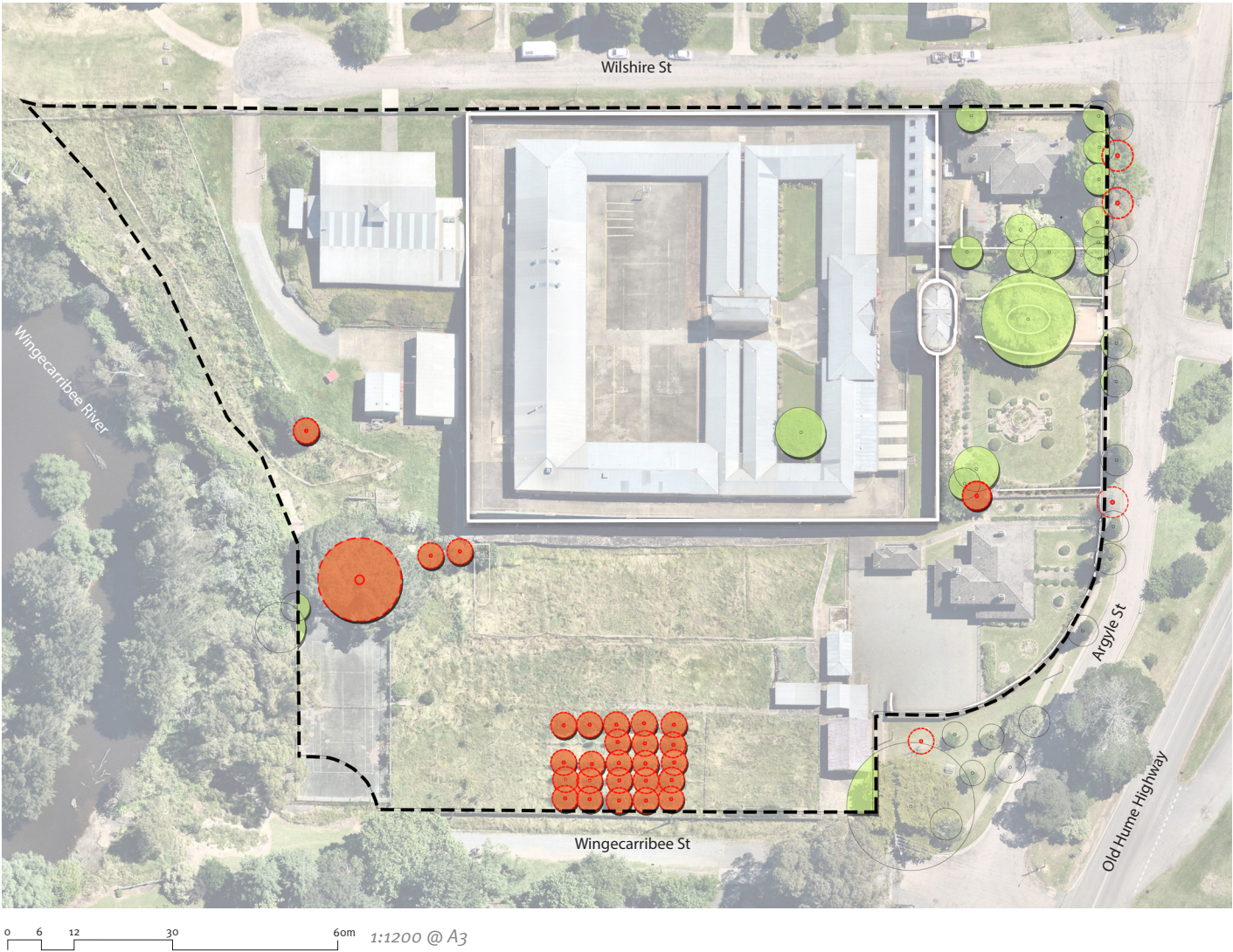


Tree Canopy Study	2
Indicative Planting Palette	
- Swale and Car Park Buffer Planting Along Wingecarribee St	3
Indicative Planting Section	
- Swale and Car Park Buffer Planting Along Wingecarribee St	4
Structures Within The Landscape	
- Arbor	5
Structures Within The Landscape	
- Glasshouse	6
Wingecarribee St Interface	7



