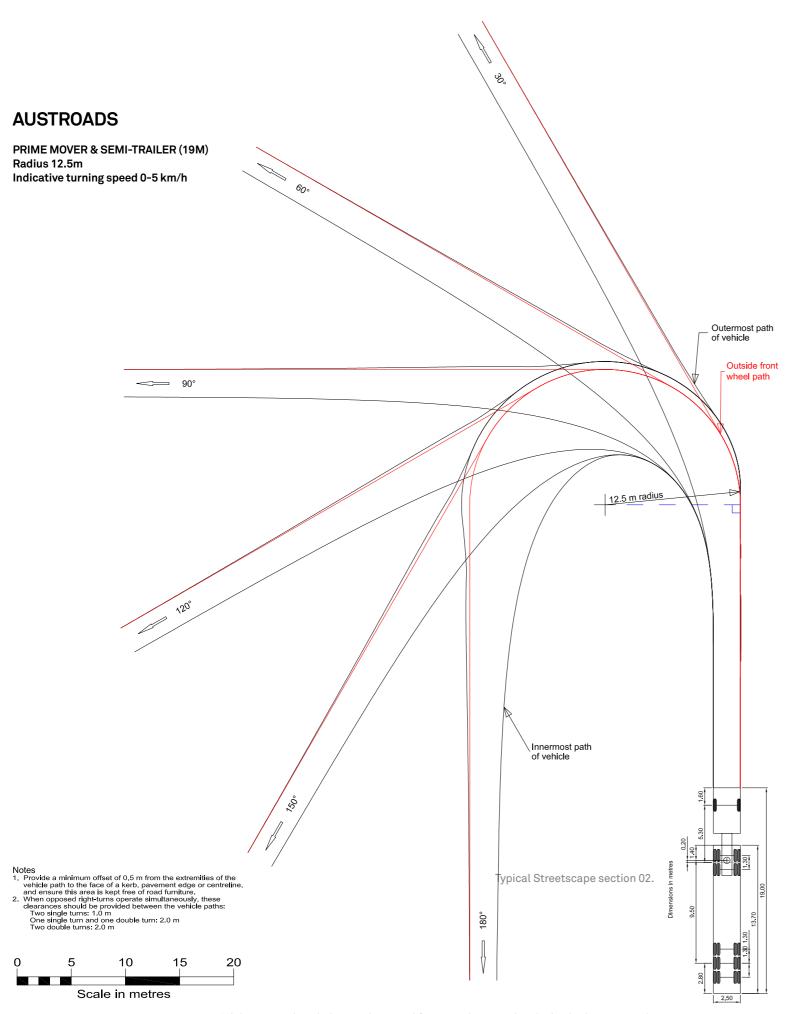
Exemplar list of some of the engineering standards the design team consulted with during the development of the mater plan.

Marrickville Road East Streetscape Improvements

05_ Design Options

Engineering standards

Engineering requirements have been reviewed by traffic engineers and submitted to Roads and Maritime Service (RMS) for in principle approval.



 $\label{thm:minimum} \mbox{Minimum turning circle template used for street intersection design in the master plan.}$

05_Design Options

Multiple design options have been considered. Each of the options have opportunities and constraints.

OPTION A_Marrickville Road_Discarded

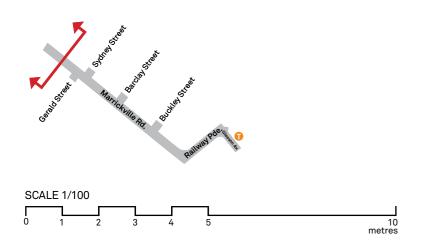
DISCUSSION

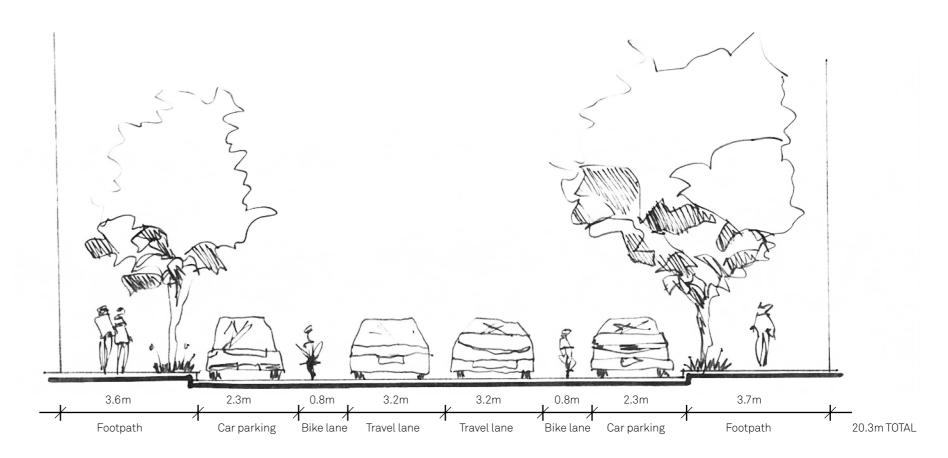
- > Retained kerb alignment, both side of Marrickville Road;
- > Many road and driveway crossings for northern cycle lane - major conflict with traffic movements;
- > Travel lanes width to RMS review; and
- > Generally no electrical cables to north side of street.

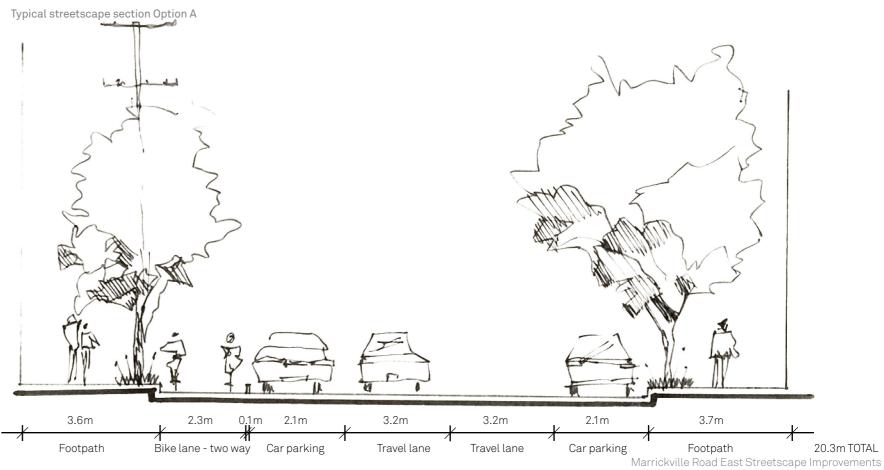
OPTION B_Marrickville Road_Discarded

DISCUSSION

- $\,>\!$ Fits within existing kerb line both sides of the street;
- > Separation between vehicles and car parking - not compliant with bikeway standards (min 0.4m);
- > Bikelanes below standards;
- > Travel lanes width to RMS review;
- > Generally no electrical cables to north side of street..







Typical streetscape section Option B

05_ Design Options

OPTION C_Marrickville Road_Discarded

DISCUSSION

> Share pathway along southern side of Marrickville Road;
> More generous parking widths;
> Travel lanes width to RMS review (travel lanes wider than other options 0.1m);
> Generally no electrical cables to north side of street.

OPTION D_Marrickville Road_Discarded

DISCUSSION

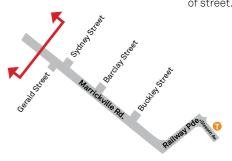
> Relocated kerbline to southern side of Marrickville Road;

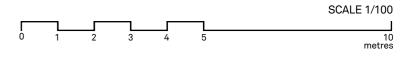
> Preference for bikelane on southern side of the street to avoid road intersections and

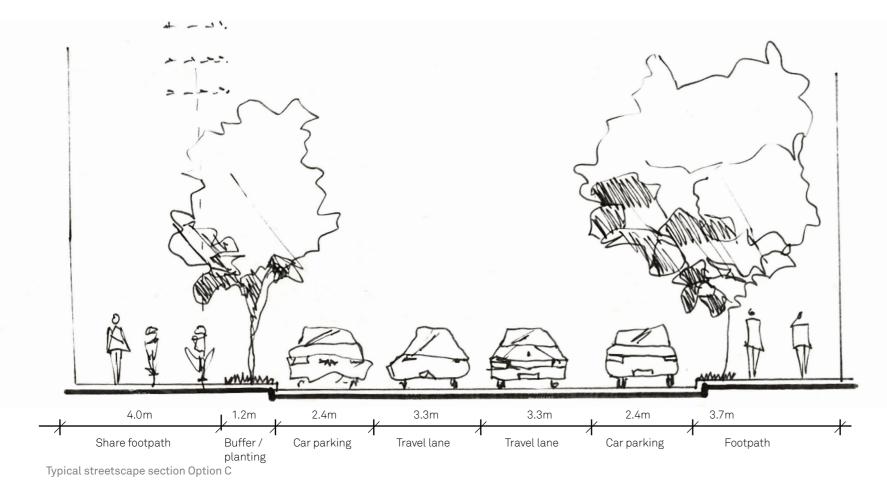
> Overhead electrical services require relocation to back of kerb;

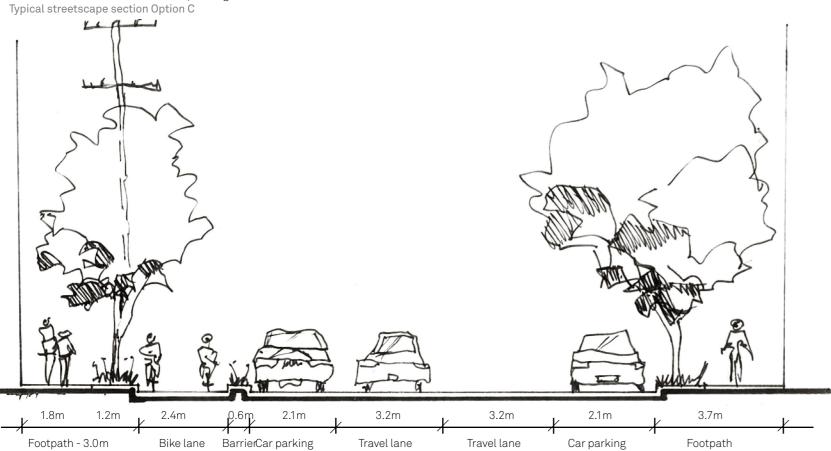
> Bikeways separation is more generous than standard:

> Travel lanes width to RMS review; and > Generally no electrical cables to north side

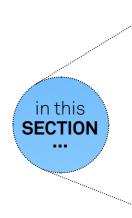








06_ master plan





Master Plan

General Plan

The master plan proposes a dedicated bike path along the southern side of Marrickville Road East, adjacent to the existing kerbline.

This will require the realigning of the kerbline along the northern side of the street in order to not lose parking availability.

New pavements are proposed in the street along with new street trees, raingardens and pedestrian amenity including pedestrian lighting, seats, bins and drink fountains.

The following pages and plans include:

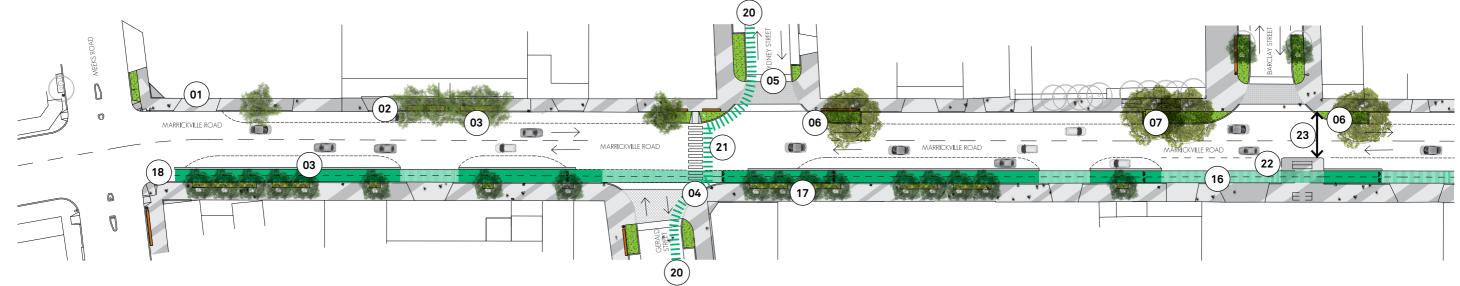
- _ General Plan highlighting the overall design for the streetscape including all proposed elements.
- _Trees outlines the proposed trees along the street. Species vary depending on specific context paying special attention to the retained overhead electrical infrastructure.
- _ Planting outlines the proposed grasses and understory planting. The planting response to aspect - sun and shade and location - raingardens and general verge
- _ Furniture and Finishes Articulates the proposed street furniture and pavement design along the street.

