Chapter D5
Double Bay Centre

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Chapter D5  Double Bay Centre

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D5.1 Introduction

This is Chapter D5 of the Woollahra Development Control Plan 2015 (DCP), Part D Business Centres. It establishes detailed controls to guide future development in the Double Bay Centre.

Double Bay is a unique local centre, which enjoys a privileged position near the southern edge of Sydney Harbour at the base of a large natural amphitheatre.

Its accessibility and distinctive landscape quality evoke an appealing cosmopolitan character that is warmly valued by local residents and users of the centre.

D5.1.1 Land where this chapter applies

This chapter applies to the Double Bay Centre, as identified in Figure 1.

FIGURE 2 Location plan
D5.1.2 Development to which this chapter applies

This chapter applies to development that requires development consent.

Generally this will be mixed use retail, business, office and/or residential development, but may also include permitted uses such as child care centres, community facilities, and other uses as permitted by Woollahra LEP 2014.

Development should contribute to a vibrant centre that offers a unique living, working and shopping experience within a pedestrian friendly and attractive urban environment.

FIGURE 2 View along Bay Street towards New South Head Road indicating possible future development

D5.1.3 Objectives

The objectives of this chapter are:

O1 To retain and enhance through block connections which allow pedestrians to move freely within the Double Bay Centre.

O2 To develop the particular qualities of different parts of the Double Bay Centre.

O3 To encourage a diverse mix of uses in the Double Bay Centre and maintain retail uses at ground level.

O4 To conserve and enhance the visual and environmental amenity of all buildings and places of heritage significance in the Double Bay Centre.

O5 To ensure a high standard of architectural and landscape design in any new developments within the Double Bay Centre.

O6 To preserve and enhance the diversity of uses in the Double Bay Centre.

O7 To ensure that new development is compatible with the existing built form, and streetscape and village character.

O8 To encourage view sharing and individual privacy.

O9 To ensure new development is designed to be compatible with the heritage significance of listed heritage items.
D5.1.4 Relationship to other parts of the DCP

This chapter is to be read in conjunction with the other parts of the DCP that are relevant to the development proposal, including:

- Part E: General Controls for All Development - this part contains chapters on Parking and Access, Stormwater and Flood Risk Management, Tree Management, Contaminated Land, Waste Management, Sustainability, Signage and Adaptable Housing.
- Part F: Land Use Specific Controls - this part contains chapters on Child Care Centres, Educational Establishments, Licensed Premises and Telecommunications.

D5.1.5 How to use this chapter

Applicants seeking to redevelop or alter sites within the Double Bay Centre must carefully consider the context of their proposal and identify the Built Form Envelopes, Control Drawings and Development Controls in this chapter which apply.

Compliance with the provisions of this chapter does not guarantee that consent to a development application will be granted. Each development application will be assessed having regard to Woollahra LEP 2014, this DCP, other matters listed in section 79C of the Environmental Planning and Assessment Act 1979 and any other policies adopted by the Council.

The Double Bay Public Domain Improvements Plan (1999) should also be used as a guide to works in the public domain, and includes details of street tree planting, footpaths, street furniture, and vehicular and pedestrian crossings.

This chapter of the DCP is structured as follows:

D5.1 Introduction

General information about the Double Bay Centre chapter of the DCP, including why it was prepared, its objectives and its relationship to other planning documents.

D5.2 Understanding the context

Provides a summary description of the existing urban context. The Double Bay Centre Urban Design Study, on which this chapter was based, provides a more detailed description and analysis of the existing urban context.

D5.3 Urban structure

Provides an understanding of the current urban structure of the Double Bay Centre. Objectives for the future character, form and function of the Double Bay Centre are also described.

D5.4 Street character

Describes the desired future character of the streets in the Double Bay Centre.
Using the built form controls

The development controls are derived from the Double Bay Centre Urban Design Study. They respond to the strategies set out in Section 5.3.2 of this chapter and the desired future character described in Section 5.4.1.

Controls have been designed for each individual site in the Double Bay Centre to optimise development, whilst taking into consideration the potential of adjoining properties and public spaces. The adopted Urban Form Methodology (Section 5.5.1) provides a greater certainty of outcome for Council, community and site owners.

Built form controls in the Double Bay Centre are expressed in graphic form as built form envelopes on the control drawings and in written and illustrated form as development controls.