Tree Canopy Study

Existing Tree Canopy



Legend

- Project Area
- Total Canopy of Existing Trees - 6.4%***
- Existing Tree Canopy to be Removed - 3.1%***
- Existing Tree Canopy Retained - 3.3%**
- Existing Trees (Outside Project Area)
- Existing Trees to be Removed (Outside of Project Area)

**Approximate canopy percentage is based only within the project area.*

Proposed Tree Canopy



Legend

- Project Area
- Total Tree Canopy of 14.6%***
- Existing Tree Canopy Retained - 3.3%***
- Proposed Tree Canopy (Gained) - 11.3%***
- Existing Trees (Outside Project Area)
- Proposed Trees (Outside Project Area)

**Approximate canopy percentage is based only within the project area.*

For every 1 tree removed within the project area, 3 trees are planted, which equates to more than double of the existing tree canopy.

Replacement tree ratio and increase of tree canopy coverage currently comply with conditions of A4.1.1 Inner Protection Areas (IPAs), outlining tree canopy coverage should be less than 15% at full maturity of the total area of the project site.

Final tree canopy coverage to be further investigated and determined at detail design stage

Indicative Planting Palette

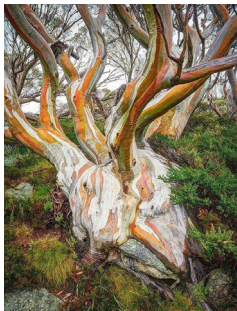
Swale and Car Park Buffer Planting Along Wingecarribee St



Acacia dealbata



Acacia melanoxylon



Eucalyptus pauciflora



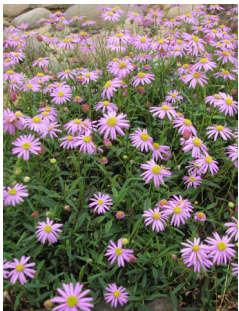
Leptospermum myrtifolium



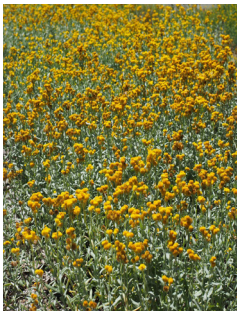
Acaena novae-zelandiae



Bulbine bulbosa



Brachyscome sp



Chyrsocephalus apiculatum



Dichondra repens



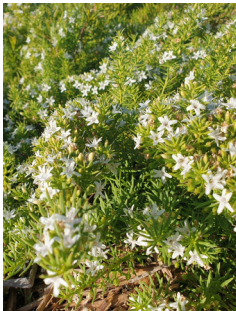
Ficinia nodosa



Juncus australis



Leptorhynchos squamatus



Myoporum parvifolium



Poa sieberiana



Poa labillardierei



Olearia elliptica

Botanical name	Common name	Mature Height	Pot size	Density	Location
Trees					
Acacia dealbata	Silver Wattle	10m	75L	AS SHOWN	✓
Acacia melanoxylon	Blackwood	15m	75L	AS SHOWN	✓
Eucalyptus pauciflora	Snow Gum	15m	75L	AS SHOWN	✓
Shrubs					
Callistemon sieberi	Alpine Bottlebrush	2.5	5L	AS SHOWN	✓
Leptospermum myrtifolium	Tea Tree Myrtle	2m	5L	AS SHOWN	✓
Olearia elliptica	Common Olearia	2m	5L	AS SHOWN	✓
Ozothamnus diosmifolia	Rice Flower	1m	5L	AS SHOWN	✓
Perennials					
Bulbine bulbosa	Bulbine Lily	600mm	50x50x90mm	4/m2	✓
Leptorhynchos squamatus	Leptorhynchos	400mm	50x50x90mm	6/m2	✓
Pycnosorus globosus	Billy Buttons	500mm	50x50x90mm	6/m2	✓
Groundcovers					
Brachyscome multifida	Brachyscome	150mm	50x50x90mm	6/m2	✓
Chyrsocephalum apiculatum	Yellow Buttons	150mm	50x50x90mm	6/m2	✓
Calochlaena dubia	Soft Braken Fern	1m	50x50x90mm	4/m2	✓
Dianella tasmanica Tasred (PBR)	Tasred Flax Lily	400mm	50x50x90mm	4/m2	✓
Dichondra repens	Kidney Weed	150mm	50x50x90mm	6/m2	✓