The following text and reference numbers correlate with the illustrative plan.

- **01** Existing driveway access points maintained.
- **02** Realign kerb line along northern street edge to widen the road environment allowing for bicycle lane to southern side of the street. Reinstall concrete paving and make good any damages.
- **03** Parallel parking retained.
- **04** Pedestrian priority crossing north south crossing point.
- 05 New pedestrian priority east west crossing points at each intersection.
- 06 New kerb blisters at each street intersection. Intersection geometry to allow for 19.0m turning vehicle. WSUD rain gardens integrated into each blister. Planting to be low grasses and groundcovers to maintain intersection sightlines.
- 07 Large existing Eucalypt tree retained. Additional groundcover planting with widened tree pit planting area.
- **08** New street tree planting with large spreading canopies along the northern road edge. The large canopies are allowed due to the lack of electricity infrastructure and aim to shade and cool the road surface. In ground lights to enhance the tree canopy at night producing street lighting to of a more human scale and improve the night time security in the area.

- **09** Kerb blisters to extend into side streets with the returns including WSUD rain
- 10 Mark precinct entry with significant tree planting - investigate species such as Ficus Rubiginosa.
- 11 Expand tree pits beneath existing and new tree plantings with native grasses and groundcovers.
- 12 Coordinate a pedestrian priority intersection with relevant agencies. Improve the pedestrian permeability of the intersection. Facilitate safe bicycle routes north-south along Railway Parade and east-west along Gleeson Avenue.
- 13 Provide new separated bicycle lane along 22 Bus stop to be redesigned. Railway Parade. Maintain car parking. Connect to future bike lanes on northern side of Railway Parade, across redesigned intersection.
- 14 Increase the available soil medium and groundcover planting with expanded tree pits along Marrickville Road East. Replace existing street trees with new trees.
- 15 Retain existing heritage wall. Install block / batten style seating for pedestrian seating opportunities. Liaise with wall owners and heritage to use the wall as a canvas for street art. Install in ground lights to enhance visual quality and improve night time casual surveillance around it.

- 16 Provide new separated bicycle lane along Marrickville Road East. Maintain car
- 17 Provide new pedestrian amenity items including seating, bins, and drink fountain.
- 18 Tie bicycle lane design into regional south cycle route.
- 19 Future bicycle connection north with regional bicycle route.
- 20 Existing bicycle north-south cycle route
- 21 New bicycle-pedestrian combined zebra crossing.
- Issues of accessibility and cycle path overlap to be resolved during detail design.
- 23 Possible new crossing point. Type and exact location to be specified in detail design.
- 24 Review intersection design to maximise pedestrian safety at crossing point.





Master Plan

Trees

Tree Species 01_Tristaniopsis Laurina Luscious -x34 new trees proposed 01





Tristaniopsis laurina

Common Names:

Water Gum

Family: MYRTACEAE

Origin: Eastern Australia

Typical Height: 7-10 metres

Typical Width:

5-6 metres

Typical Growth rate:

Moderate to fast.

Typical Habit:

Very hardy small sized native evergreen tree with a dense canopy.

Oblong glossy dark green leaves with a pale underside.

Flowers:

Nectar rich small yellow flowers in summer. Fruit:

Small round green fleshy fruit.

Site requirements:

Tolerates a wide range of soils in a full sun or part shade position.

Tree Species 02_ Lophostemon Confertus -x27 new trees proposed 02

Botanic Name: Lophostemon confertus Common Names: Brush Box

Family: MYRTACEAE

Origin: Eastern Australia north of Sydney

Typical Height:

15-20 metres

Typical Width:

8-12 metres

Typical Growth rate:

Typical Habit:

A tall, sturdy evergreen native tree with rough bark at the base and smooth pinkish bark above peeling in summer to reveal greenish cream new bark. A densely spreading crown with domed head.



Deep green, ovate to acuminate and 15cm long.

White, dainty, 5 petalled and fragrant flowers with long fluffy stamens appearing in spring. Fruit:

Small woody capsules.

Site requirements:

Sandy to medium soils in an open, sunny position, but tolerant of an extremely wide range of soils and conditions. Drought and frost tolerant.

Tree Species 03_ Ficus Microcarpa -x2 new trees proposed 03

Botanic Name:

Hill's Weeping Fig

Ficus Microcarpa var Hillii Common Names:

Family:

MORACEAE

Origin: Queensland

Typical Height: 15-30 metres

Typical Width:

15-20 metres

Typical Growth rate: Moderate.

Typical Habit:

An erect, sturdy native tree with a heavy dense crown. The main trunk is buttressed

Evergreen. Dark glossy green leaves above paler beneath, 8-12cm long and 3-4cm wide.

and sometimes aerial roots are produced.

Flowers:

Insignificant.

Fruit:

Small figs 7-10mm across, green at first then salmon-pink with greenish-yellow warts on the surface, ripen in March to April.

Site requirements:

Light to medium soils in an open, sunny position. Drought, frost and salt tolerant.

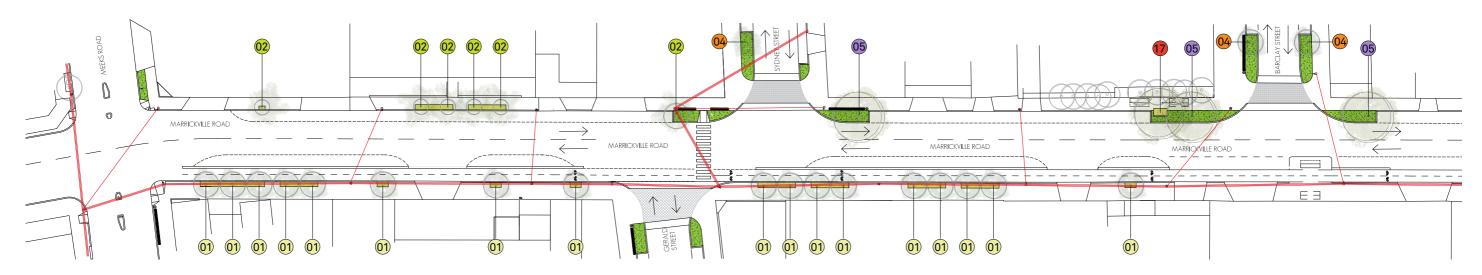












Trees

Existing Trees - TO BE RETAINED Tree Species 05_ Liriodendrum Tulipifera -x4 new trees proposed 05 Tree Species 04_ Angophora Costata -x3 new trees proposed 04 Botanic Name: Botanic Name: Liriodendron tulipifera Asset Number TRS28927 Angophora costata Common Names: Botanical Name Eucalyptus mannifera Common Names: Height 15m Tulip tree SYDENHAM STATION Sydney Red Gum/ Smooth Barked Apple Canopy Spread 44m Family: MAGNOLIACEAE DBH 60cm Origin: Age Mature MYRTACEAE North America Typical Height: Origin: 12-18 metres Asset Number TRS28895 Typical Width: Eastern Australia Botanical Name Lophostemon confertus 6-8 metres Height 3 Typical Height: Typical Growth rate: Canopy Spread 2 12-20 metres Moderate. DBH 12cm Typical Habit: Age Semi Mature Typical Width: Medium to large and columnar deciduous tree 10-13 metres with upright branching. Foliage: Asset Number TRS28889 Typical Growth rate: Distinctly shaped-four shallow lobed, mid to Botanical Name Lophostemon confertus Fast. lime green leaves up to 20cm long, turning to Height 4 a rich golden yellow in autumn. Canopy Spread 2 Typical Habit: DBH 8cm Tall native spreading tree with smooth pink Lightly fragrant, tulip shaped flowers, greenish Age Semi Mature bark and twisted, gnarled branches. yellow in colouring with orange markings, late spring to early summer. Only produces flowers if greater than 7 years. Asset Number TRS28886 Fruit: Light green, lanceolate and opposite leaves. Botanical Name Lophostemon confertus Samaras, borne in upright cone like clusters. Height 4 Site requirements: Canopy Spread 2 DBH 8cm White flowers occurring in large fluffy Moist, well drained soil in full sun locations. terminal clusters. Not tolerant of extreme or coastal exposure. Age Semi Mature Small ribbed woody capsules. NOTE All trees classified as low or medium retention value are to be removed. Site requirements: Prefers well drained to heavy soils in an open Refer to Tree Assessment Plan within the Site sunny position. Drought and frost resistant. Analysis section of this document (pages 42-43). LEGEND Existing Power Lines are **to be bundled** and are represented by Red Lines as shown below MARRICKVILLE ROAD MARRICKVILLE ROAD

Master Plan

01 01

01 01

01 01

Planting

Verge Gardens Proposed Species SUN SHADE (UNDER TREES) Bulbine bulbosa Christella dentata / many - smallish fern Lomandra longifolia / few - large tussock Goodenia hederacea / few - small shrub many - wildflower better mass planted Microlaea stipoides many - grass better mass planted Oplismenus aemulus / few - will spread Dianella caerulea Pimelea linifolia / few - small shrub Carpobrotus glaucescens - few - will Dichondra repens / few - will spread Pratia purpurescens / few - will spread Rytidosperma longifolia Dichelachne crinita Lomandra longifolia / few - large tussock Pelargonium australe / few_will spread Platysace lanceolata / few - small open shrub Hibbertia dentata / few - will spread Pratia purpurescens / few - will spread Rytidosperma longifolia Viola hederacea / few - will spread Hypolepis muelleri / few - will dominate Indigofera australis / few - small shrub Themeda triandra many - grass better mass planted Cymbopogon refractus Wahlenbergia stricta many - grass better mass planted many - wildflower better mass planted MARRICKVILLE ROAD MARRICKVILLE ROAD MARRICKVILLE ROAD

85

Planting WSUD Proposed Species IN SUN IN SHADE (UNDER TREES) Carex appressa / many - sedge/rush Lomandra longifolia Carex appressa / many - sedge/rush Carex fascicularis / most wet section only Dianella caerulea Carex breviculmis / many - sedge/rush Persicaria decipiens / few - flower accent Pratia purpurescens / few - will spread Schoenus apogon / many - sedge/rush Carex fascicularis / most wet section only Dichondra repens / few - will spread Ficinia nodosa / many sedge/rush Hibbertia scandens / few - will dominate Viola hederacea / few - will spread Juncus usitatus / many - sedge/rush Dianella caerulea Wahlenbergia gracilis / few - flower accent Dichondra repens / few - will spread Gahnia melanocarpa / few - large sedge Juncus kraussii / many - sedge/rush Hibbertia dentata / few - will spread Hydrocotyle peduncularis / few - will spread Isolepis inundata / many - sedge/rush Lomandra longifolia Juncus usitatus / many - sedge/rush Pratia purpurescens / few - will spread Schoenus apogon / many - sedge/rush Viola hederacea / few - will spread MARRICKVILLE ROAD MARRICKVILLE ROAD $\begin{tabular}{l} \leftarrow \end{tabular}$

Master Plan

Furniture and Finishes

01_Bike Lane Paint



Separated cycle connection

02_Concrete Pavement







Concrete pavement - to provide texture and variation. Pattern to be developed during detail design. Option for integrated artist to collaborate with landscape architect and maintenance teams.

03_Bike Rack



Stainless steel bike racks - as per the Council Design Guide

04_Drinking Fountain





08_Intersection WSUD

Planted raingardens at intersection provide separation for pedestrian and vehicles with green relief and water treatment. The intersections are based on 19.0m vehicle turns.



