WATERLOO METRO QUARTER

OSD: SOUTHERN PRECINCT

LANDSCAPE & PUBLIC DOMAIN REPORT

SSD-10437 30th SEPTEMBER 2020 APPENDIX JJ

WMQ-BLD3-ASP-LS-RPT-003

STATUS	FINAL
ISSUE	P6
DATE	21.10.2020
PREPARED BY	SB
APPROVED BY	KL









ASPECT Studios acknowledges the traditional owners of the land we work on and travel through and we pay our respects to elders past, present and emerging.

We acknowledge Country and pay our respects to the Gadigal people as the Traditional Custodians of the land in which the Waterloo development is situated.

We recognise their continued connection to Country and that this connection can be seen through stories of place and cultural practices such as art, songs, dances, storytelling and caring for the natural and cultural landscape of the area.

We acknowledge all the people, Indigenous and migrant, who contributed stories that we have incorporated into this document. We thank them for the knowledge of the broader Eora nation and the links of their stories to Waterloo.

Contents

- 00 Executive Summary
- 03 Introduction
- 04 The Site
- 05 Application Extent of Works
- 06 Background Documents
- 01 WMQ Landscape & Public Domain Vision
- 10 Precinct Masterplan
- 11 Culture and Placemaking Story
- 02 Southern Precinct Design Strategies
- 13 Pedestrian Accessways
- 14 Access & Circulation
- 15 Deep Soil
- 16 Tree Canopy Coverage
- 17 Spatial Compliance
- 18 Public Art
- 19 Lighting Strategy
- 03 Public Domain Proposals
- 21 General Arrangement
- 23 Hard Materials Palette
- 25 Planting Palette
- 04 Communal Terrace & Green Roof
- 28 Introduction
- 29 General Arrangements
- 32 Hard Materials Palette
- 33 Planting Palette
- 05 WMQ Design Guidance
- 35 Compliance Table

Executive Summary

This Landscape & Public Domain design report has been prepared by ASPECT Studios to accompany a detailed State significant development (SSD) development application (DA) for the Southern Precinct over station development (OSD) at the Waterloo Metro Quarter site.

This report has been prepared to address the relevant conditions of the concept SSD DA (SSD 9393) and the Secretary's Environmental Assessment Requirements (SEARs) issued for the detailed SSD DA (SSD 10437).

This report concludes that the proposed Southern Precinct OSD is suitable and warrants approval.

Introduction

This report has been prepared to accompany a detailed State significant development (SSD) development application (DA) for the Southern Precinct over station development (OSD) at the Waterloo Metro Quarter site. The detailed SSD DA is consistent with the concept approval (SSD 9393) granted for the maximum building envelope on the site, as proposed to be modified.

The Minister for Planning, or their delegate, is the consent authority for the SSD DA and this application is lodged with the NSW Department of Planning, Industry and Environment (DPIE) for assessment.

The detailed SSD DA seeks development consent for the design, construction and operation of:

- 25-storey residential building (Building 3) comprising student accommodation, to be delivered as a mixture of studio and twin apartments with approximate capacity of 474 students
- 9-storey residential building (Building 4) above the southern station box to accommodate 70 social housing dwellings
- ground level retail tenancies including Makerspace and gymnasium lobby, and loading facilities
- level 1 and level 2 gymnasium and student accommodation communal facilities
- landscaping and private and communal open space at podium and roof top levels to support the residential accommodation
- new public open space including the delivery of the Cope Street Plaza, including vehicle access to the site via a shared way from Cope Street, expanded footpaths on Botany and Wellington streets and public domain upgrades
- signage zone locations
- utilities and service provision
- stratum subdivision (staged).

— This report has been prepared in response to the requirements contained within the Secretary's Environmental Assessment Requirements (SEARs) dated 8 April 2020 and issued for the detailed SSD DA. Specifically, this report has been prepared to respond to the SEARs requirements summarised below:

ENVIRONMENTAL ASSESSMENT REQUIREMENTS (SEARS)	
4. Design Excellence and Built Form	
demonstrate compliance with the endorsed Design and Amenity Guidelines, dated March 2020 or any subsequent endorsed revision of the guidelines.	Refer to Design and Amenity Guidlines Compliance Table
5. Integration with Sydney Metro Station Infrastructure	
show how the SSD will integrate with the CSSI infrastructure such as structural design, detailed architectural approach, access, wayfinding, public domain works and construction management.	The public domain has been designed as a whole precinct with no visible boundaries between station and OSD works. The design allows for seemless movement between the station and other parts of the precinct in a safe and legible public domain.
The EIS must include all relevant plans, architectural drawings, diagrams and relevant documentation required under Schedule 1 of the Regulation. Provide these as part of the EIS rather than as separate documents. In addition, the EIS must include the following:	
public domain plans defining extent of works (if any proposed) landscape design statement and plans	Refer to Package of SSDA Landscape Plans and schedules along with the Landscape and Public Domain Design Report.
9. Traffic, Parking and Access (Construction and Operation) In addition, the EIS must include the following:	
details of measures to segregate hostile vehicles from public transport users and areas of people congregation.	Hostile vehicle mitigation elements have been incorporated into the public domain to protect areas of mass congregation and critical station infrastructure. These elements include bollards, walls and planter boxes which have been designed to allow flow of pedestrians throughout the precinct and protection from hostile vehicles.
demonstrate how pedestrian safety and amenity will be provided along Raglan Street, the shared laneway located between Raglan Street and Cope Street plaza will be designed to prioritise pedestrian movements, including any measures to protect pedestrians entering and exiting the building and retail	Following a detailed safety risk review, areas of potential mass congregation and critical station infrastructure have been designed to prevent vehicular access. This includes the public domain outside the northern entry to the station on Raglan St, the shared laneway between Raglan St and Cope St Plaza, pedestrians using the

shared driveway, Grit Lane, the southern station retail tenancies and Cope St Plaza.