Botanical name	Common name	Mature Height	Pot size	Density	Location
Groundcovers					
Microseris lanceolata	Yarn Daisy	400mm	50x50x90mm	4/m2	✓
Myoporum parvifolium	Creeping Myoporum	150mm	50x50x90mm	4/m2	✓
Plectranthus parviflorus	Cockspur Flower	400mm	50x50x90mm	4/m2	✓
Pteridium esculentum	Bracken Fern	700mm	50x50x90mm	4/m2	✓
Scleranthus biflorus	Twin-flower Knawel	150mm	50x50x90mm	4/m2	✓
Viola hederacea	Native violet	100mm	50x50x90mm	6/m2	✓
Reeds					
Carex appressa	Tall Sedge	800mm	50x50x90mm	4/m2	✓
Ficinia nodosa	Knobby Club-rush	800mm	50x50x90mm	4/m2	✓
Juncus australis	Austral Rush	1m	50x50x90mm	4/m2	✓
Schoenus apogon	Schoenus	300mm	50x50x90mm	4/m2	✓
Grasses					
Bothriochloa macra	Red Grass	1m	50x50x90mm	6/m2	✓
Dichelachne crinita	Long-hair Plume Grass	1m	50x50x90mm	6/m2	✓
Dichelachne micrantha	Short-hair Plume Grass	1m	50x50x90mm	6/m2	✓
Microlaena stipoides	Weeping Grass	750mm	50x50x90mm	6/m2	✓
Poa labillardieri	Common Tussock Grass	1m	50x50x90mm	6/m2	✓
Poa meionectes	Fine-leaved Snow Grass	700mm	50x50x90mm	6/m2	✓
Poa sieberiana	Grey Tussock Grass	400mm	50x50x90mm	6/m2	✓
Rytidosperma caespitosum	Wallaby Grass	800mm	50x50x90mm	6/m2	✓
Rytidosperma pilosum	Pilosum Wallaby Grass	800mm	50x50x90mm	6/m2	✓
Themeda triandra	Kangaroo Grass	400mm	50x50x90mm	6/m2	✓

- ✓ Car Park Buffer Planting
- ✓ Swale
- Endemic Species
- Species Specific For Embankment Planting

Indicative Planting Section

Buffer planting within the car park and along the embankment has been designed to help mitigate the visual impact of the parking bays and parked vehicles from Wingecarribee St. The indicative planting palette includes species that provide a variety of textures and heights, as well as following the design principle of increasing the species diversity, which is representative of the place.

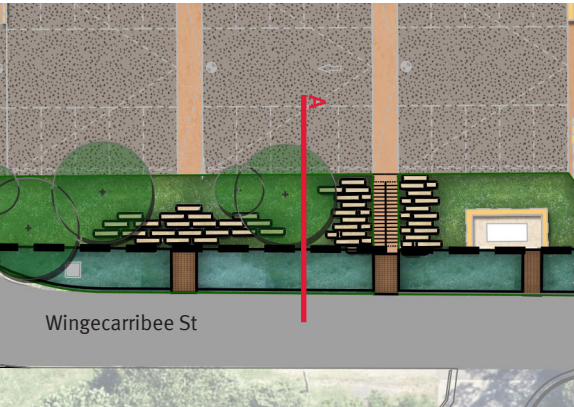
Water Sensitive Urban Design (WSUD) planting measures have been incorporated at the base of the embankment to assist in slowing and filtering stormwater runoff.

The selected planting palette within the civil engineering swale is suited to a range of climatic conditions.