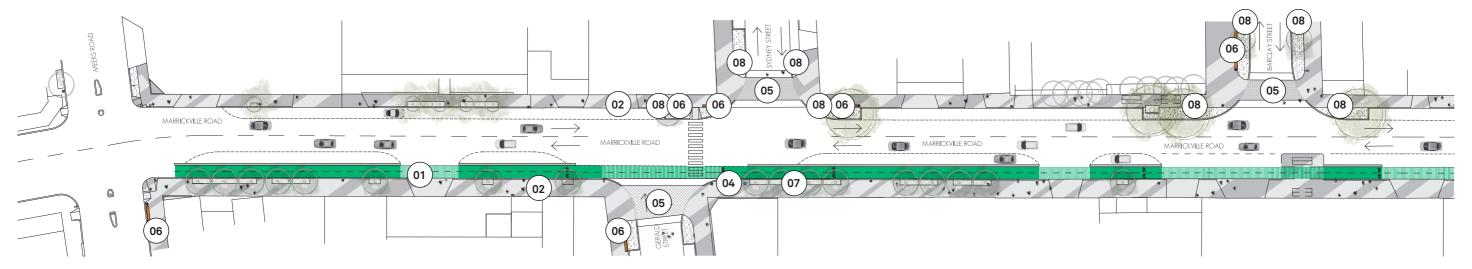
09_Street Lighting







New pedestrian lighting to provide a human scale along the street and improve safety in the area. Provide a combination of in-ground lighting to enhance trees with linear lighting projected on the ground from under side of benches and key locations such as brick heritage wall.



Marrickville Road East Streetscape Improvements



Master Plan

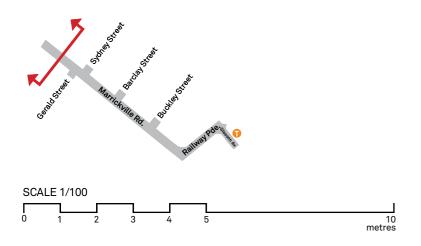
PROPOSED STREET SECTION_Marrickville Road

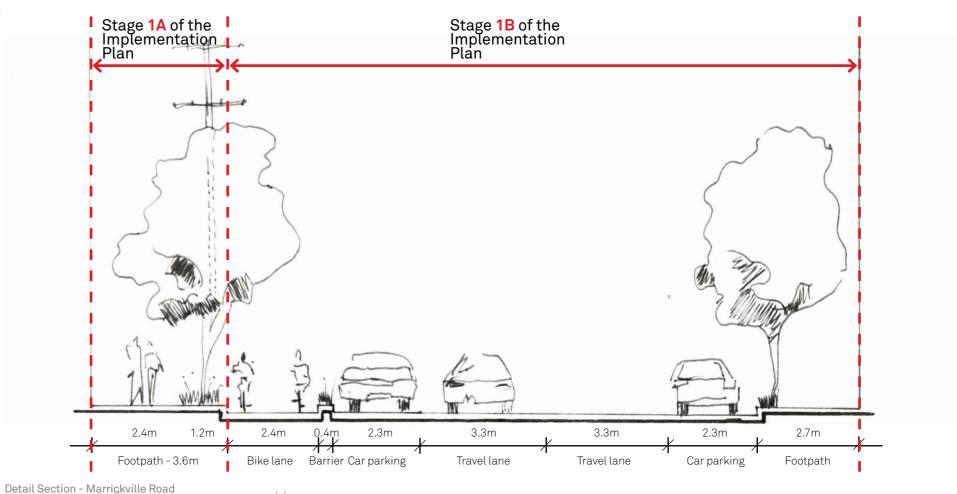
DISCUSSION

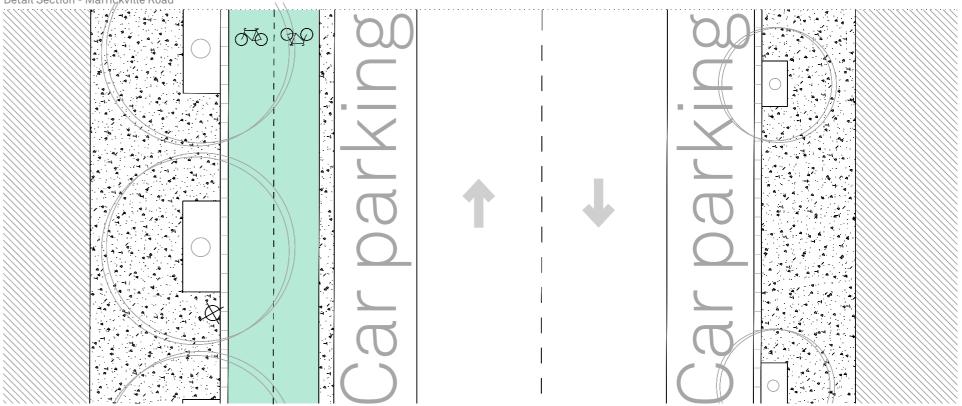
- > Retained kerbline to southern side of Marrickville Road;
- > Preference for bikelane on southern side of the street to avoid road intersections and driveways;
- > Overhead electrical services do not require relocation;
- > Minimum bike lane separation of 0.4m;
- > Travel lanes width to RMS review;
- > Narrowing of northern side of Marrickville Road facilitates truck access to side streets and warehouses; and
- > Generally no electrical cables to north side of street.