WATERLOO METRO QUARTER SOUTHERN PRECINCT LANDSCAPE REPORT

The Site

The site is located within the City of Sydney Local Government Area (LGA). The site is situated about 3.3 kilometres south of Sydney CBD and eight kilometres northeast of Sydney International Airport within the suburb of Waterloo.

The Waterloo Metro Quarter site comprises land to the west of Cope Street, east of Botany Road, south of Raglan Street and north of Wellington Street (refer to Figure 1). The heritage-listed Waterloo Congregational Church at 103–105 Botany Road is within this street block but does not form a part of the Waterloo Metro Quarter site boundaries.

The Waterloo Metro Quarter site is a rectangular shaped allotment with an overall site area of approximately 1.287 hectares.

The Waterloo Metro Quarter site comprises the following allotments and legal description at the date of this report. Following consolidation by Sydney Metro (the Principal) the land will be set out in deposited plan DP1257150.

- 1368 Raglan Street (Lot 4 DP 215751)
- 59 Botany Road (Lot 5 DP 215751)
- 65 Botany Road (Lot 1 DP 814205)
- 67 Botany Road (Lot 1 DP 228641)
- 124-128 Cope Street (Lot 2 DP 228641)
- 69-83 Botany Road (Lot 1, DP 1084919)
- 130-134 Cope Street (Lot 12 DP 399757)
- 136-144 Cope Street (Lots A-E DP 108312)
- 85 Botany Road (Lot 1 DP 27454)
- 87 Botany Road (Lot 2 DP 27454)
- 89-91 Botany Road (Lot 1 DP 996765)
- 93-101 Botany Road (Lot 1 DP 433969 and Lot 1 DP 738891)
- $-\,$ 119 Botany Road (Lot 1 DP 205942 and Lot 1 DP 436831)
- 156-160 Cope Street (Lot 31 DP 805384)
- 107-117A Botany Road (Lot 32 DP 805384 and Lot A DP 408116)
- 170-174 Cope Street (Lot 2 DP 205942).

The detailed SSD DA applies to the Southern Precinct of the Waterloo Metro Quarter site. The site has an area of approximately 4830sqm. The subject site comprises the following allotments and legal description at the date of this report.

- 130–134 Cope Street (Lot 12 DP 399757) (Part)
- 136–144 Cope Street (Lots A-E DP 108312) (Part)
- 93-101 Botany Road (Lot 1 DP 433969 and Lot 1 DP 738891) (Part)
- 156-160 Cope Street (Lot 31 DP 805384)
- 107–117A Botany Road (Lot 32 DP 805384 and Lot A DP 408116)
- 119 Botany Road (Lot 1 DP 205942 and Lot 1 DP 436831)
- 170-174 Cope Street (Lot 2 DP 205942).

The boundaries of the overall site are identified at Figure 1, and the subject site of the detailed SSD DA is identified at Figures 2 and 3. The site is reasonably flat with a slight fall to the south.

The site previously included three to five storey commercial, light industrial and shop top housing buildings. All previous structures except for an office building at the corner of Botany Road and Wellington Street have been demolished to facilitate construction of the new Sydney Metro Waterloo station. As such the existing site is predominately vacant and being used as a construction site.

Construction of the Sydney metro is currently underway on site in accordance with critical State significant infrastructure approval (CSSI 7400).

The area surrounding the site consists of commercial premises to the north, light industrial and mixed-use development to the south, residential development to the east and predominantly commercial and light industry uses to the west.