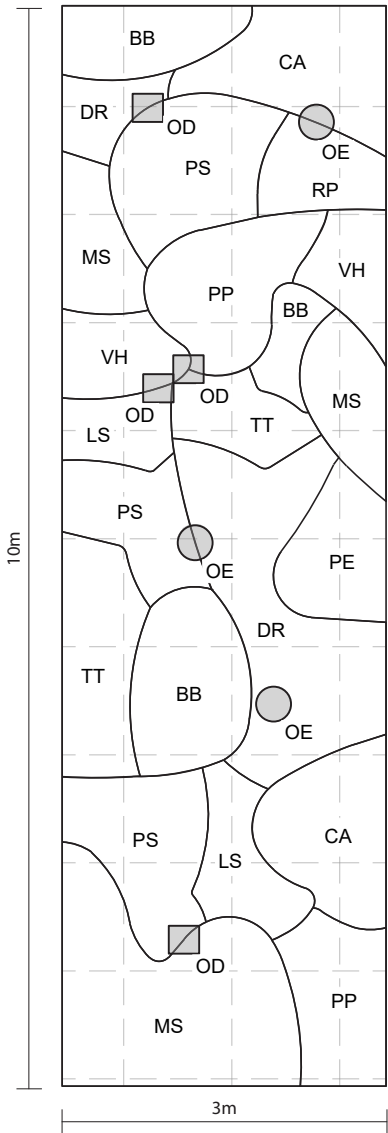
Section A - Buffer planting



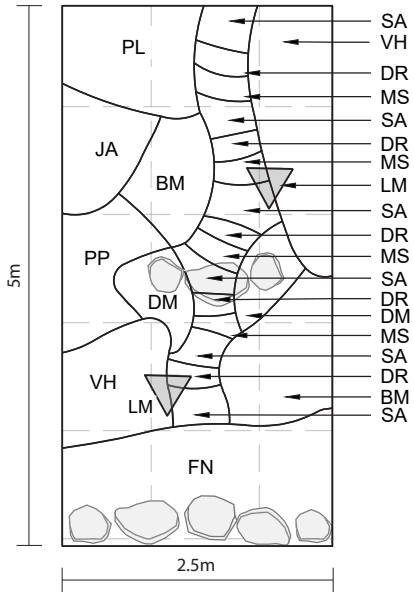
Swale and Car Park Buffer Planting Along Wingecarribee St



Mix 1 - Buffer Planting



Mix 2 - Swale Planting



Mix 1 Buffer Planting
Nominally 30m² (10mx3m)

SYMBOL		SPECIES	Spacing	Qty/block	Total
Shrubs planted as shown					
OE	○	Olearia elliptica	AS SHOWN	3	7
OD	◻	Ozothamnus diosmifolia	AS SHOWN	4	
Grasses & groundcovers planted 4-6/m²					
BB		Bulbine bulbosa	4/m²	10	144
CA		Carex appressa	4/m²	13	
DR		Dichondra repens	6/m²	23	
LS		Leptorhynchus squamatus	6/m²	10	
MS		Microlaena stipoides	6/m²	11	
PP		Plectranthus parviflorus	4/m²	12	
PS		Poa sieberiana	6/m²	27	
PE		Pteridium esculentum	4/m²	5	
RP		Rytidosperma pilosum	6/m²	6	
TT		Themeda triandra	6/m²	18	
VH		Viola hederacea	6/m²	9	

Mix 2 Swale Planting
Nominally 12.5m² (5x2.5m)

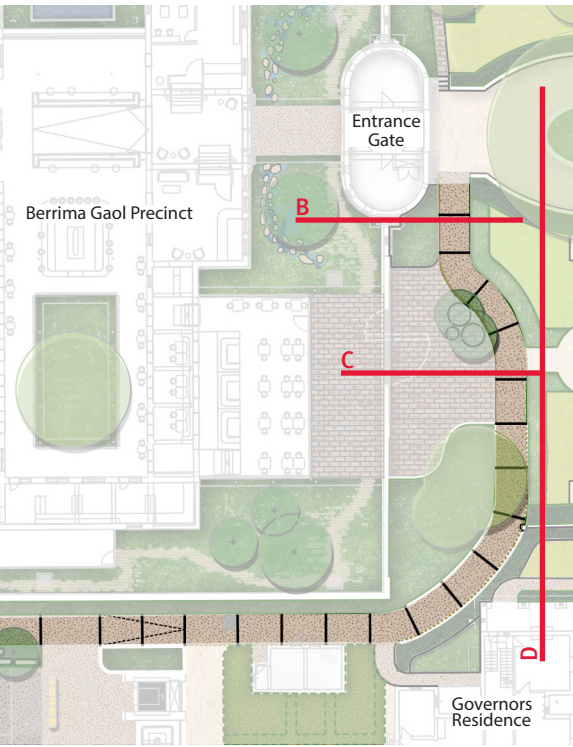
SYMBOL	SPECIES	Spacing	Qty/block	Total
Shrubs planted as shown				
LM	Leptospermum myrtifolium	AS SHOWN	2	2
Grasses & groundcovers planted 4-6/m²				
BM	Brachyscome multifida	6/m²	16	63
DM	Dichelachne micrantha	6/m²	6	
DR	Dichondra repens	6/m²	3	
FN	Ficinia nodosa	4/m²	11	
JA	Juncus australis	4/m²	4	
MS	Microlaena stipoides	6/m²	3	
PL	Poa labillardieri	6/m²	7	
SA	Schoenus apogon	4/m²	4	
VH	Viola heredica	6/m²	9	

○ ○ ○ Rocks - for maximisation of water infiltration and slowing of water flow
— 1x1m² Guide

Structures Within The Landscape

The main design function of the arbor is to provide a gardenesque experience that directs visitors and guests from the car park to the main entrance gate. This is in keeping with the Formal European Village Character, which has been maintained for the front entrance of the precinct.