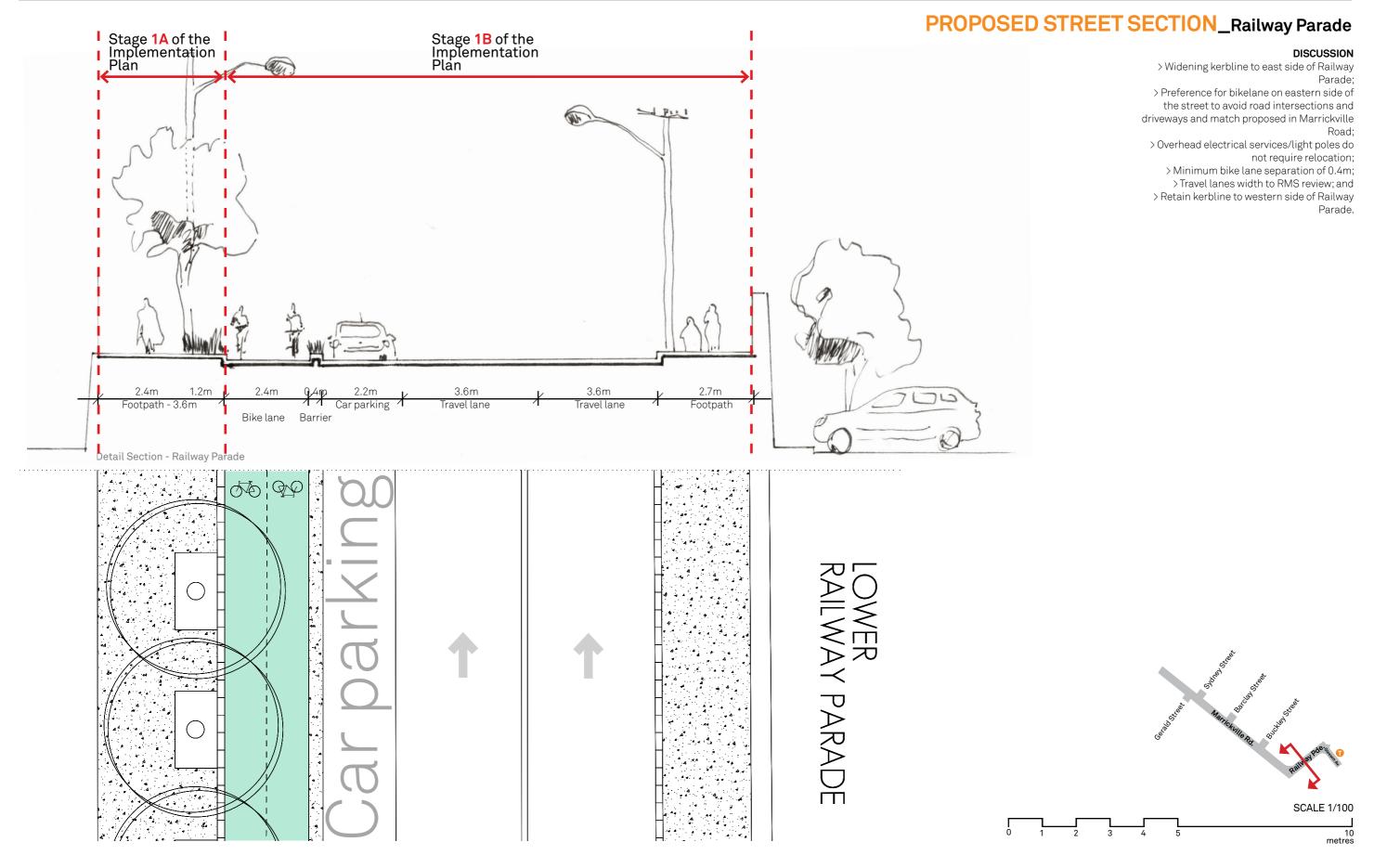
Plan - Marrickville Road

88





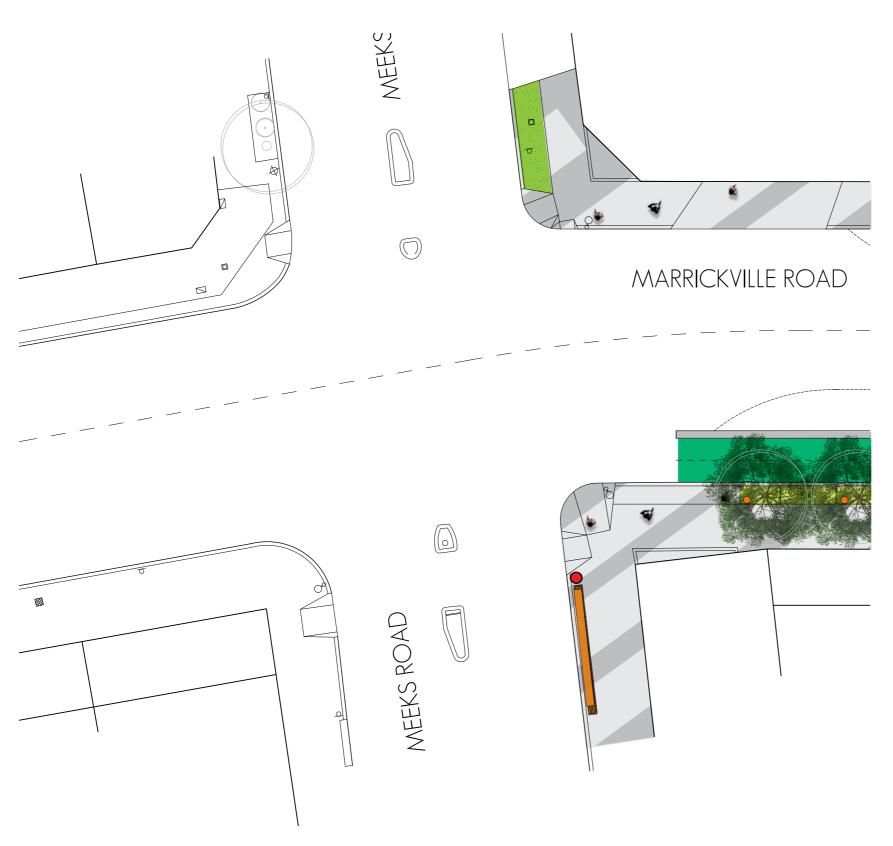




Master Plan Detail Plan - Railway Parade

STREET INTERSECTION

Marrickville Road & Meeks Road



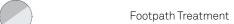
Legend

Verge Garden

Bench

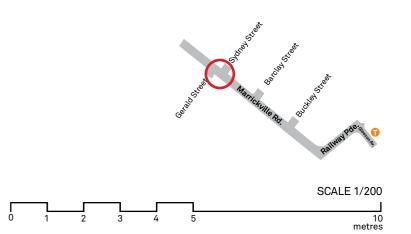










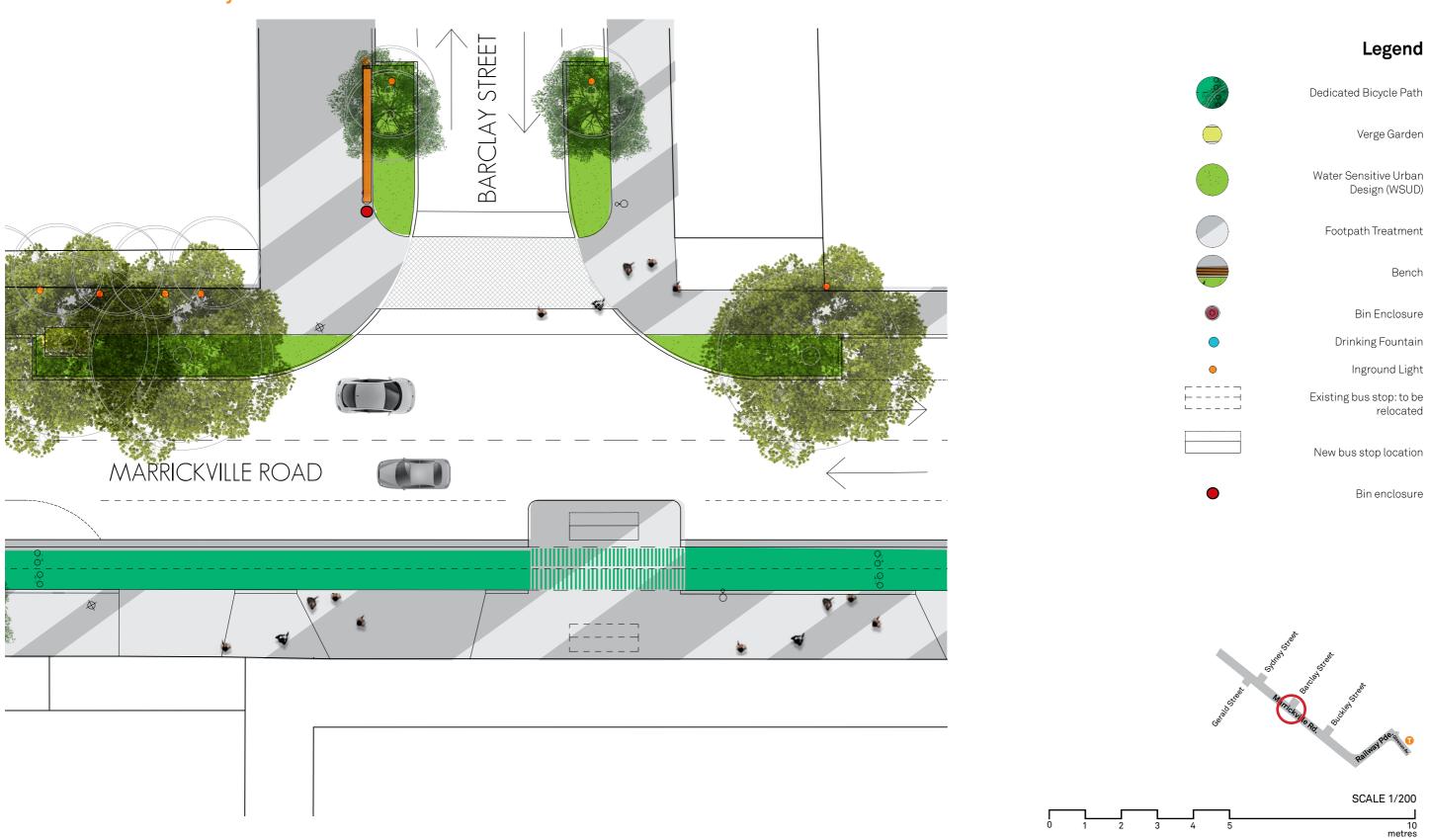


STREET INTERSECTION Marrickville Road & Sydney Street SYDNEY STREET Legend Dedicated Bicycle Path Verge Garden Water Sensitive Urban Design (WSUD) Footpath Treatment Bench Bin Enclosure Drinking Fountain Inground Light Bin Enclosure MARRICKVILLE ROAD SCALE 1/200 10 metres

Master Plan

STREET INTERSECTION

Marrickville Road & Barclay Street



STREET INTERSECTION

Marrickville Road & Buckley Street

Legend



Dedicated Bicycle Path



Verge Garden



Water Sensitive Urban Design (WSUD)



