

11. LANDSCAPE DESIGN STATEMENT

EXISTING PUBLIC DOMAIN LANDSCAPE

The site is bounded by Atchison Street and Atchison Lane. Sloping from east to west, the public pedestrian footpath on Atchison Street was upgraded reasonably recently and is predominately precast unit pavers set in a stretcher bond pattern with street tree planting. There are also a series of stepped terraces to the east and west of the site anticipating future outdoor cafes along the street. Existing tree planting along Atchison Street consists of relatively young native trees at about 14 metre centres along the footpath. There is also some existing street furniture including bench seats, light poles and bicycle racks that are proposed to be retained.

NEW PUBLIC DOMAIN LANDSCAPE

The primary objectives of the new public domain landscape design are one of connection and place. Connections and paths to destinations on the site (ie. hotel, apartments and cafe) as well as connections through the site to destinations beyond support the concept of permeability. The concept of place is supported by creating a design that characterises the site to ensure it is memorable for occupants and visitors alike. Making new places also requires activity and this reflected by the cafe/restaurant proposal with outdoor seating and the potential to use the flight of stairs as 'intermittent' seating for nearby performances. In addition, it is expected that many pedestrians working nearby will use the through-site links as a local shortcut from Atchison Street to Atchison Lane beyond. This will also benefit the general level of activity expected around the Hotel and Residential lobbies and is anticipated to be open 24/7.

There are multiple pedestrian connections to the separate Hotel and Residential lobbies which front a paved forecourt, each with a different character. The backdrop of Hotel forecourt and lobby is a 10 metre high vertical green wall with nearby seating blocks, intersected by planting, to wait for a taxi or colleague undercover. On the western side of the site is the Residential apartment forecourt and lobby which is characterised by a feature stone wall.

An appropriate balance between hard paved surfaces and soft landscape areas is sought in the scheme. Whilst hard paved surfaces are necessary and appropriate for an urban space with dense populations and significant pedestrian traffic, such as St Leonards, the community expectation is often that green open space or planting is maximised. It is with this expectation in mind that the landscape design provides a range of different planting 'experiences' including an iconic 'green wall' and supplementary mass planting throughout the site.

The main public domain landscape components include:

- Street Interface (with Public Art Sculpture)
- Residential Forecourt
- Hotel Forecourt
- Green Wall
- Site Through-Link
- Cafe Square
- Feature Gravel Roof (at Podium Roof Level)

The drawings, as well as the following descriptions describe these components.

The proposed public domain landscape design supports and extends the objectives of the Atchison Street West Master Plan by North Sydney Council.

HARDSCAPE

A key part of the public domain are a series of 'hard' landscape elements such as seating, lighting, signage and bicycle racks to address functional and public needs. It is envisaged that these elements are fully integrated with the external works design for the Atchison Street Mixed-Use Development. For example rather than utilise proprietary seating units, a series of bespoke seating elements are proposed that align with the paving setout and have the potential to be finished in a particular texture, colour and/or integrate interpretation of the site or public art.

The distribution and integration of the various hardscape elements across the precinct adds a level of detail and important functionality to the public domain landscape design, enriching the experience for users of the space and building. Many elements are arranged in 'series', not only for functional reasons (eg. seating blocks) but to reinforce the overall design by creating an edge or a place for activities to happen.

Consideration of the existing streetscape elements and paving was made and the integration of these elements is exemplified by the existing paving bands (running north to south) being extended into the site paving and augmented by adjustments on the streetscape.

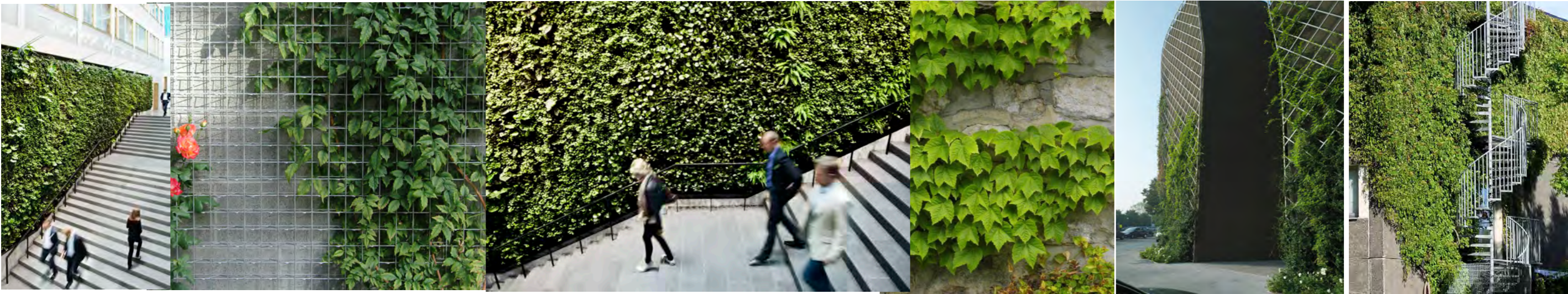
This approach ties together the site with a cohesive design approach that will provide a unique character for the Atchison Street Mixed-Use Development yet integrate with the site context.

SOFTSCAPE

Supporting the concept of different landscape experiences, the range of softscape proposed includes tree planting, mass planting beds, a green wall, and integrated feature planting in the seats. There are a range of suitable tree, shrub and groundcover species that may be used in the planting design for the development and plant selection and planting design will consider issues such as:

- a preference for plants indigenous to the Sydney area;
- microclimatic conditions (wind, access to sunlight)
- maintenance requirements of species selected (such as level of watering, fertilising and pruning required to maintain the species in the desired form);
- does the species have any known allergic or toxic potential?
- does the species grow well and look good as a mass planting?
- are the selected species readily available from local nurseries?
- does the species look good year round (i.e. does it become dormant or dieback etc)?