- Design Parameters
- (indicative only, subject to the detailed design phase)
- Width: 2.5m
- Height: 2.5m – 3m range
- length of path coverage: 7m
- Structures: 20
- Opportunity for the top of the arbor structure to match the height of adjacent elements.
- Design Strategy 1 – structure height to match the height of the sandstone details of the entrance gate
- Design Strategy 2 – structure height to match the wall opening at the front café/restaurant.
- Material: Powder-coated Steel
- Footing (Preferred): Subsurface Fixing
- Colour: White - in keeping with other architectural elements proposed within the project.
- Contributing elements: Trellis System - to allow for plant growth up along the structure
- Climbing plant (Preferred): Wisteria



Arbor

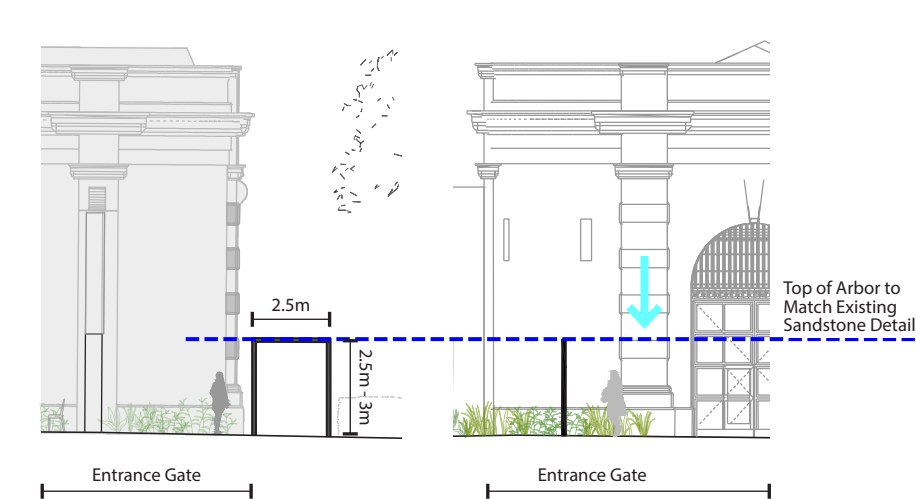
Arbor Precedents

Arbor structure made up of singular structures that run the length of the path

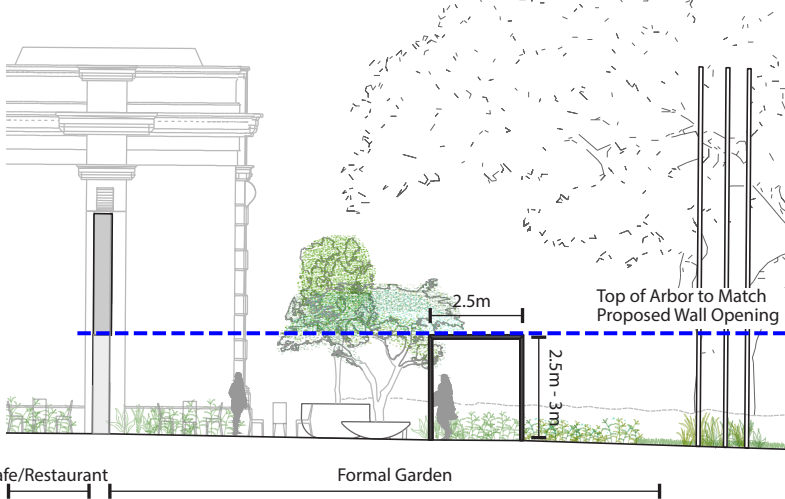
Where a clear delineation between the arbor and an adjoining building/structure is required

Sandstone detail on the Entrance Gate to be potentially used as a height reference.