Footpath Treatment



Bin Enclosure

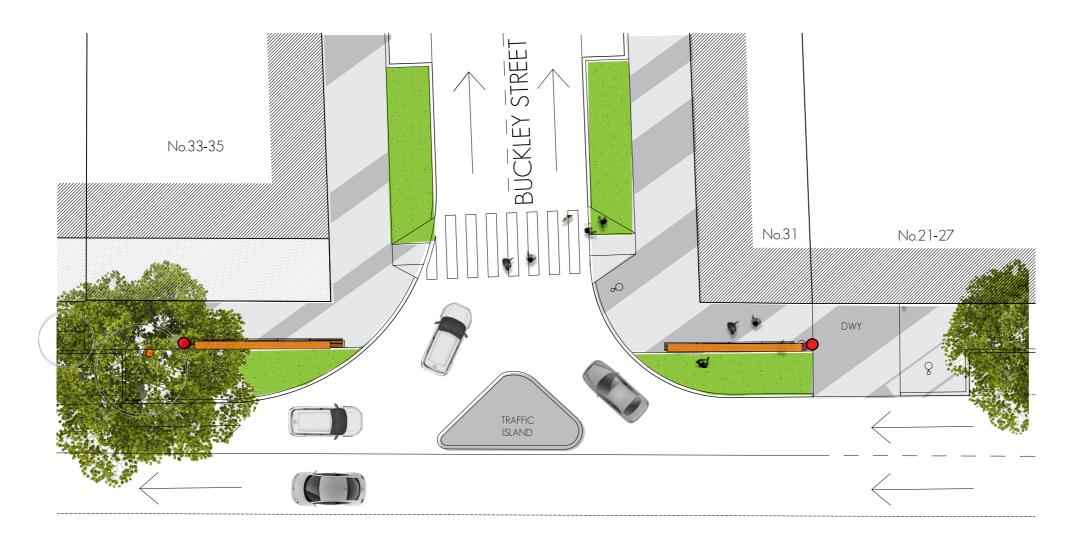
Bench

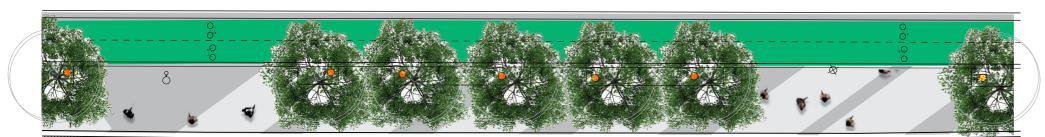


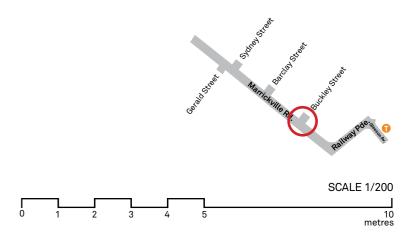
Drinking Fountain



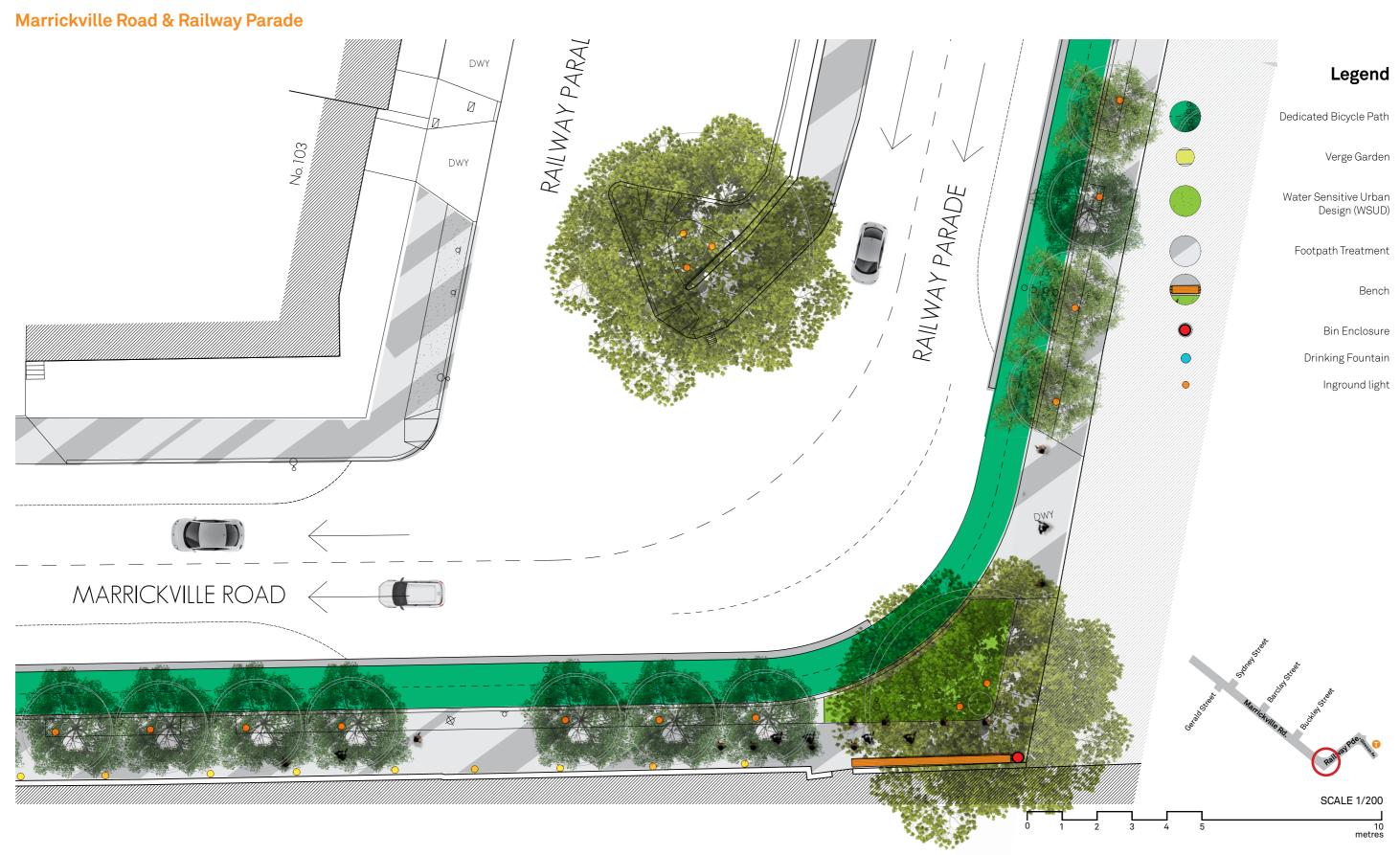
Inground Light





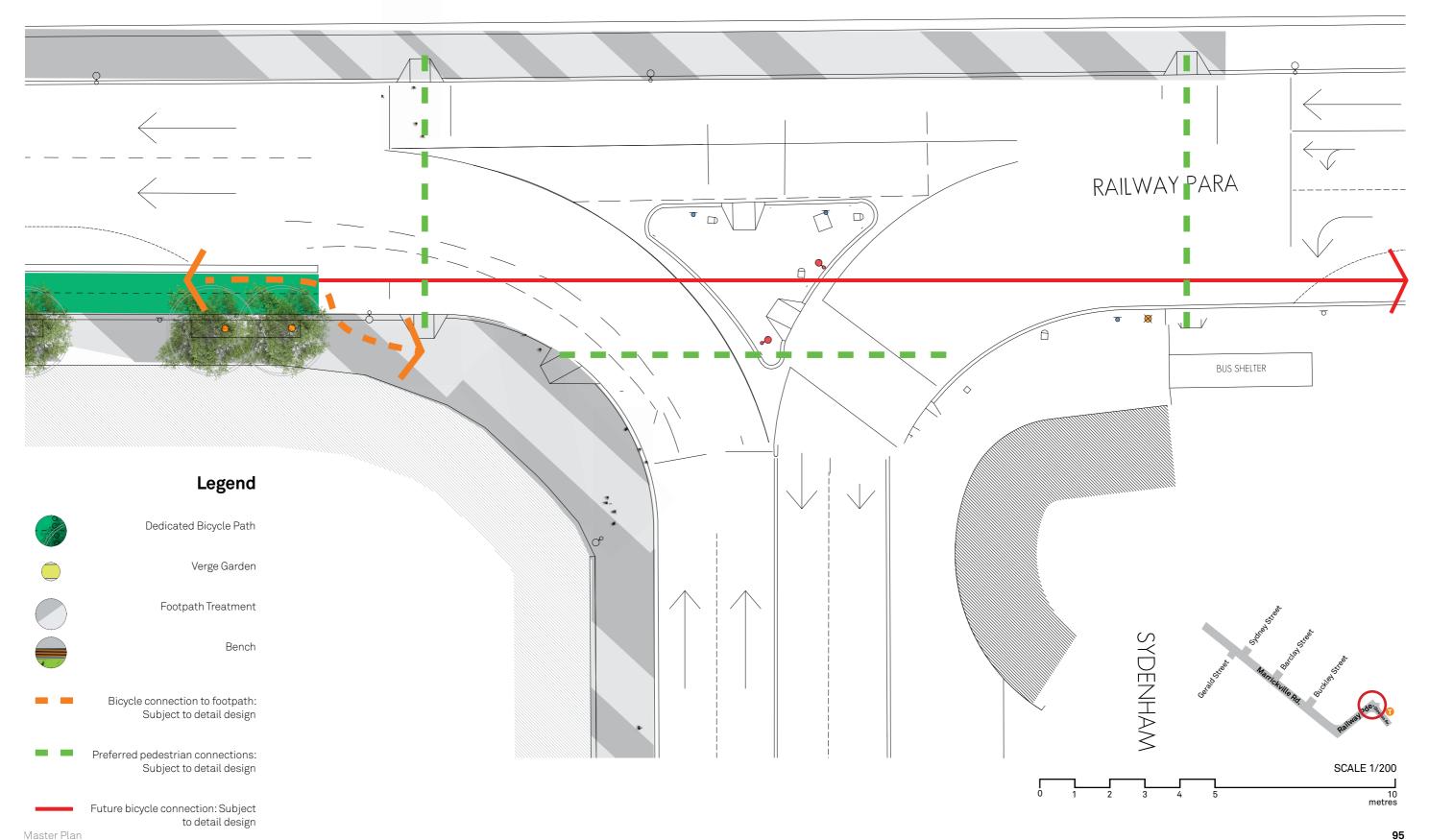


STREET INTERSECTION



STREET INTERSECTION

Railway Parade & Gleeson Avenue



07_ implementation plan





Implementation Plan

07_ Implementation Plan

Costing

The implementation plan is to guide the implementation and possible costs associated with the Marrickville Road East project. The implementation plan has been used to influence the long term Financial Plan

The street has been de-constructed with each construction element listed. Each listed item has a quantity provided, a unit rate, a cost rate and total costs.

The total overall costs are calculated as a subtotal and total which has contingencies included for staged delivery, project management and unforeseen costs.

ITEM NO.	ITEM DESCRIPTION	QUANTITY	UNIT	RATE	AMOUNT
KERB AND GUTTER		450.0		4450.00	A=0.00.0
A2a A4a	Concrete Kerb & gutter - 150mm high kerb (by hand) Concrete Median Island Kerb 150-200mm high on existing road pavement	450.0 430.0	m m	\$160.00 \$135.00	\$72,000.0 \$58,050.0
A6b	Sandstone Kerb on concrete base (install only)	284	m	\$265.00	\$75,260.0
7.00	Sandstone Ners on considere base (instantony)	20.		<u> </u>	<i>ψ, 3,200.0</i>
FOOTPATH & VEHICULAR CROSSING					
A7 A7a	Concrete Layback 4.5m long Concrete Layback reinforced (extra over above)	11.0 11.0	each each	\$905.00 \$520.00	\$9,955.0 \$5,720.0
A8	Concrete Kerb Ramp	12.0	each	\$1,090.00	\$13,080.0
A9c	Concrete Footpath 100mm thick (reinforced)	1100.0	m2	\$105.00	\$115,500.0
A17a	Footpath Tree Pit (expand existing and excavate 100mm)	12.0	m2	\$245.00	\$2,940.0
A17b	Footpath Tree Pit (new and mulch) 4.0m x 1.0m	234.0	m2	\$300.00	\$70,200.0
P19	Asphalt Footpath (50mm thick)	450.0	m2	\$135.00	\$60,750.0
MINOR TRAFFIC WORKS					
A1.1	Procurement of a Road Occupancy License from RMS/site.	1.0	Each	\$210.00	\$210.0
A1.2	Provision of traffic control staff, including all required signage and Traffic Control Plan	90	PP/Day	\$450.00	\$40,500.0
A14a	Island Infill: Concrete	90.0	m2	\$120.00	\$10,800.0
A15	Colour oxide surface finish (bikepath - 100% coverage - 1250m2)	1250.0	m2	\$50.00	\$62,500.0
A15 A15	Colour oxide surface finish (all three streets' footpaths - 100% coverage - south side) Colour oxide surface finish (all three streets' footpaths - 100% coverage - north side)	1750.0 1300.0	m2 m2	\$50.00 \$50.00	\$87,500.0 \$65,000.0
A10b	Concrete Vehicular Crossing: Heavy duty – 150mm thick concrete (40MPa).	266	m2	\$180.00	\$47,880.0
				7-22-22	7,555
TRAFFIC FACILITIES					-
P15a	Tactile Indicators (600mm wide SS) drilled in	74.0	m	\$780.00	\$57,720.0
P17a	Linemarking (lines)	1600.0	m	\$30.00	\$48,000.0
P17b C5a	Linemarking (symbols) Signage and Post Installation (Council supply) in grass	36.0 14.0	each each	\$170.00 \$160.00	\$6,120.0 \$2,240.0
C5b	Signage and Post Installation (Council supply) in grass Signage and Post Installation (Council supply) in concrete	20.0	each	\$185.00	\$3,700.0
	- 0 - 0 - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1		200.1	Ţ203.00	\$5,700.0
ASPHALT ROAD RESEALS	Andrell's Che Fatelith and	ļ	ļ	400.000	4=0
Q1	Asphalting Site Establishment Asphalting Subsequent site float fee	3	item shift	\$26,000.00	\$78,000.0
Q1a Q2	Asphalting Subsequent site float fee Asphalting Parking control fee (2 person team)	3	shift	\$13,000.00 \$2,200.00	\$39,000.0 \$6,600.0
Q2a	Asphalting Provision of additional traffic control staff (more than 2)	6	PP/shift	\$450.00	\$2,700.0
Q2b	Variable Message Sign	2	each/week	\$1,000.00	\$2,000.0
Q3a	Mill and fill (AC10 or AC14) 40mm Thick	5500.0	m2	\$16.00	\$88,000.0
STORMWATER WORKS	Description of a Double Common Lieuwe from DNAC faits	1.0		¢200.00	ć200.0
B1.1 B1.2	Procurement of a Road Occupancy License from RMS/site. Provision of traffic control staff, including all required signage and Traffic Control Plan	1.0	each each	\$390.00 \$645.00	\$390.0 \$645.0
B3c	Kerb Inlet Pit up to 1.8m deep (1.8m lintel)	6.0	each	\$3,950.00	\$23,700.0
B11e	Supply and Lay UPVC Pipes (300mm) avg. depth 1.2m	400.0	m	\$255.00	\$102,000.0
B13a	Subsoil pipe (600mm deep)	400.0	m	\$125.00	\$50,000.0
B13b	Subsoil pipe backfill (300m wide trench)	400.0	m	\$80.00	\$32,000.0
DEMOLITION WORKS					
C4a	Demolition: Footpath all types upto 100mm thick	1375.0	m2	\$40.00	\$55,000.0
0-10	Demondon. Footpath an types apto 200mm thick	1373.0	2	\$40.00	\$33,000.0
LANDSCAPING AND ANCILLARIES					
	Raingarden - Meeks Road Intersection - CAPEX	9.0	m2		\$74,699.00
	Raingarden - Sydney Rd/Gerald St Intersection - CAPEX	85.0	m2		\$167,459.00
	Raingarden - Barclay St Intersection - CAPEX Raingarden - Buckley St Intersection - CAPEX	100.0 85.0	m2		\$182,882.00 \$178,203.00
	Raingarden - Buckley St Intersection - CAPEX Raingarden - Railway Road Intersection - CAPEX	58.0	m2 m2		\$178,203.00
R4a	Tree removal (small)	46.0	each	\$250.00	\$11,500.0
R4b	Tree removal (large)	3.0	each	\$1,000.00	\$3,000.0
R5a	Supply and plant tube stock (native provenance, 6 per sqm) exc. Prep	54.0	m2	\$25.00	\$1,350.0
R5b	Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - South Side	47.0	each	\$1,250.00	\$58,750.0
R5b	Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side	21.0	each	\$1,250.00	\$26,250.0 \$60,000.0
	Supply and Install Inground Lights	120.0	each	\$500.00	0.000,000
STREET FURNITURE AND OTHER ASSOCIATED COSTS		1			-
	Supply and install - Public seating	36.0	each	\$2,000.00	\$72,000.0
	Supply and Install - Bicycle Racks	2.0	each	\$2,000.00	\$4,000.0
	Supply and Install - Bin Enclosures	8.0	each	\$3,000.00	\$24,000.0
	Supply and Install - Drink fountain	1.0	each	\$4,500.00	\$4,500.0
	Pedestrian wayfinding signage Bundling of Overhead Electrical Infrastucture - priced per span (pole to pole)	2.0 18.0	each each	\$7,000.00 \$8,000.00	\$14,000.0 \$144,000.0
	Public Art	10.0	PC SUM	20,000.00	\$100,000.0
	Repair Existing Concrete Pavement (south side only)		PC SUM		\$50,000.0
	Bus Shelter Relocation (both sides)		PC SUM		\$70,000.0
	Upgrade of non-compliant pedestrian refuge	-	PC SUM		\$20,000.0
	Service Realignment		PC SUM	,	\$130,000.0
		1		SUBTOTAL:	\$2,928,689
VARIATIONS					+-,520,003
C2a	Nightwork: concrete plant opening fee	1	each	\$2,415.00	\$2,415.0
C2b	Nightwork: additional loading	30	%	0.30	\$263,582.0
СЗа	Sundays and Public Holidays: concrete plant opening fee	1	each	\$2,930.00	\$2,930.0
СЗЬ	Sundays and Public Holidays: additional loading	10	%	0.33	\$97,623.0
	Small batch Supply and Install Overcost (0.5-1%)	1	PC SUM		\$38,707.0
SUPERVISION		100	DAY	\$250.00	\$25,000.0
		100	5/11	7230.00	923,000.0
CONTINGENCIES			ITEM	25%	\$732,172.3