All of the proposed planting will be over structural slabs which can be considered an 'artificial' environment for planting and poses some challenges to ensure a successful planting outcome. That being the case, particular attention will be paid to access to water and drainage, as well as soil volume and composition for all planting. The supply of good plant stock and regular maintenance also play a part in planting success.



TREE PLANTING

The extent and nature of the tree planting is a balance between providing a clear and legible public open space, mitigating adverse wind conditions, ensuring sunlight penetration in Winter and providing an appropriate scale or screening to surrounding buildings. To this end, a row of deciduous trees are proposed for the Cafe Square.

GREEN WALL

A key feature of the landscape design is the proposal for an iconic Green Wall to the eastern boundary of the site. At around 10 metres on Atchison Lane, the wall provides a soft edge to an otherwise blank boundary wall. Comprised of a series of linear planting boxes arranged vertically, the Green Wall enables the plants to grow onto modular stainless steel grid mesh panels. Until the climber planting has established and started to cover the grid mesh, it provides a suitable 'background' to the through-site link and Cafe Square. Climbers such as ivy or fig creeping fig (*Ficus pumila* 'Minima') would be appropriate for the green wall as they are proven climbing species, grow rapidly with low water usage and are hardy.

The intention is that lighting is installed in the interstitial space between the grid mesh and steel sub-frame, further adding visual interest and potentially activity if a colour cycle or lighting programme system is employed.

GENERAL MASS PLANTING

The planting strategy is to create a cohesive design through the use of carefully selected tree and understorey species that also demonstrate a commitment to Australian natives and by extension, sustainability. An opportunity exists to reconnect the planting design back to the site context by selecting endemic species, where appropriate. In any case, the planting design is intended to be drought tolerant and use recycled site water for irrigation in low volumes. A range of shrubs, and groundcovers

would be used to create a striped but layered effect as indicated on the drawings. The ragged edge of the mass planting beds creates an informal edge to the paving which not only has visual interest but provides opportunities for seating niches.

GRAVEL ROOF

As part of the cohesive and integrated design for the site, a feature gravel roof is proposed for the Podium Roof Level. The gravel roof links the building facade concept to the horizontal surface of the roof by using different gravel colours and sizes, separated by recycled plastic or steel edging, to create the pattern. When viewed from the apartments above, the design will be clearly visible.

MATERIALITY

Landscape materials selection has considered the context, durability of finishes in a high volume public space, resilience to vandal attack and appropriateness to contemporary addition to St Leonards. Materials selection would include selected stone (or precast) for paving and Podium walls as well as robust stainless steel elements appropriate for a major public urban space. Items such as anti-skateboard fins, if required, can be incorporated into seating and/or planters to prevent impact damage. Varying textures and surfaces will be sought to enrich the spaces.

MAINTENANCE

Whilst regular maintenance of the hard and soft landscape is expected, the design considered ways to lessen the burden of maintenance requirements. Areas of mass planting are proposed to provide visual impact without requiring a high-frequency of attention. Materials selection can also aid in decreased maintenance and resistance from vandalism. Surfaces that age gracefully, wear well and require minimal maintenance are being considered, such as natural stone paving and stainless steel.

However, the Green Wall requires specific and regular maintenance such as pruning to keep the climbers 'in check' and to avoid mature (larger) leaf forms, particularly if the Creeping Fig is selected. Maintenance access to the Green Wall is expected to be via a scissor lift or vertical mast rather than rope access but this requires further investigation to assess the options. The increased maintenance level for the Green Wall is offset by the continued benefits of the proposal, both visually and environmentally, to the public.

Resolution of the various aspects of the proposed landscape design will continue. This refinement of the proposed works will be based on the descriptions and performance objectives detailed above. Acknowledgment of ecological principles, provision of aesthetic and functional spaces and exciting design solutions will continue to guide resolution of the public domain landscape design.

SUSTAINABILITY

The intention is that ecological principles are integrated into the landscape design with the primary focus on water. Principles such as water sensitive urban design (WSUD), a thorough plant selection process and site microclimatic analysis inform the layout, materials selection and environmental response. Initiatives such as rainwater harvesting and reuse, consideration of the extent of embodied energy within landscape building materials, durability of material selection and resource requirements of new planting are all considerations.

The primary landscape ESD initiatives include:

- to capture stormwater and reuse for irrigation, in addition to recycled rainwater
- a water storage tank
- fall paving to facilitate surface water recharge to mass planting beds to reduce potable water usage
- an appropriate provision of planting to improve air quality and reduce the urban heat island effect
- the selection of hardy, low water use, indigenous plant

species suited to the harsh urban environment

- the selection of a range of plant species to support Biodiversity
- the possible use of recycled materials, soils and mulches (specified during documentation phase)

WATER CONSERVATION

Water is a key sustainability focus in Australian landscapes. Although many of the plant species to be selected will have low water requirements (and therefore inherently water conserving), water-efficient subsoil drip irrigation systems are proposed to ensure that the landscape is maintained to a high standard. Rainwater collected from the roof(s) and hard paved areas of the development will be reused for the irrigation water supply.

The irrigation system can be automatically scheduled via timer controls to ensure that any is undertaken after sunset, to further minimise any water loss to evaporation. To avoid any over-watering, soil moisture sensors can be installed to prevent the drip irrigation system from activating, overriding the timer controls if necessary. These systems are particularly critical for the Green Wall.

An indicative landscape plan and elevation of the Green Wall is provided as part of the drawing set. However, detailed landscape design and plant species selection will be finalised once the details of the Concept Plan have been considered.