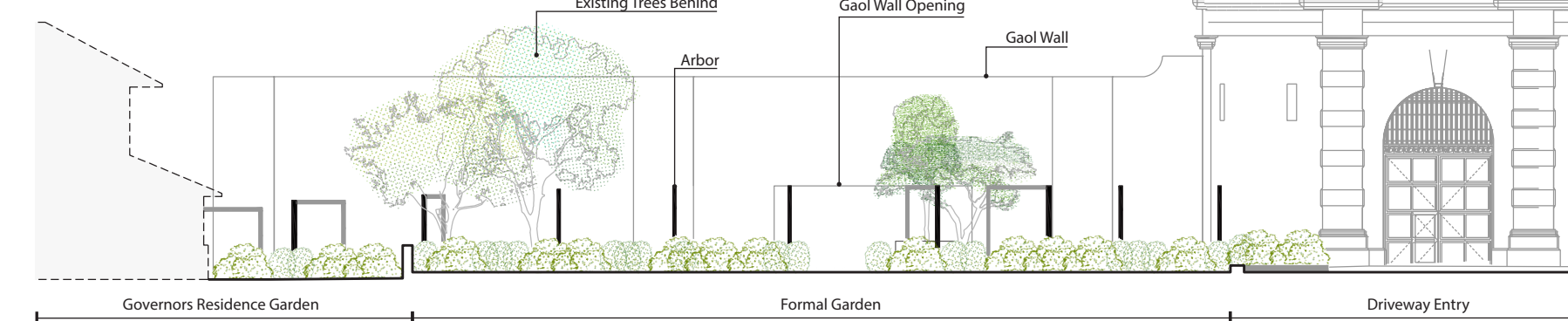
Indicative Section/Elevation B - Design Strategy 1



Indicative Section C - Design Strategy 2



Indicative Elevation D - View towards the Gaol



Structures Within The Landscape

Glasshouse

The glasshouse is located in the working garden, south of the General Governors' Residence. It will serve mainly as a working space for the gardeners taking care of the orchard and vegetable garden. There is also an opportunity for the glasshouse to host small, intimate gatherings for educational purposes or small lunches in the spring/summer.

Design Parameters

(indicative only, subject to the detailed design phase)

Width: **3m – 4m** range

Length: **7m – 10m** range

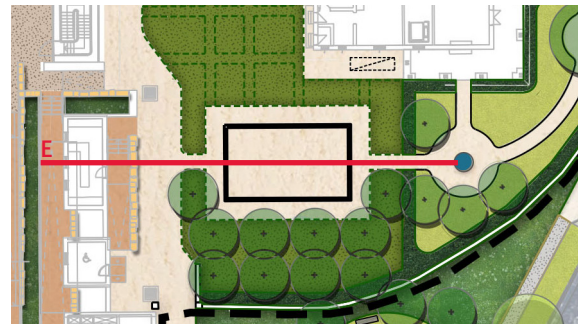
Height: **4m** max

Material (preferred): Structure - Powder-coated Steel.

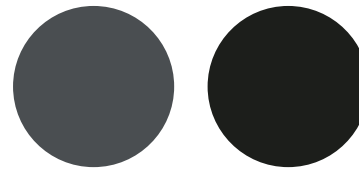
Façade - Glass Windows/Panels. Low Wall - Sandstone

Colour (potential): **Grey or Dark Green** – in keeping with the gardenesque style, and allow the structure to blend into its surroundings.

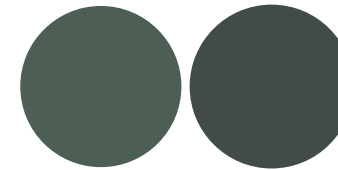
Contributing Elements (internal): Potting tables