Marrickville Road East Streetscape Improvements

Project 1A - Pavement and Street Tree/Furniture Improvements

ITEM NO.	ITEM DESCRIPTION	QUANTITY	UNIT	RATE	AMOUNT
FOOTPATH & VEHICULAR CROSSING					
A17a	Footpath Tree Pit (expand existing and excavate 100mm)	12.0	m2	\$245.00	\$2,940.0
A17b	Footpath Tree Pit (new and mulch) 4.0m x 1.0m	191.0	m2	\$300.00	\$57,300.0
MINOR TRAFFIC WORKS					
A1.2	Provision of traffic control staff, including all required signage and Traffic Control Plan	20	PP/Day	\$450.00	\$9,000.0
A15	Colour oxide surface finish (all three streets' footpaths - 100% coverage - south side)	1750.0	m2	\$50.00	\$87,500.0
A10b	Concrete Vehicular Crossing: Heavy duty – 150mm thick concrete (40MPa).	111	m2	\$180.00	\$19,980.0
				' ' ' ' '	, ,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,
TRAFFIC FACILITIES					
P15a	Tactile Indicators (600mm wide SS) drilled in	26.0	m	\$780.00	\$20,280.0
P17b	Linemarking (symbols)	4.0	each	\$170.00	\$680.0
C5a	Signage and Post Installation (Council supply) in grass	4.0	each	\$180.00	\$720.0
	- Control of the cont			' ' ' ' '	,
DEMOLITION WORKS					
C4a	Demolition: Footpath all types upto 100mm thick	500.0	m2	\$40.00	\$20,000.0
	The state of the s			' ' '	, ,,,,,,,
LANDSCAPING AND ANCILLARIES					
	Raingarden - Gerald St Intersection - CAPEX	25.0	m2		\$49,252.00
	Raingarden - Railway Road Intersection - CAPEX	40.0	m2		\$94,094.00
R4a	Tree removal (small)	41.0	each	\$250.00	\$10,250.0
R5a	Supply and plant tube stock (native provenance, 6 per sqm) exc. Prep	54.0	m2	\$25.00	\$1,350.0
R5b	Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - South Side	47.0	each	\$1,250.00	\$58,750.0
1135	Supply and Install Inground Lights	92.0	each	\$500.00	\$46,000.0
	Supply and historian Epines	32.0	cucii	\$300.00	ŷ 10,000.0
STREET FURNITURE AND OTHER ASSOCIATED COS	rs				
STREET FORMATIONE AND STREET ASSOCIATED COS	Supply and install - Public seating	16.0	each	\$2,000.00	\$32,000.0
	Supply and Install - Bicycle Racks	2.0	each	\$2,000.00	\$4,000.0
	Supply and Install - Bin Enclosures	4.0	each	\$3,000.00	\$12,000.0
	Supply and Install - Drink fountain	1.0	each	\$4,500.00	\$4,500.0
	Pedestrian wayfinding signage	2.0	each	\$7,000.00	\$14,000.0
	Public Art	2.0	PC SUM	\$1,000.00	\$65,000.0
	Repair Existing Concrete Pavement (south side only)		PC SUM		\$50,000.0
	Bus Shelter Relocation		PC SUM		\$35,000.0
	Bundling of Overhead Electrical Infrastucture - priced per span (pole to pole)	18.0	each	\$8,000.00	\$144,000.0
	building of Overhead Electrical Infrastacture - priced per spair (poic to poic)	10.0	Cucii	\$0,000.00	7144,000.0
				SUBTOTAL:	\$838,596
VARIATIONS				JODIOTAL.	,030,330
C2a	Nightwork: concrete plant opening fee	1	each	\$2,415.00	\$2,415.0
C2b	Nightwork: additional loading	30	%	0.30	\$75,473.6
C3a	Sundays and Public Holidays: concrete plant opening fee	1	each	\$2,930.00	\$2,930.0
C3b		10	%	0.33	\$2,930.0
ເວນ	Sundays and Public Holidays: additional loading	10	70	0.55	321,353.2
SUPERVISION		20	DAY	\$250.00	\$5,000.0
SUPERVISION		20	DAY	\$250.00	\$5,000.0
CONTINUEDICIES		1	ITEN 4	350/	¢200 C40 0
CONTINGENCIES		<u> </u>	ITEM	25%	\$209,649.0
					A
				TOTAL:	\$1,162,017

07_ Implementation Plan

Costing - Breakdown by Projects

The Master Plan has been broken down in 6 different projects to allow for flexibility in the budget allocation and execution of the proposed works.

Project 1A entails the south side of Marrickville Road and east of Railway Parade. The scope of works for this project involves no changes to the kerb lines.



Implementation Plan

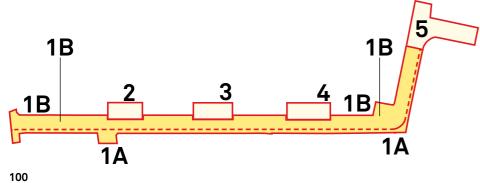
99

07_ Implementation Plan

Costing

Project 1B has the largest scope and budget allocation. It includes all proposals north of Marrickville Road's southern kerb line excepting the intersections with Sydney, Barclay and Buckley Streets.

The key project item includes a proposed bike lane and the realignment of Marrickville Road's northen kerb line



Project 1B - Bikelane, New Kerb and North Side of Road Improvements

ITEM NO.	ITEM DESCRIPTION	QUANTITY	UNIT	RATE	AMOUNT
KERB AND GUTTER					
A2a	Concrete Kerb & gutter - 150mm high kerb (by hand)	283.0	m	\$160.00	\$45,280.0
A4a	Concrete Median Island Kerb 150-200mm high on existing road pavement	430.0	m	\$135.00	\$58,050.0
A6b	Sandstone Kerb on concrete base (install only)	219	m	\$265.00	\$58,035.0
FOOTPATH & VEHICULAR CROSSING					
A7	Concrete Layback 4.5m long	11.0	each	\$905.00	\$9,955.0
A7a	Concrete Layback reinforced (extra over above)	11.0	each	\$520.00	\$5,720.0
A8	Concrete Kerb Ramp	12.0	each	\$1,090.00	\$13,080.0
А9с	Concrete Footpath 100mm thick (reinforced)	1100.0	m2	\$105.00	\$115,500.0
A17b	Footpath Tree Pit (new and mulch) 4.0m x 1.0m	43.0	m2	\$325.00	\$13,975.0
P19	Asphalt Footpath (50mm thick)	450.0	m2	\$135.00	\$60,750.0
				7 - 5 - 5 - 5 - 5 - 5 - 5 - 5 - 5 - 5 -	700,0000
MINOR TRAFFIC WORKS					
A1.1	Procurement of a Road Occupancy License from RMS/site.	1.0	Each	\$210.00	\$210.0
A1.2	Provision of traffic control staff, including all required signage and Traffic Control Plan	40	PP/Day	\$450.00	\$18,000.0
A14a	Island Infill: Concrete	90.0	m2	\$120.00	\$10,800.0
A15	Colour oxide surface finish (bikepath - 100% coverage - 1250m2)	1250.0	m2	\$50.00	\$62,500.0
A15	Colour oxide surface finish (all three streets' footpaths - 100% coverage - north side)	775.0	m2	\$50.00	\$38,750.0
TDAFFIC FACILITIES					
TRAFFIC FACILITIES	T .: . !: / COO ! . CO\ ! !! . !:	12.0		4700.00	40.000.0
P15a	Tactile Indicators (600mm wide SS) drilled in	12.0	m	\$780.00	\$9,360.0
P17a	Linemarking (lines)	1200.0	m	\$30.00	\$36,000.0
P17b	Linemarking (symbols)	48.0	each	\$170.00	\$8,160.0
C5a	Signage and Post Installation (Council supply) in grass	2.0	each	\$180.00	\$360.0
C5b	Signage and Post Installation (Council supply) in concrete	12.0	each	\$185.00	\$2,220.0
ASPHALT ROAD RESEALS					
Q1	Asphalting Site Establishment	3	item	\$26,000.00	\$78,000.0
Q1a	Asphalting Subsequent site float fee	3	shift	\$13,000.00	\$39,000.0
Q2	Asphalting Parking control fee (2 person team)	3	shift	\$2,200.00	\$6,600.0
Q2a	Asphalting Provision of additional traffic control staff (more than 2)	6	PP/shift	\$450.00	\$2,700.0
Q2b	Variable Message Sign		each/week	\$1,000.00	\$2,000.0
Q3a	Mill and fill (AC10 or AC14) 40mm Thick	5500.0		\$16.00	\$88,000.0
	The state of the s	3300.0		Ψ20.00	400,000.0
STORMWATER WORKS					
B1.1	Procurement of a Road Occupancy License from RMS/site.	1.0	each	\$390.00	\$390.0
B1.2	Provision of traffic control staff, including all required signage and Traffic Control Plan	1.0	each	\$645.00	\$645.0
B3c	Kerb Inlet Pit up to 1.8m deep (1.8m lintel)	6.0	each	\$3,950.00	\$23,700.0
B11e	Supply and Lay UPVC Pipes (300mm) avg. depth 1.2m	400.0	m	\$255.00	\$102,000.0
B13a	Subsoil pipe (600mm deep)	400.0	m	\$125.00	\$50,000.0
B13b	Subsoil pipe backfill (300m wide trench)	400.0	m	\$80.00	\$32,000.0
DEMOLITION WORKS					
	Demolition: Footpath all types upto 100mm thick	700.0	m2	\$40.00	\$28,000.0
	Demontion: Tootpath an types apto 100mm thick	700.0	1112	Ş+0.00	720,000.0
C4a					
	Raingarden - Meeks Road Intersection - CAPEX	9.0	m2		\$74,699.00
C4a	Raingarden - Railway Road Intersection - CAPEX	9.0 18.0	m2 m2		\$42,342.00
C4a	Raingarden - Railway Road Intersection - CAPEX Tree removal (small)		 	\$500.00	\$42,342.00 \$2,000.0
C4a LANDSCAPING AND ANCILLARIES	Raingarden - Railway Road Intersection - CAPEX	18.0	m2	\$500.00 \$1,000.00	\$42,342.00
C4a LANDSCAPING AND ANCILLARIES R4a	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side	18.0 4.0	m2 each		\$42,342.00 \$2,000.0
C4a LANDSCAPING AND ANCILLARIES R4a R4b	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large)	18.0 4.0 2.0	m2 each each	\$1,000.00	\$42,342.00 \$2,000.0 \$2,000.0
LANDSCAPING AND ANCILLARIES R4a R4b R5b	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side	18.0 4.0 2.0 21.0	m2 each each each	\$1,000.00 \$1,250.00	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0
C4a LANDSCAPING AND ANCILLARIES R4a R4b	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights	18.0 4.0 2.0 21.0	m2 each each each each	\$1,000.00 \$1,250.00	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0
LANDSCAPING AND ANCILLARIES R4a R4b R5b	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights Public Art	18.0 4.0 2.0 21.0	m2 each each each each	\$1,000.00 \$1,250.00	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0 \$35,000.0
LANDSCAPING AND ANCILLARIES R4a R4b R5b	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights Public Art Bus Shelter Relocation	18.0 4.0 2.0 21.0	m2 each each each each PC SUM PC SUM	\$1,000.00 \$1,250.00	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0 \$35,000.0
LANDSCAPING AND ANCILLARIES R4a R4b R5b	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights Public Art Bus Shelter Relocation Upgrade of non-compliant pedestrian refuge	18.0 4.0 2.0 21.0	m2 each each each each PC SUM PC SUM PC SUM	\$1,000.00 \$1,250.00	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0 \$35,000.0 \$35,000.0 \$20,000.0
LANDSCAPING AND ANCILLARIES R4a R4b R5b	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights Public Art Bus Shelter Relocation	18.0 4.0 2.0 21.0	m2 each each each each PC SUM PC SUM	\$1,000.00 \$1,250.00	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0 \$35,000.0
LANDSCAPING AND ANCILLARIES R4a R4b R5b	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights Public Art Bus Shelter Relocation Upgrade of non-compliant pedestrian refuge	18.0 4.0 2.0 21.0	m2 each each each each PC SUM PC SUM PC SUM	\$1,000.00 \$1,250.00 \$500.00	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0 \$35,000.0 \$35,000.0 \$20,000.0
LANDSCAPING AND ANCILLARIES R4a R4b R5b	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights Public Art Bus Shelter Relocation Upgrade of non-compliant pedestrian refuge	18.0 4.0 2.0 21.0	m2 each each each each PC SUM PC SUM PC SUM	\$1,000.00 \$1,250.00	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0 \$35,000.0 \$35,000.0 \$20,000.0
LANDSCAPING AND ANCILLARIES R4a R4b R5b STREET FURNITURE AND OTHER ASSOCIATED COSTS	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights Public Art Bus Shelter Relocation Upgrade of non-compliant pedestrian refuge Service Realignment Nightwork: concrete plant opening fee	18.0 4.0 2.0 21.0 16.0	m2 each each each each PC SUM PC SUM PC SUM PC SUM PC SUM	\$1,000.00 \$1,250.00 \$500.00 \$500.00	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0 \$35,000.0 \$35,000.0 \$130,000.0 \$1,395,031 \$2,415.0
LANDSCAPING AND ANCILLARIES R4a R4b R5b STREET FURNITURE AND OTHER ASSOCIATED COSTS VARIATIONS	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights Public Art Bus Shelter Relocation Upgrade of non-compliant pedestrian refuge Service Realignment Nightwork: concrete plant opening fee Nightwork: additional loading	18.0 4.0 2.0 21.0 16.0	m2 each each each each PC SUM PC SUM PC SUM PC SUM	\$1,000.00 \$1,250.00 \$500.00 \$500.00 SUBTOTAL:	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0 \$35,000.0 \$35,000.0 \$130,000.0 \$1,395,031 \$2,415.0 \$125,552.8
C4a LANDSCAPING AND ANCILLARIES R4a R4b R5b STREET FURNITURE AND OTHER ASSOCIATED COSTS VARIATIONS C2a C2b C3a	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights Public Art Bus Shelter Relocation Upgrade of non-compliant pedestrian refuge Service Realignment Nightwork: concrete plant opening fee Nightwork: additional loading Sundays and Public Holidays: concrete plant opening fee	18.0 4.0 2.0 21.0 16.0	m2 each each each PC SUM PC SUM PC SUM PC SUM PC SUM PC SUM	\$1,000.00 \$1,250.00 \$500.00 \$500.00 \$UBTOTAL: \$2,415.00 0.30 \$2,930.00	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0 \$35,000.0 \$35,000.0 \$130,000.0 \$1,395,031 \$2,415.0 \$125,552.8 \$2,930.0
C4a LANDSCAPING AND ANCILLARIES R4a R4b R5b STREET FURNITURE AND OTHER ASSOCIATED COSTS VARIATIONS C2a C2b	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights Public Art Bus Shelter Relocation Upgrade of non-compliant pedestrian refuge Service Realignment Nightwork: concrete plant opening fee Nightwork: additional loading	18.0 4.0 2.0 21.0 16.0	m2 each each each each PC SUM PC SUM PC SUM PC SUM PC SUM	\$1,000.00 \$1,250.00 \$500.00 \$500.00 SUBTOTAL:	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0 \$35,000.0 \$35,000.0 \$130,000.0 \$1,395,031 \$2,415.0 \$125,552.8
C4a LANDSCAPING AND ANCILLARIES R4a R4b R5b STREET FURNITURE AND OTHER ASSOCIATED COSTS VARIATIONS C2a C2b C3a C3b	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights Public Art Bus Shelter Relocation Upgrade of non-compliant pedestrian refuge Service Realignment Nightwork: concrete plant opening fee Nightwork: additional loading Sundays and Public Holidays: concrete plant opening fee	18.0 4.0 2.0 21.0 16.0 16.0	m2 each each each PC SUM	\$1,000.00 \$1,250.00 \$500.00 \$500.00 \$500.00 \$2,415.00 0.30 \$2,930.00 0.33	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0 \$35,000.0 \$35,000.0 \$130,000.0 \$1,395,031 \$2,415.0 \$125,552.8 \$2,930.0 \$46,501.0
LANDSCAPING AND ANCILLARIES R4a R4b R5b STREET FURNITURE AND OTHER ASSOCIATED COSTS VARIATIONS C2a C2b C3a	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights Public Art Bus Shelter Relocation Upgrade of non-compliant pedestrian refuge Service Realignment Nightwork: concrete plant opening fee Nightwork: additional loading Sundays and Public Holidays: concrete plant opening fee	18.0 4.0 2.0 21.0 16.0	m2 each each each PC SUM PC SUM PC SUM PC SUM PC SUM PC SUM	\$1,000.00 \$1,250.00 \$500.00 \$500.00 \$UBTOTAL: \$2,415.00 0.30 \$2,930.00	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0 \$35,000.0 \$35,000.0 \$130,000.0 \$1,395,031 \$2,415.0 \$125,552.8 \$2,930.0
LANDSCAPING AND ANCILLARIES R4a R4b R5b STREET FURNITURE AND OTHER ASSOCIATED COSTS VARIATIONS C2a C2b C3a C3b	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights Public Art Bus Shelter Relocation Upgrade of non-compliant pedestrian refuge Service Realignment Nightwork: concrete plant opening fee Nightwork: additional loading Sundays and Public Holidays: concrete plant opening fee	18.0 4.0 2.0 21.0 16.0 16.0	m2 each each each PC SUM	\$1,000.00 \$1,250.00 \$500.00 \$500.00 \$500.00 \$2,415.00 0.30 \$2,930.00 0.33	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0 \$35,000.0 \$35,000.0 \$130,000.0 \$1,395,031 \$2,415.0 \$125,552.8 \$2,930.0 \$46,501.0
C4a LANDSCAPING AND ANCILLARIES R4a R4b R5b STREET FURNITURE AND OTHER ASSOCIATED COSTS VARIATIONS C2a C2b C3a C3b SUPERVISION	Raingarden - Railway Road Intersection - CAPEX Tree removal (small) Tree removal (large) Supply, install and maintain (6 months) trees (native provenance, 100L) exc. Prep - North Side Supply and Install Inground Lights Public Art Bus Shelter Relocation Upgrade of non-compliant pedestrian refuge Service Realignment Nightwork: concrete plant opening fee Nightwork: additional loading Sundays and Public Holidays: concrete plant opening fee	18.0 4.0 2.0 21.0 16.0 16.0	m2 each each each PC SUM	\$1,000.00 \$1,250.00 \$500.00 \$500.00 \$500.00 \$2,415.00 0.30 \$2,930.00 0.33 \$250.00	\$42,342.00 \$2,000.0 \$2,000.0 \$26,250.0 \$8,000.0 \$35,000.0 \$35,000.0 \$130,000.0 \$1,395,031 \$2,415.0 \$125,552.8 \$2,930.0 \$46,501.0