D5.5 Built form envelopes: Control drawings

The controls are in the form of building envelopes, which set the position of development on each site. There are two control drawings for every site in the Double Bay Centre; one showing the ground and first floor levels and the other showing all levels above.

The control drawings are accompanied by a descriptive legend, and further explanation is provided in Section D5.6. Three dimensional images of the building envelopes assist in the interpretation of the development controls.

D5.6 Development controls

These explain in written and illustrated form the following areas of building development:

- **Use** which refers to building use such as retail, commercial and residential.
- **Urban character** which includes building envelopes, setbacks, heritage, architectural resolution, roof design, awnings, privacy, signage and advertising, and outdoor eating.
- **Relationship to public domain** which includes awnings, colonnades, arcades, outdoor eating and ground floor frontage to lanes.
- **Amenity** which includes landscaped areas, above ground open spaces such as balconies and roof terraces.
- **Solar access and natural ventilation** which addresses these two matters.
- **Geotechnology and hydrogeology** which addresses geotechnical and hydrogeological impacts on any surrounding property and infrastructure as a result of development.
- **Parking and servicing** which includes pedestrian access and mobility, on-site parking, vehicular access, and site facilities.

There is an additional section that deals with the application of concessions for cultural facilities and for corner lots.
Appendix 1: Transvaal Avenue Heritage Conservation Area

Controls relating to development in the Transvaal Avenue Heritage Conservation Area.

Appendix 2: Kiaora Lands

Controls relating to development in the Kiaora Lands site.

The provisions of Appendix 2 prevail over the diagrams, figures, controls and other provisions in Sections D5.3 to D5.5 that relate to Kiaora Lands unless otherwise specified.
D5.2 Understanding the context

D5.2.1 Siting

The Double Bay Centre is located in Sydney’s Eastern Suburbs, in a large natural amphitheatre close to, but visually separated from the harbour foreshore. It sits at the base of a valley, cradled between the two ridges of Darling Point/Edgecliff and Bellevue Hill.

The principal entry into Double Bay is New South Head Road which traverses the centre. Other street connections include Ocean Avenue, Bellevue, Kiaora and Manning Roads and Greenoaks Avenue. New South Head Road is characterised by its unique street geometry, views to extensive landscape elements beyond, and a sense of spatial containment from the street edge building and surrounding landscape.

D5.2.2 Historical development

The settlement of Double Bay was established in 1834 by the creation of five streets between Ocean Avenue and Bay Street, forming the blocks containing 50 generously sized allotments. The catalyst for the establishment of the Double Bay village was the opening of New South Head Road as a private tollway.

FIGURE 3 Historical plan circa 1950

The development of Double Bay intensified and shifted toward New South Head Road around the time of the tramline extension past Edgecliff in 1898. This shift is revealed by the extension of Cross Street east to connect to New South Head Road, the creation of Short Street, and the tightly knit terrace house subdivision on the corner of Bay Street and New South Head Road.

Development between the wars concentrated along the New South Head Road corridor. During the 1960s and 1970s, the commercial area expanded into the adjoining predominantly residential areas of Bay, Cross, Knox and Patterson Streets.
Woollahra LEP 2014 identifies heritage listed properties in the centre, such as the Inter-War Golden Sheaf Hotel. An archaeological site containing sewerage infrastructure is located underground at the corner of Cross Street and New South Head Road. A heritage conservation area in Transvaal Avenue comprises single storey semi-detached cottages, and is a remnant of the centre’s former housing stock.

**D5.2.3 Built form**

The building stock in and around the centre reveals a cross section of architecture of varying quality. The built form of the centre reflects a mix of periods, building types and scale with no particular period predominating. The architectural and streetscape quality is generally undistinguished, with a few exceptions.

The buildings between New South Head Road, Bay and Short Streets have retained the fine grain evident in the early subdivision pattern. The allotments and buildings between Knox Street and Cross Streets are generally wider and shallower, but are coherent as a group in terms of grain, scale and massing. These buildings are honeycombed with arcades that allow a variety of pedestrian connections between the two streets.

The amalgamation and redevelopment of some sites along the north side of Cross Street have created buildings of different height and bulk to the predominant building stock. Some site amalgamation and redevelopment has also occurred along Bay Street and south of New South Head Road. The recent Kiaora Lands development contains a three storey retail building and car park with over 440 spaces.