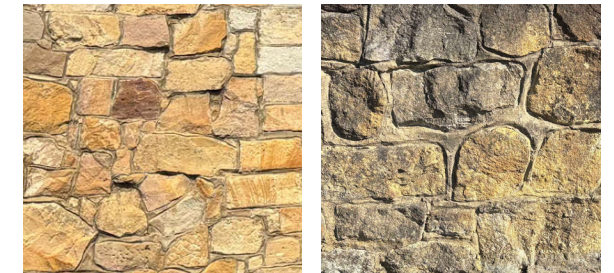
Colour Precedents



Black/Gray Colour Range



Green Colour Range



Potential Site Salvaged Sandstone

Glasshouse Precedents



Glasshouse and Low Sandstone Wall

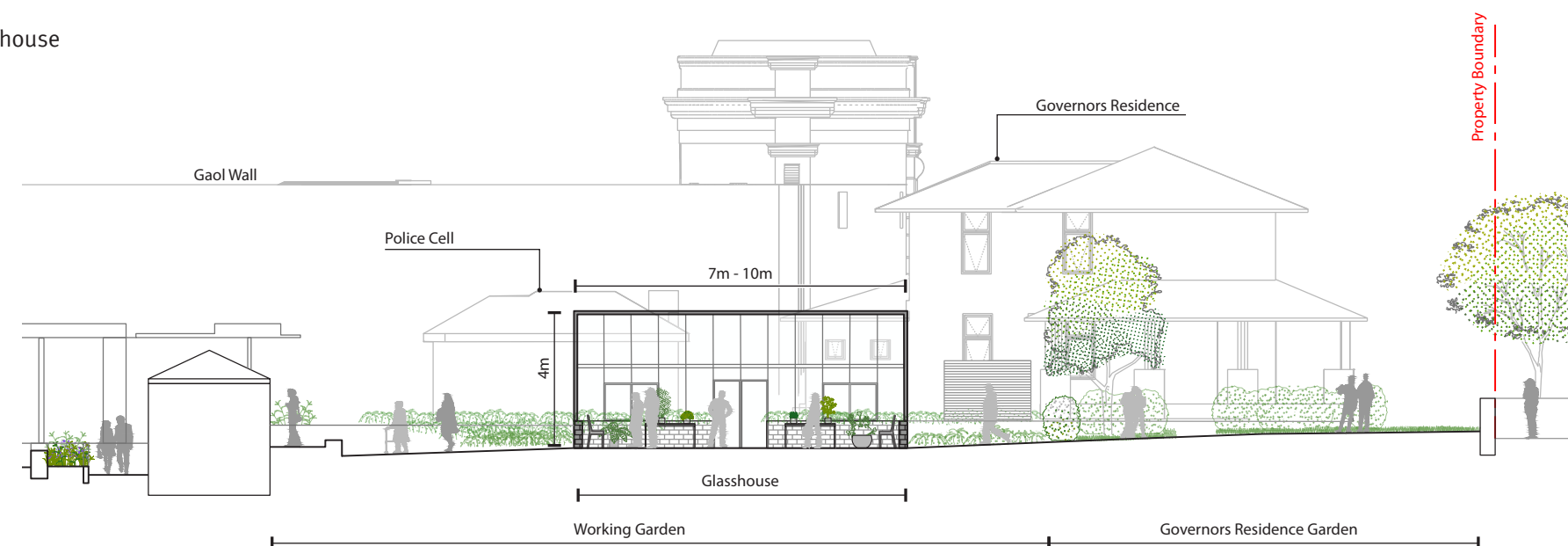


Glasshouse Within The Landscape



Potential Indoor Activation

Section D - Glasshouse



Wingecarribee St Interface

The landscape strategy for Wingecarribee St is to ensure that proposed edges and interfaces tie neatly into the existing fabric of the road reserve and adjacent footpaths. Whilst maintaining the Berrima village character along the frontage.

The selection of simple materials and finishes, to be in keeping with the village’s aesthetic, and the prioritisation, maintenance and improvement of the existing pedestrian and vehicle movement along Wingecarribee St and Argyle St.