Marrickville Road East Streetscape Improvements

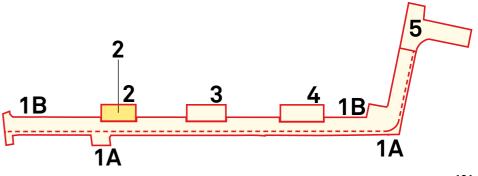
Project 2 - Intersection \$ WSUD upgrade 1

ITEM NO.	ITEM DESCRIPTION	QUANTITY	UNIT	RATE	AMOUNT
KERB AND GUTTER					
A2a	Concrete Kerb & gutter - 150mm high kerb (by hand)	52.0	m	\$160.00	\$8,320.0
A4a	Concrete Median Island Kerb 150-200mm high on existing road pavement	25.0	m	\$150.00	\$3,750.0
MINOR TRAFFIC WORKS					
A1.2	Provision of traffic control staff, including all required signage and Traffic Control Plan	10	PP/Day	\$450.00	\$4,500.0
A15	Colour oxide surface finish (all three streets' footpaths - 100% coverage - north side)	158.0	m2	\$50.00	\$7,900.0
A10b	Concrete Vehicular Crossing: Heavy duty – 150mm thick concrete (40MPa).	80	m2	\$180.00	\$14,400.0
TRAFFIC FACILITIES					
P15a	Tactile Indicators (600mm wide SS) drilled in	8.0	m	\$780.00	\$6,240.0
P17b	Linemarking (symbols)	2.0	each	\$170.00	\$340.0
C5a	Signage and Post Installation (Council supply) in grass	3.0	each	\$180.00	\$540.0
C5b	Signage and Post Installation (Council supply) in concrete	2.0	each	\$205.00	\$410.0
DEMOLITION WORKS					
C4a	Demolition: Footpath all types upto 100mm thick	25.0	m2	\$45.00	\$1,125.0
LANDSCAPING AND ANCILLARIES					
Databook into Auto Partoles unes	Raingarden - Sydney St Intersection - CAPEX	60.0	m2		\$118,206.00
R4a	Tree removal (small)	1.0	each	\$500.00	\$500.0
R4b	Tree removal (large)	1.0	each	\$1,000.00	\$1,000.0
20.00	Supply and Install Inground Lights	2.0	each	\$500.00	\$1,000.0
STREET FURNITURE AND OTHER ASSOCIATED COSTS					
	Supply and install - Public seating	8.0	each	\$2,000.00	\$16,000.0
	Supply and Install - Bin Enclosures	2.0	each	\$3,000.00	\$6,000.0
	TOPP TO THE PROPERTY OF THE PR			12,222	7 - 7 - 2 - 2
			•	SUBTOTAL:	\$190,231
VARIATIONS					
C2a	Nightwork: concrete plant opening fee	1	each	\$2,415.00	\$2,415.0
C2b	Nightwork: additional loading	30	%	0.30	\$17,120.8
C3a	Sundays and Public Holidays: concrete plant opening fee	1	each	\$2,930.00	\$2,930.0
C3b	Sundays and Public Holidays: additional loading	10	%	0.33	\$6,341.0
SUPERVISION		10	DAY	\$250.00	\$2,500.0
CONTINGENCIES			ITEM	25%	¢47 EF7 0
CONTINUENCIES			ITEIVI	25%	\$47,557.8
				TOTAL:	\$269,096

07_ Implementation Plan

Costing - Breakdown by Projects

Project 2 focuses on Sydney Street and Marrickville Road intersection upgrade.



Implementation Plan

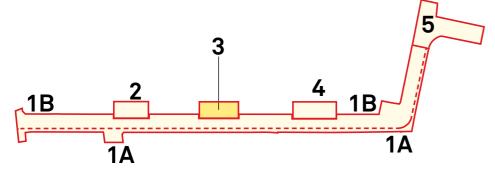
07_ Implementation Plan

Costing

Project 3 includes the upgrade of Barclay Street and Marrickville Road intersection.

Project 3 - Intersection & WSUD upgrade 2

ITEM NO.	ITEM DESCRIPTION	QUANTITY	UNIT	RATE	AMOUNT
KERB AND GUTTER					
A2a	Concrete Kerb & gutter - 150mm high kerb (by hand)	57.0	m	\$160.00	\$9,120.0
A4a	Concrete Median Island Kerb 150-200mm high on existing road pavement	20.0	m	\$150.00	\$3,000.0
MINOR TRAFFIC WORKS					
A1.2	Provision of traffic control staff, including all required signage and Traffic Control Plan	10	PP/Day	\$450.00	\$4,500.0
A15	Colour oxide surface finish (all three streets' footpaths - 100% coverage - north side)	207.0	m2	\$50.00	\$10,350.0
A10b	Concrete Vehicular Crossing: Heavy duty – 150mm thick concrete (40MPa).	75	m2	\$180.00	\$13,500.0
TRAFFIC FACILITIES					
P15a	Tactile Indicators (600mm wide SS) drilled in	8.0	m	\$780.00	\$6,240.0
P17b	Linemarking (symbols)	2.0	each	\$170.00	\$340.0
C5a	Signage and Post Installation (Council supply) in grass	2.0	each	\$180.00	\$360.0
C5b	Signage and Post Installation (Council supply) in concrete	2.0	each	\$205.00	\$410.0
DEMOLITION WORKS					
C4a	Demolition: Footpath all types upto 100mm thick	25.0	m2	\$45.00	\$1,125.0
LANDSCAPING AND ANCILLARIES					
	Raingarden - Barclay St Intersection - CAPEX	100.0	m2		\$182,882.00
	Supply and Install Inground Lights	7.0	each	\$500.00	\$3,500.0
STREET FURNITURE AND OTHER ASSOCIATED COSTS					
	Supply and install - Public seating	4.0	each	\$2,000.00	\$8,000.0
	Supply and Install - Bin Enclosures	1.0	each	\$3,000.00	\$3,000.0
				SUBTOTAL:	\$246,327
VARIATIONS					
C2a	Nightwork: concrete plant opening fee	1	each	\$2,415.00	\$2,415.0
C2b	Nightwork: additional loading	30	%	0.30	\$22,169.4
C3a	Sundays and Public Holidays: concrete plant opening fee	1	each	\$2,930.00	\$2,930.0
C3b	Sundays and Public Holidays: additional loading	10	%	0.33	\$8,210.9
SUPERVISION		10	DAY	\$250.00	\$2,500.0
CONTINGENCIES			ITEM	25%	\$61,581.8
				TOTAL:	\$346,134