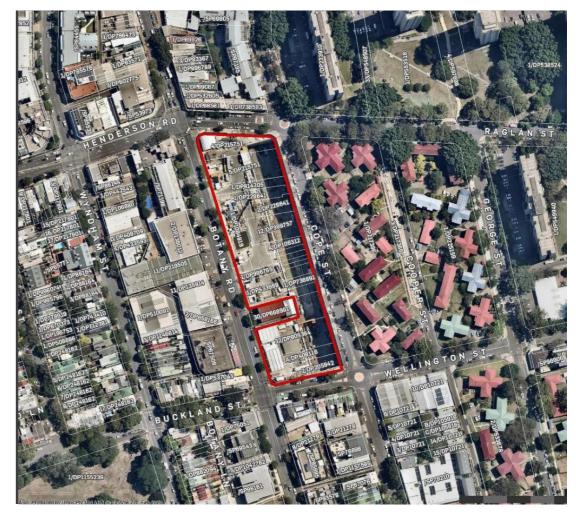


Figure 1 - Aerial image of the site Source: Urbis

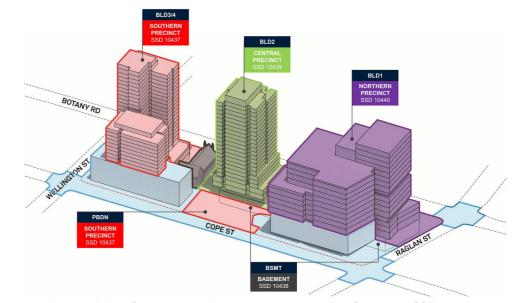
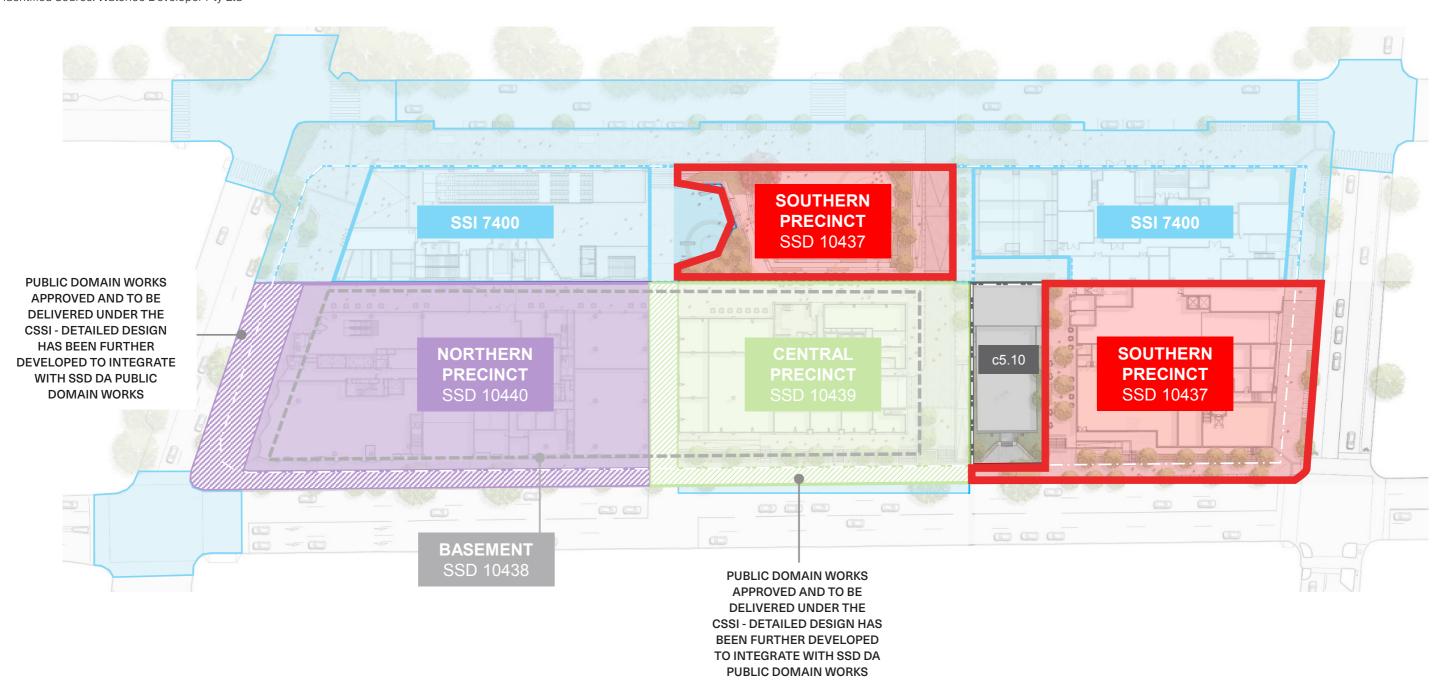


Figure 2 - Waterloo Metro Quarter site, with sub-precincts identified Source: HASSELL

WATERLOO METRO QUARTER
ASPECT Studios
SOUTHERN PRECINCT LANDSCAPE REPORT

Application Extent of Works

Figure 3 - Waterloo Metro Quarter site, with sub-precincts identified Source: Waterloo Developer Pty Ltd

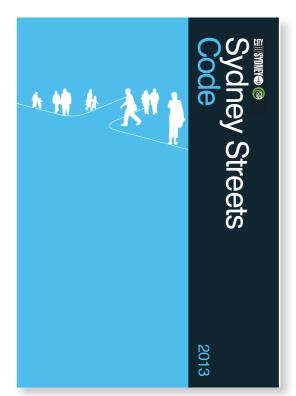


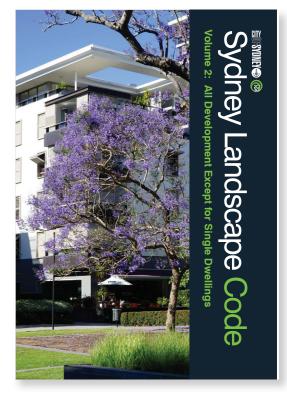
Background Documents & Research

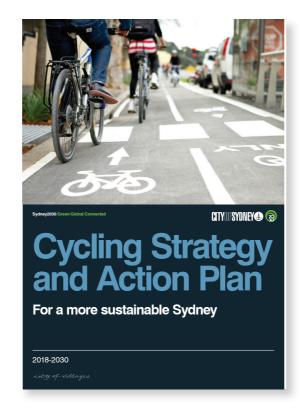
Consideration has been given to the following strategy documents:

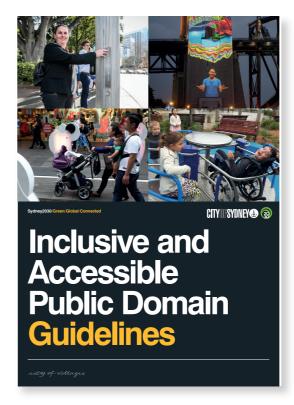
- WMQ Design & Amenity Guidelines
- City Of Sydney Public Domain Guidelines
- City Of Sydney Cycle Network Strategy
- City Of Sydney Street Tree Masterplan
- City Of Sydney Urban Forest Strategy Canopy
- City Of Sydney Urban Ecology Strategic Action Plan

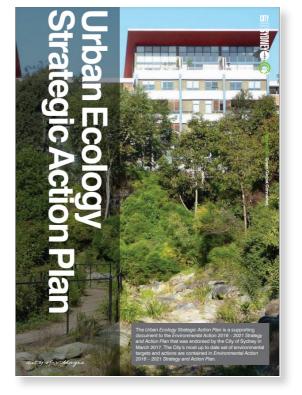












WATERLOO METRO QUARTE
SOUTHERN PRECINCT LANDSCAPE REPOR



WMQ Landscape & Public Domain Vision



Precinct Masterplan

Waterloo Metro Quarter will be a dynamic precinct within the broader surrounds of Waterloo comprised of public spaces including a neighboorhood square (Cope Street Plaza), laneways (Ragan Walk, Grit Lane and Church Square), a courtyard (Church Yard) and surrounding streetscapes with generous footpaths and planting areas.

Raglan Street — Provision of generous circulation space around Metro and building entries. Creation of comfortable microclimate with shade trees and planting to cool street frontage. Permeable paving over deep soil. Predominantly native understorey planting provides opportunity for education through urban foraging.

Wellington Street — Extension of understory planting in verge from western side of Botany Rd green connector to Alexandria Park. Weeping Lilly Pilly street trees, native understory planting and bike parking integrated near cycle path - separated bike path proposed on road.