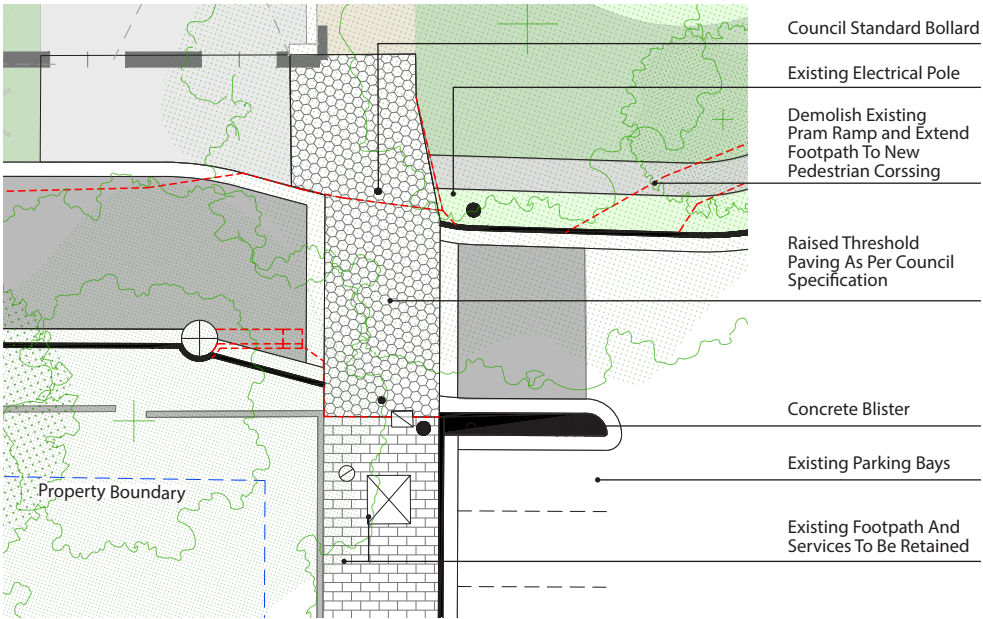
Intersection Design Strategy

The proposed realignment of the Wingecarribee St and Argyle St intersection will improve the tight angles of the road entry and formalise the pedestrian crossing anticipating the assumed increase in activity at the precinct.

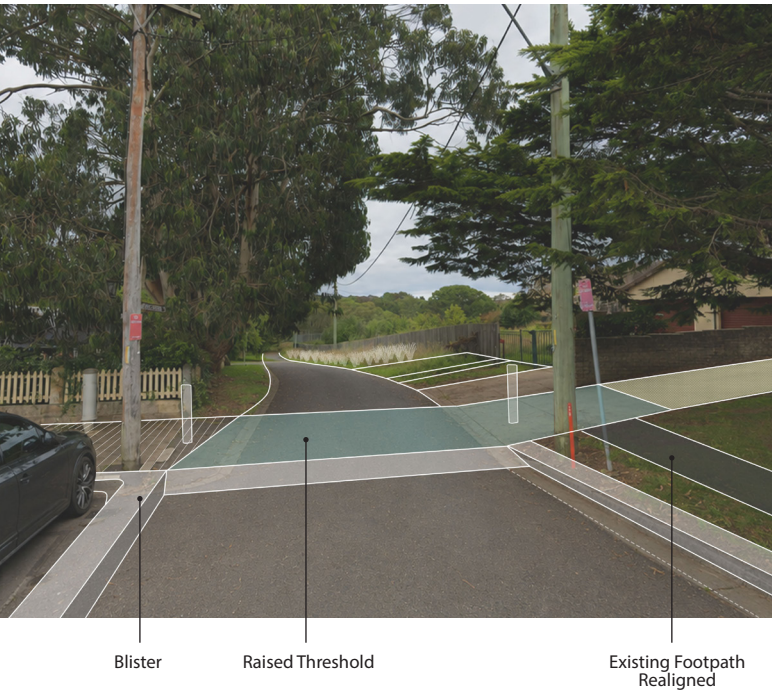
A proposed blister to the end car park ensures a clear delineation between the road and parking bay. All existing services and car parking bays will be retained.

For further road design parameters and specification refer to Civil Design by Martens

Intersection Design Strategy - Raised Threshold



Indicative Street View Sketch Design



- Pros:

 - Improves pedestrian connectivity north and south of the road reserve
 - Improves sight lines
 - Formilizes the pedestrian crossing
 - Ties neatly into the existing kerbs
 - Slowing down of vehicular movement at the Wingecarribee St and Argyle St intersection
- Cons:

 - Removal of of existing kerbs, edges and pram ramps
 - Realignment of the existing footpath that runs along Argyle St
 - Minor realignment of road edge
 - Further investigation to be done at detail design stage, to minimise impact on existing services.

Legend

- Berrima Goal Precinct Project Area

● Existing Trees

Proposed

 - Trees
 - Concrete
 - Coloured Concrete
 - Asphalt
 - Compacted Decomposed
 - Granite
 - Planted Swale
 - Mass Planting
 - Turf
- Council Standard Paving
 - Bridge Crossing
 - Flood Wall*
 - Flood Gate*
 - ➡ Vehicular Entry (Public)
 - ➡ Vehicular Entry (Private)
 - ➡ Pedestrian Entry (Public)
 - Existing Footpath, Kerbs and Edges To Be Demolished

*Refer Civil Design by Martens

Wingecarribee St - Overall Plan