Project 4 - Intersection & WSUD upgrade 3

ITEM NO.	ITEM DESCRIPTION	QUANTITY	UNIT	RATE	AMOUNT
KERB AND GUTTER					
A2a	Concrete Kerb & gutter - 150mm high kerb (by hand)	58.0	m	\$160.00	\$9,280.0
A4a	Concrete Median Island Kerb 150-200mm high on existing road pavement	20.0	m	\$150.00	\$3,000.0
MINOR TRAFFIC WORKS					
A1.2	Provision of traffic control staff, including all required signage and Traffic Control Plan	10	PP/Day	\$450.00	\$4,500.0
A15	Colour oxide surface finish (all three streets' footpaths - 100% coverage - north side)	160.0	m2	\$50.00	\$8,000.0
TRAFFIC FACILITIES					
P15a	Tactile Indicators (600mm wide SS) drilled in	6.0	m	\$780.00	\$4,680.0
P17b	Linemarking (symbols)	2.0	each	\$170.00	\$340.0
C5a	Signage and Post Installation (Council supply) in grass	3.0	each	\$180.00	\$540.0
C5b	Signage and Post Installation (Council supply) in concrete	2.0	each	\$205.00	\$410.0
DEMOLITION WORKS					
C4a	Demolition: Footpath all types upto 100mm thick	25.0	m2	\$45.00	\$1,125.0
LANDSCAPING AND ANCILLARIES					
	Raingarden - Buckley St Intersection - CAPEX	85.0	m2		\$178,203.00
	Supply and Install Inground Lights	3.0	each	\$500.00	\$1,500.0
STREET FURNITURE AND OTHER ASSOCIATED COSTS	;				
	Supply and install - Public seating	8.0	each	\$2,000.00	\$16,000.0
	Supply and Install - Bin Enclosures	1.0	each	\$3,000.00	\$3,000.0
				SUBTOTAL:	\$230,578
VARIATIONS					
C2a	Nightwork: concrete plant opening fee	1	each	\$2,415.00	\$2,415.0
C2b	Nightwork: additional loading	30	%	0.30	\$20,752.0
C3a	Sundays and Public Holidays: concrete plant opening fee	1	each	\$2,930.00	\$2,930.0
C3b	Sundays and Public Holidays: additional loading	10	%	0.33	\$7,685.9
SUPERVISION		10	DAY	\$250.00	\$2,500.0
CONTINGENCIES			ITEM	25%	\$57,644.5
			I.	TOTAL:	\$324,505

Project 5 - Railway Pde & Gleeson Ave. intersection redesign

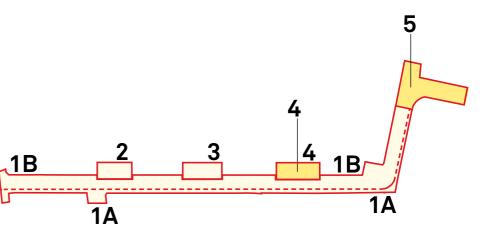
ITEM NO.	ITEM DESCRIPTION	QUANTITY	UNIT	RATE	AMOUNT
MINOR TRAFFIC WORKS					
A1.2	Provision of traffic control staff, including all required signage and Traffic Control Plan	10	PP/Day	\$450.00	\$4,500.0
TRAFFIC FACILITIES					
P15a	Tactile Indicators (600mm wide SS) drilled in	18.0	m	\$780.00	\$14,040.0
P17a	Linemarking (lines)	400.0	m	\$30.00	\$12,000.0
P17b	Linemarking (symbols)	10.0	each	\$170.00	\$1,700.0
C5b	Signage and Post Installation (Council supply) in concrete	2.0	each	\$205.00	\$410.0
DEMOLITION WORKS					
C4a	Demolition: Footpath all types upto 100mm thick	100.0	m2	\$40.00	\$4,000.0
				SUBTOTAL:	\$36,650
VARIATIONS					•
C2a	Nightwork: concrete plant opening fee	1	each	\$2,415.00	\$2,415.0
C2b	Nightwork: additional loading	30	%	0.30	\$3,298.5
C3a	Sundays and Public Holidays: concrete plant opening fee	1	each	\$2,930.00	\$2,930.0
C3b	Sundays and Public Holidays: additional loading	10	%	0.33	\$1,221.7
SUPERVISION		10	DAY	\$250.00	\$2,500.0
CONTINCENCIES			ITENA	250/	¢0.463.1
CONTINGENCIES			ITEM	25%	\$9,162.5
			ı	TOTAL:	\$58,178

07_ Implementation Plan

Costing - Breakdown by Projects

Project 4 has its scope limited to Buckley St and Marrickville Road intersection upgrade.

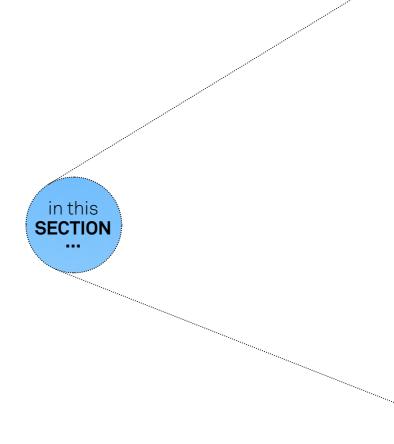
Project 5 has the least developed scope due to the yet to be developed train station redevelopment.



Implementation Plan

103

Appendix_ 2-Way Road Option





Appendix 107

02_ Appendix - Potential Circulation Changes

Existing Circulation_ 1-Way Loop

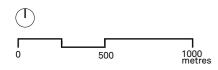
The existing network is organised around a 1-way loop described by Railway Parade, Marrickville Road, Buckley Street and Sydenham Road.

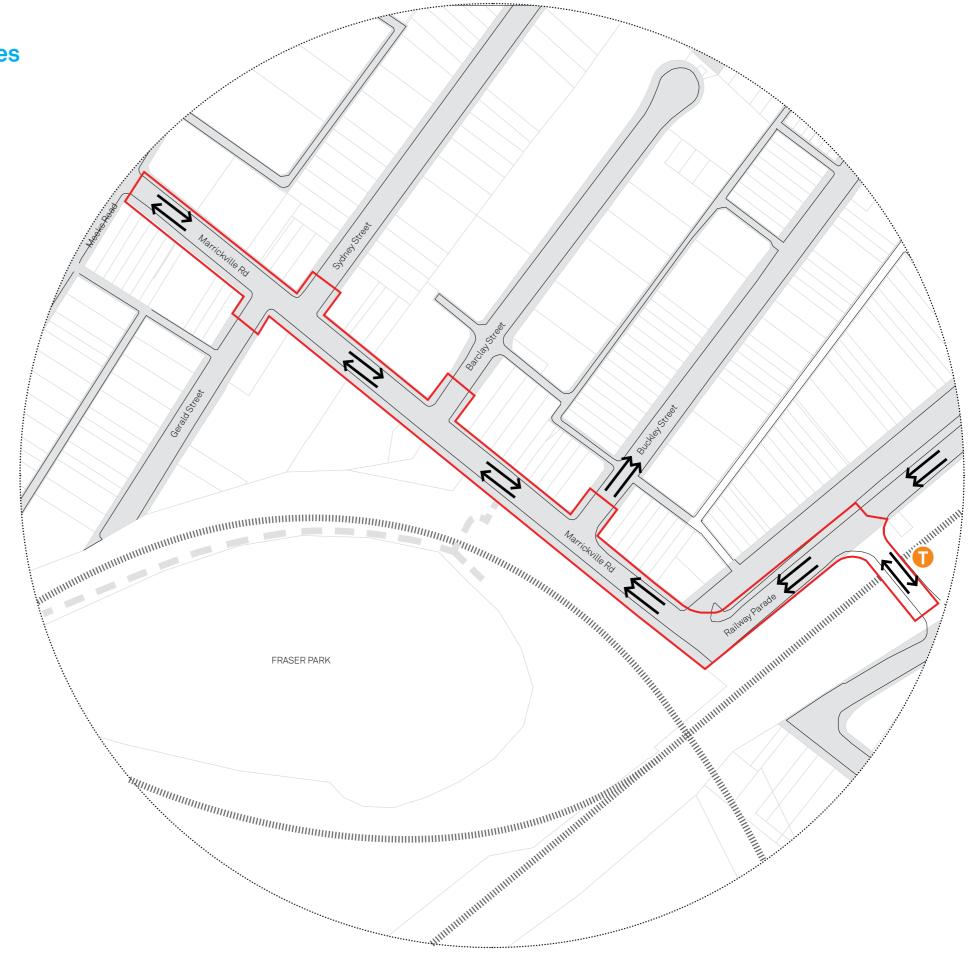
The image on this page shows the existing circulation of the road network.

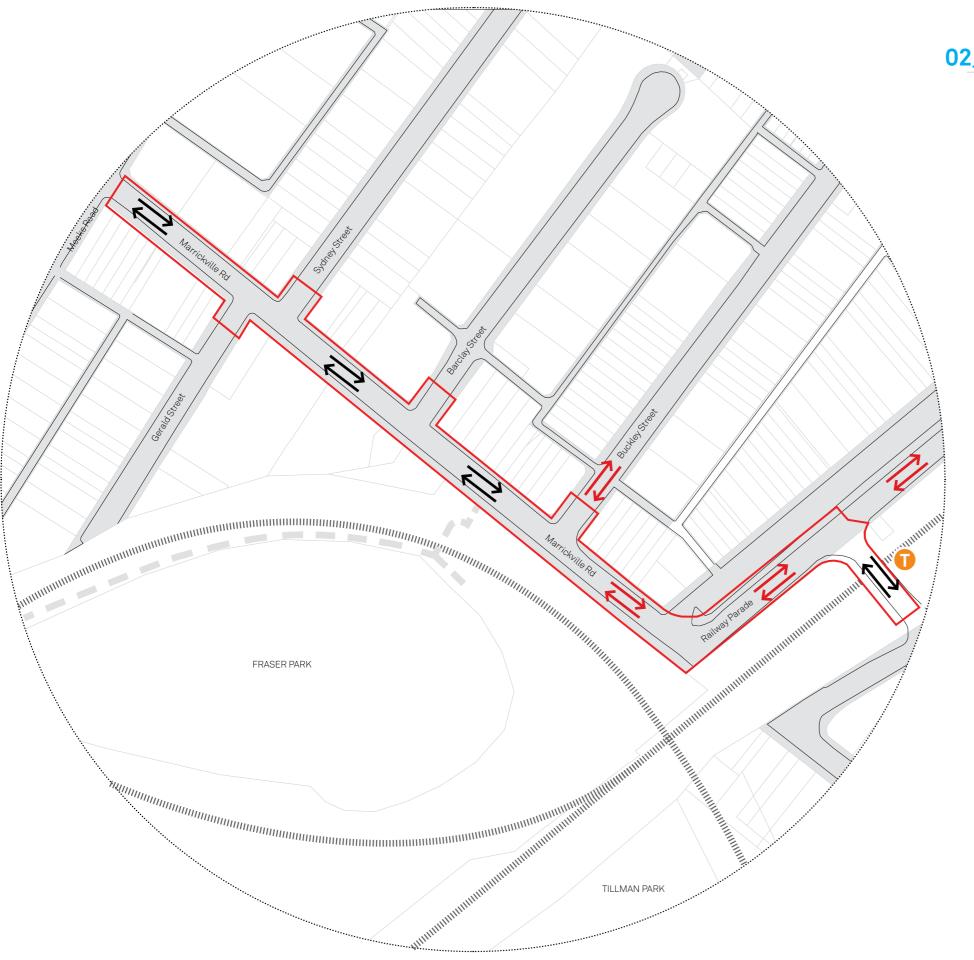
Legend

into Fraser Park

Marrickville Road East Project Scope Existing Circulation Direction Kerb Line Sydenham Station Train Line Existing Service Road







02_ Appendix - Potential circulation Changes

Potential Circulation Changes

This document has taken under consideration the possibility that the existing 1-way circulation loop may be changed into a 2-way road system in the future.

Decisions on this subject will be taken by the relevant government agencies upon major ongoing upgrades in the area - including Sydney Metro redevelopment of Sydenham Station.

The design proposed by this master plan has been tested and is compatible with a 2-way road circulation system.

The image on this page shows potential circulation changes.

Legend

Marrickville Road East Area

Project Scope

 \rightarrow

Existing Circulation Direction

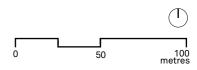
Potential Circulation Direction

Sydenham Station

Kerb Line

Train Line

Existing Service Road into Fraser Park



Appendix