Cope Street — Provision of generous circulation space around Metro and building entries. Incorporates parking/taxi/kiss 'n ride with widened verge. Creation of comfortable microclimate with shade trees and planting to cool street frontage. New street trees are Corymbia eximia (Yellow Bloodwood) with native understory

planting. Integration metro security elements and WSUD. Bike parking and benches located to provide amenity near Waterloo Place.

Botany Road — Provision of generous footpath widths along Botany Rd with new Lophostemon confertus street trees and native understory planting that creates amenity and separation from the busy vehicular street. Double row of trees provided in areas with 10M setback.

Cope Street Plaza — Will be named through a competition open to the community and will provide a meeting place/neighborhood square/communal gathering area that showcases cultural artworks and stories. Located at footpath level, the square is subtly separated from the surrounding circulation zones and outdoor dining areas, creating a protected place for community use. Active building uses are edges to the square, making this an attractive space to be during day and evening. A small

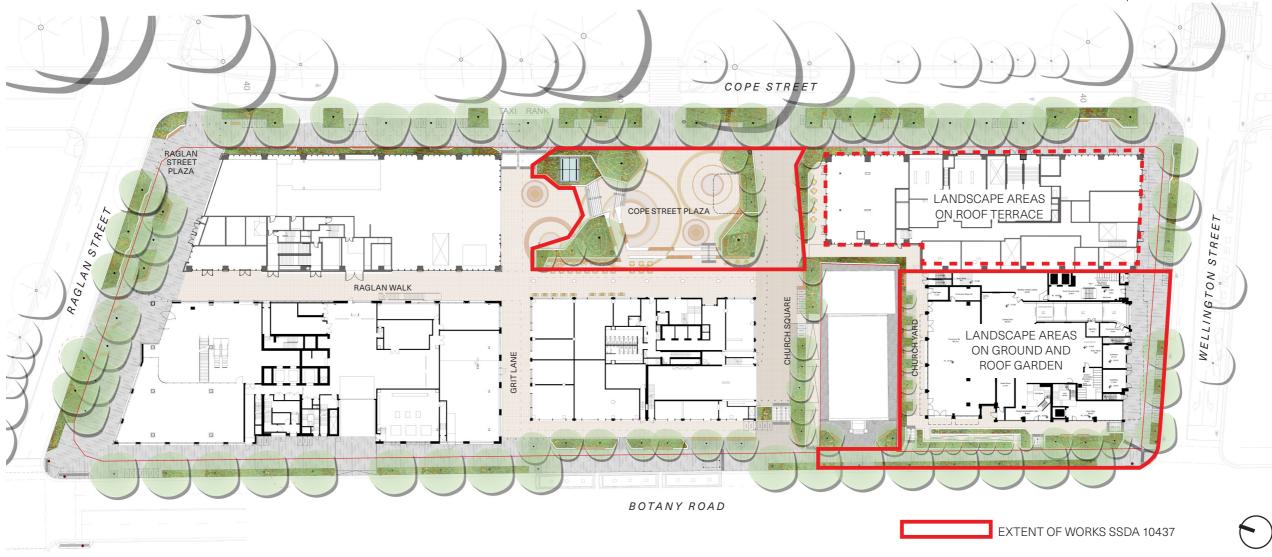
pavilion could provide a permanent place for markets/ busking/gathering linked to the original trade route walking trail now known as Botany Rd.

Raglan Walk — An important north south connecting laneway activated by adjacent building lobby, retail tenancies as well as Metro retail and bike storage.

Grit Lane — Will be used as a connector between the Metro southern entrance and Botany Rd bus stop. Activated by retail tennancies both sides.

Church Square — provides both pedestrian access across the precinct and vehicular access to the basement. Allows church facade to be exposed and contribute to character of the place.

Church Yard — A protected courtyard framed by the Church and the facade of the student accommodation building. Allows activities to flow out from the Church and Maker Space.



WATERLOO METRO QUARTER
SOUTHERN PRECINCT LANDSCAPE REPORT

Culture & Placemaking Story

The public domain has been designed with an underlying narrative of responding to the long and layered history of the place. Responses to culture will be expressed through the design of the ground plane, planting, artworks, seating and embedded stories.

The Place Story developed for the project includes the following statement of the essence of the place:

THE WATERLOO OSD IS A PLACE OF **'UNCONVENTIONAL POTENTIAL'** AN OPPORTUNITY TO BRING DIVERSE MINDSETS TOGETHER, CELEBRATE DIFFERENCE, AND EXPLORE A NEW ECONOMIC TOMORROW.

Ongoing collaborations will generate a meaningful sense of ownership and belonging, whilst unlocking community potential. It will be a place where convenience meets affordability, easily accessible within minutes from the CBD.

The public domain and landscape design has incorporated the four overarching Place Pillars identified through the work by Murawin and Brickfilelds that is detailed in the Place Story as per the extract below:

The Place Pillars describe the unique attributes that the Waterloo ISD can 'own' - defined by their evolving stories. These Pillars are drawn from an understanding that starts with 'the First Story, first'.

The Waterloo-Redfern area is culturally and historically significant for the Aboriginal people of Sydney, New South Wales and the country. These, and the contemporary narratives that follow, provides a foundation for the place story we are writing today.

To articulate how we will deliver each Pillar of the proposition to the community, the Pillars are described in terms of:

Experiential attributes - capturing character and emotional dimensions

Community benefits - the attraction or benefit provided to the community

Proof points - representations of our Place Pillars to the community

The following overview summarises the key features and proof points that will enable the delivery of the Place Pillars within the Southern Precinct (SSD10437).

RESILIENT

Diverse, accessible opportunities enable new cycles of prosperity through skills training, employment, entrepreneurship, health and wellbeing, spirituality and sustainability.

Community Benefits

- _Sustainability
- _Employment
- _Wellbeing

Experiential Attributes

- _Seasonal
- _Nurturing
- _Spiritual

- _Passive and responsive building design
- _Natural and recycled materiality
- _Rooftop foraging and kitchen gardens

Programming

- _Gym, fitness mentoring and training programs
- _Skills and training workshops

REAL

A place of formative experiences, where difference is celebrated and you can be your unfiltered self.

Community Benefits

- _Learning from difference
- _Belonging
- _Transparency

- _Unassuming
- _Honest

Experiential Attributes

- _Layered

- _Robust and raw materiality
- _Embedded cultural narratives in design response

Programming

- _Cultural and creative production
- _Sharing economy programs
- 24/7 activation

RECIPROCITY

Healing and exchange fostering cultural practice, creativity, social justice, inclusion and economic participation.

Community Benefits

- Creative expression
- Authentic exchange
- _Equity

Experiential Attributes

- _Inclusive
- _Diverse
- _Co-curated



Place

- _Social spaces
- _Design collaborations
- _Celebration of language, community and innovation
- Public realm designed to enable activation

Programming

- _Community-led and cultural activations
- Ongoing facilitation of community development with new residents

- _Strengthened connections to surrounding
- _Ground plane permeability

Programming

- _Meaningful place naming
- _Active laneways

CONNECTION

New levels of convenience unlocked by the Metro station providing accessibility to ATP and the CBD, making this an appealing destination for local professionals.

Community Benefits

- _Transport connectivity
- _Onsite amenity
- _Meaningful narratives

Experiential Attributes Seamless

- Convenient
- Relevant





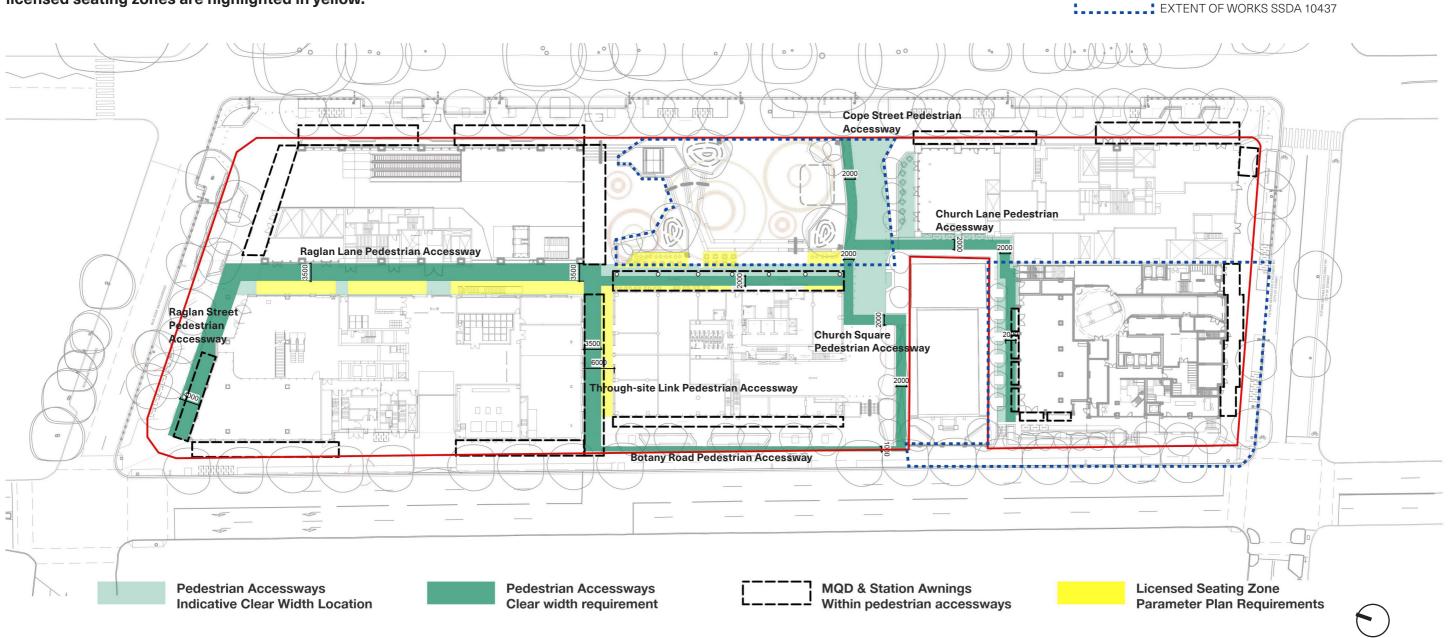
Waterloo Metro Quarter Design Strategies



SOUTHERN PRECINCT

Pedestrian Accessways

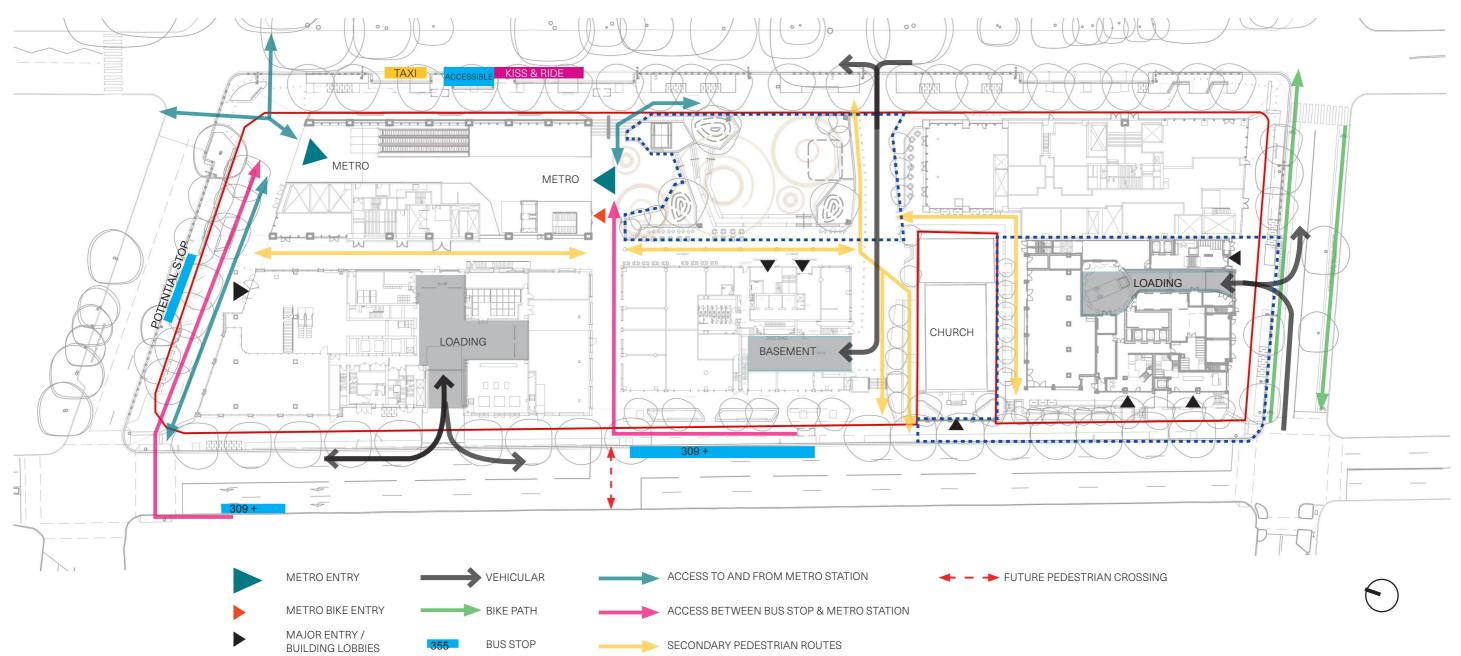
In line with Annexure A to Schedule C1 - Waterloo Design Parameter Plans, clear pedestrian access has been considered throughout the site to maintain a safe and accessible journey for pedestrians. Clear widths have been adhered to and licensed seating zones are highlighted in yellow.



Access & Circulation

The station precinct establishes two new eastwest pedestrian links from the bus stops on Botany Road to the station entry. Care has been taken with respect to providing safe paths of travel for people with a disability especially at the points at which the pedestrian paths of travel intersect respectively with the station entries.

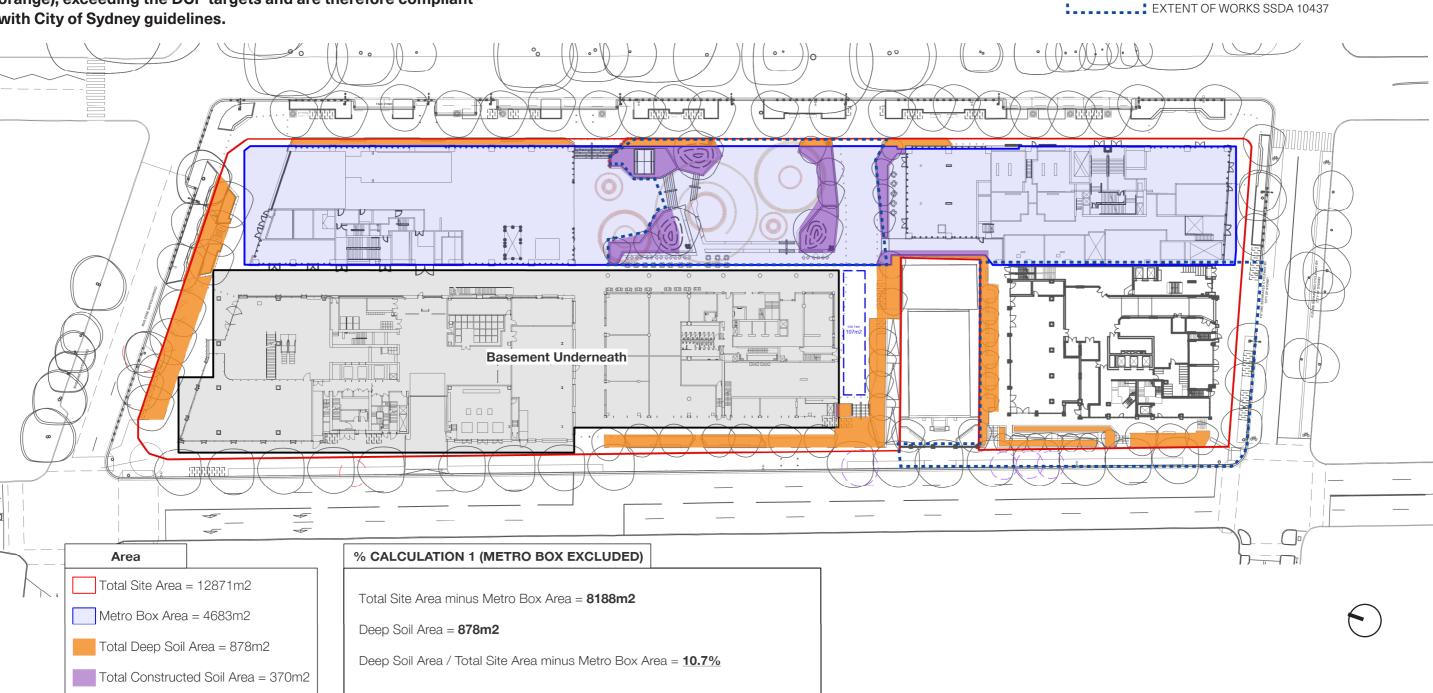
SOUTHERN PRECINCT
EXTENT OF WORKS SSDA 10437



SOUTHERN PRECINCT

Deep Soil

The ADG minimum deep soil requirement is 7% and the City of Sydney minimum for mixed use / commercial developments is 10%. The proposals for Waterloo Metro Quarter basement have been designed to maximise deep soil area. Excluding the station box (in blue) the proposals achieve 10.7% deep soil coverage (in orange), exceeding the DCP targets and are therefore compliant with City of Sydney guidelines.



SOUTHERN PRECINCT

Spatial Compliance

As per the agreed WMQ Design Parameter Plans, Cope Street Plaza provides a minimum area of 1325m2 of public open space. Raglan Street plaza provides 875m2 of open space to the new station entrance and down to Botany Road.

EXTENT OF WORKS SSDA 10437 The combined area of new public domain = 2680m2 which exceeds the required 2200m2. Cope Street Plaza Min Required: 1325m2 Current Design: 1341m2 Raglan Plaza
Min Required: 875m2
Current Design: 1155m2
(688m2 within Site Boundary)/ Church Yard Min Required: 180m2 Gurrent-Design: 184m2 Raglan Plaza **Cope Street Plaza Church Yard** Parameter Plan Requirements Parameter Plan Requirements Parameter Plan Requirements

Tree Canopy Coverage

The WMQ Design & Amenity Guidelines 3E objective, highlights the important role tree planting plays to mitigate the impacts of urban heat island and their contribution to enhance biodiversity of the site.

The development must achieve the following minimum tree canopy cover targets:

50% STREET canopy cover (i.e. the combined area of all tree canopy contained within the road reserve including footpaths and pedestrian areas and measured from the property boundary to the centreline of the roads)

23% OVERALL canopy cover (i.e. the combined canopy area of all trees contained within the site and adjacent streets measured to the centre line of the roads)

In summary, the precinct wide proposals below demostrate:

- **54.8%** Street Tree Canopy Cover
- 12% Private Land Canopy Cover
- This equates to 25.7% overall canopy coverage for the site.

The tree canopy coverage for streets and private land shown above exceeds the Design Amenity Guidelines Tree Canopy Coverage Criteria nominated for the project. SOUTHERN PRECINCT
EXTENT OF WORKS SSDA 10437



Public Artwork

Heritage Interpretation and Public Art strategies have been prepared for the whole site, refer to reports prepared by Urbis and Aileen Sage Architects respectively.

Through the process of developing the heritage interpretation, four main themes have been identified for interpretation in the project. Themes 1, 2 and 3 will be incorporated into briefs for public artworks that will be comissioned for the project. Please refer to the Public Art Strategy for more detail of this process. The fourth theme will become a brief for a heritage interpretation consultant to design heritage interpretation elements. Material found during the archeological investigation prior to excavation of the site can be used to inform the design for theme 4.

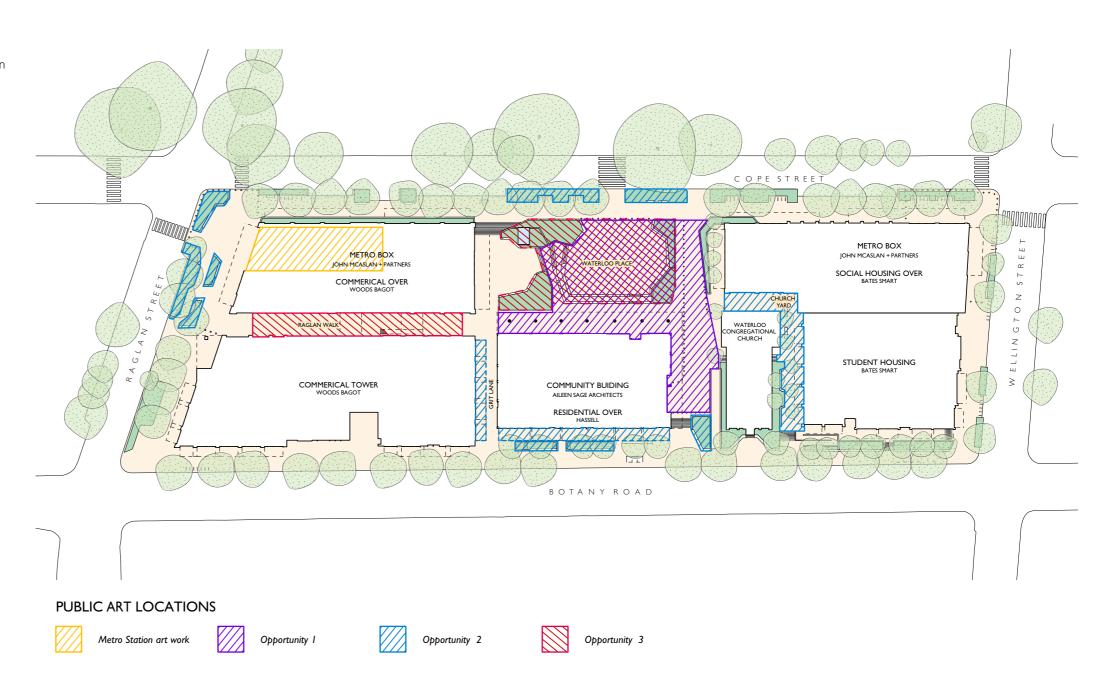


Diagram by Aileen Sage Architects

ASPECT Studios

Public Artwork



Colobrating Country



Celebrating Country

This artwork will be a two dimensional design or pattern that will be translated into the brick or concrete unit paving of Waterloo Place and the shareway area between Building 2 and the Waterloo Congregational Church. The work will be highly graphic and abstract, clearly demarcating these important civic zones and creating a strong visual character and marker of these public domain areas when viewed from a distance and from above, looking down from the residential, community and commercial buildings of the precinct and surrounds.

The work will acknowledge and celebrate the essential nature of the land that Waterloo sits on, above and within Aboriginal land. Land that has provided stories, skills, designs and cultural practices. Weaving patterns (from woven bags, baskets, and mats) will be developed by the artist, as well as interpretations of kinship stories or systems as patterns and designs.



Theme 2

Celebrating Community & Language

This commission will be in the local Sydney language as well as selected migrant languages including English, Mandarin, Arabic, and could include some European languages such as Italian, Greek, French and Russian and any other key languages considered important in responding to particular immigrant groups with strong relationships, historical and contemporary, with the area. It will work with poetry and storytelling to embed text within the site as illuminated, etched or integrated elements in key strategic places, speaking to identity, culture and community.

It will acknowledge the history of Aboriginal activism in the Waterloo /Redfern /Eveleigh area, the birthplace of Australia's civil rights movement and its continuing significance for the Aboriginal community, emerging communities with each new wave of migration, acknowledging also the stories of food production, industry, craftspeople and makers that at various times have contributed to the character of this area.

The locations of the work will be carefully considered and judiciously placed. The exact locations being determined in collaboration with the curators and the precinct design team during the Detailed Design Stage. These locations may include:



Celebrating Innovation & Knowledge

Theme 3

Celebrating Innovation & Knowledge

For this opportunity it is proposed that a series of sculptural elements either integrated with the landscape or suspended above would be commissioned extending from Raglan Walk through to Waterloo Place.

The work will celebrate the area's Aboriginal history and future with a focus on innovation, incorporating in particular ideas and practices celebrating Indigenous knowledge of the skies. Recognising a deep knowledge and understanding of the interconnection between our planet and the broader universe. Honouring the sky above us that unites us under the same blanket of stars.

The work will celebrate the (sometimes difficult) journeys migrants took from the northern hemisphere to the southern and the unifying use of stars as a way of finding place. Honouring the stories of the southern constellations and the ongoing research and innovations that continue to build on this ancient knowledge.

The work would commission a collaborative multidisciplinary team including artists working alongside an astronomer and tech innovation specialists to create an innovative and dynamic work which may include elements of dynamic digital programming and/or illuminated elements that could be programmed to respond to particular site conditions /activities / astrological /seasonal /environmental conditions particular to the site



Development of Urban Landscape

Theme 4

Development of the Urban Landscape

The overall development of the site from its original state as wetlands, Aboriginal evidence, early land grants, mills and market gardens, through to early residential subdivisions, light industrial and commercial uses before modern development.

Lighting Strategy

Lighting across the site to be designed to achieve a balance of safety and ambience, utilising a combination of pole mounted, building mounted, and feature lighting.



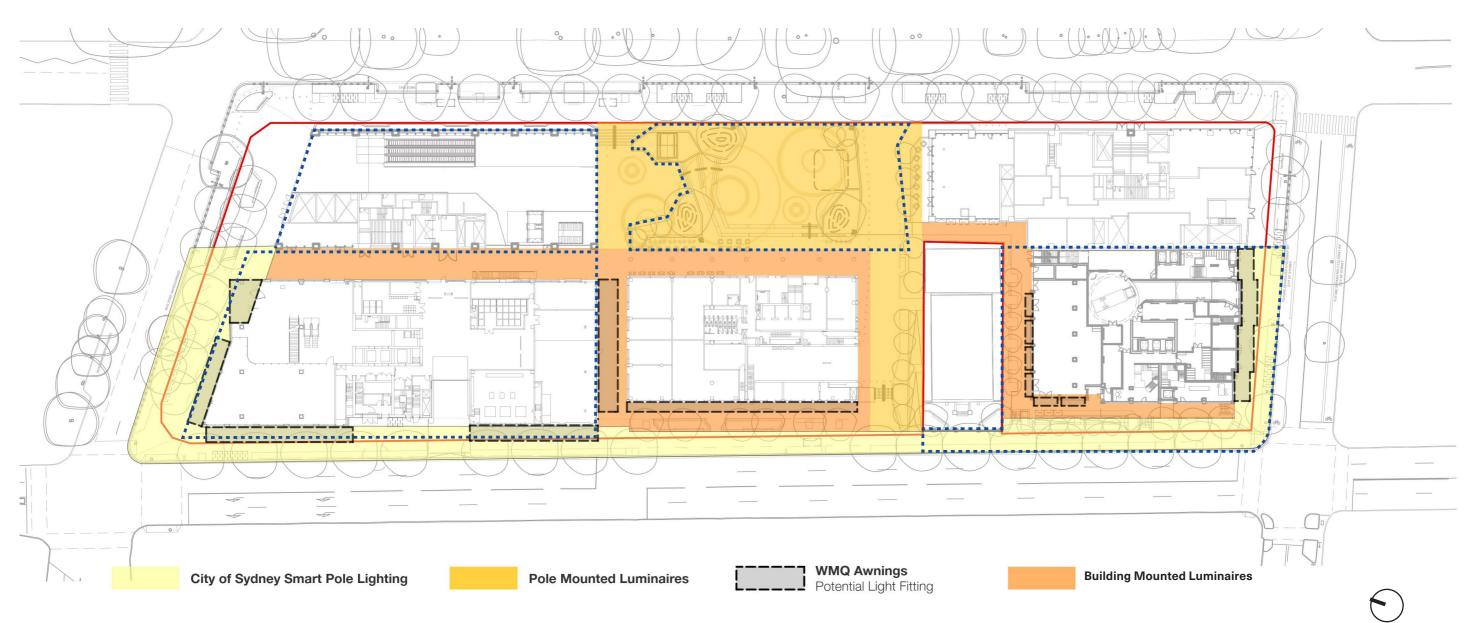








SOUTHERN PRECINCT
EXTENT OF WORKS SSDA 10437



WATERLOO METRO QUARTER
SOUTHERN PRECINCT LANDSCAPE REPORT



Southern Precinct Public Domain



General Arrangement: Building 3

Introduction

Southern Precinct will be a socially cohesive place for sharing, learning and wellbeing featuring a gym, student accommodation, social housing and a community maker space.

The public domain around building 3 responds to this combination of uses to create an open, green and welcoming arrival for visitors and residents. A variety of access points feature along Botany Road giving pedestrians direct access to Church Yard and the ground floor lobbies.

An avenue of new trees and generous garden beds front the lobbies along Botany Road and allow for sheltered seating away from the busy road.

CHURCH YARD

The proposed maker space on the northern facade of Building 3 will provide a community hub that opens into Church Yard. The space is kept open and clutter free and allows for loose furniture to be arranged informally. Interfacing with the heritage church is a densely planted garden bed with areas of seating, permeable paving and feature trees.

Cope Street Plaza also forms part of the Southern Precinct. More detail is provided on the following pages.