**D5.2.4 Public parks and facilities**

The centre has one small park as a median in the centre of Guilfoyle Avenue. Two other parks adjoin the centre. Foster Park includes a baby health centre Woollahra Preschool and the Local History Centre, with a park which is heavily compromised by its steepness. Steyne Park on the harbour is very well used and its facilities include two playing fields, a playground and Double Bay’s only public toilet. It is also regularly used by the school children attending Double Bay Public School across William Street.

The minor community buildings include the small church hall at the corner of Transvaal Avenue and Cross Street, in the centre and the synagogue nearby in Kiaora Road.

Community facilities within the centre are the three storey public library which is part of a retail arcade that opens onto and a landscaped public plaza at Kiaora Lands, and the Studio 1 meeting room which is part of the Cross Street car park site.
D5.2.5 Access and circulation

The centre has limited street connections to the surrounding area along New South Head Road, Manning Road, Kiaora Road and Bellevue Road. The scarcity of connections arises from topographical constraints and very large block sizes that limit pedestrian accessibility and concentrates traffic into a few access points.

Vehicular traffic in the centre operates reasonably effectively, despite relatively few access points and the presence of through traffic. Parking is concentrated in council car parks on Cross Street and Kiaora Road. On-street parking is heavily used throughout the centre and adjoining areas.

The Double Bay Centre is serviced by a number of bus routes. Edgecliff Railway Station and the ferry wharf at the end of Bay Street provide further public transport links to the city centre and other parts of Woollahra.

The centre has an attractive ambience for pedestrians due to the generally continuous shop fronts along streets and through block arcades on shallow lots.

The harbour is accessible across Steyne Park and from Beach Street, Bay Street and Ocean Avenue. Extending streetscape improvements down to the ferry wharf will strengthen the connection of Bay Street to the waterfront.

D5.2.6 Building uses

The Double Bay Centre contains a mix of retail, commercial, service and residential uses. The retail activity is concentrated between Knox and Cross Streets, and along New South Head Road, Bay Street and Cross Streets.

High quality small scale speciality retailing defines the image and character of the Double Bay Centre. And in late 2014 the InterContinental Hotel opened on the former site of the Ritz Carlton Hotel after a significant renovation of the existing building.

The provision of more local services such as the Double Bay Library, which is part of the Kiaora Lands development, will benefit residents in and near the centre.
D5.3 Urban structure

D5.3.1 Structure of the Double Bay Centre

These maps provide an understanding of the current urban structure of the Double Bay Centre including key elements and features in the centre.

**FIGURE 4**
Urban structure
The extent of the Double Bay Centre showing significant places and the axis of New South Head Road.

**FIGURE 5**
Layout - major streets
Four or five storey buildings built to the street boundary are encouraged along the major streets to provide spatial definition.

**FIGURE 6**
Layout - lanes
The lanes are considerably narrower than the streets. Generally, two storey buildings are encouraged to spatially define lanes. Lanes provide discrete service access necessary for retail centres.

**FIGURE 7**
Layout - pedestrian connections
The pedestrian connections shown in this diagram indicate their most desirable locations. They supplement the existing layout of streets and lanes, increasing their accessibility. Through block connections are encouraged in most locations but not on corner sites.
This plan recognises the importance of the structure of public places from Guilfoyle Park along Knox Street to New South Head Road. Extending this pedestrian axis to the new library and square on Kiaora Lane should be encouraged to strengthen the connection between places on each side of New South Head Road.

This plan encourages the continuity of the fine building grain of Double Bay by applying a rationale of controls for lots that are less than 6m wide and/or less than 30m deep which differ from controls for other lots.

Buildings built to the street boundary spatially define the street. Building controls in this plan respond to street width and orientation, and adopt a consistent rationale relating to:
- street alignment
- building lines
- building height
- building articulation depth.

The unusual street geometry creates prominent corner sites and significant urban spaces. This plan recognises the importance of these places and encourages well designated buildings built to the street boundary which contribute to their spatial definition.

Note: Figure 4 (Urban structure), Figure 6 (Layout - lanes), Figure 8 (Layout - pedestrian axis) and Figure 10 (Built form - building to the street boundary) do not apply directly to Kiaora Lands. Refer to Appendix 2 for the relevant provisions for Kiaora Lands.
D5.3.2 Key strategies for the Double Bay Centre

Our vision for Double Bay is as a vibrant centre that offers a unique living, working and shopping experience within a pedestrian friendly and attractive built environment.

The intention of this chapter is to strengthen and enrich the existing urban structure of Double Bay and to create a memorable character for the Double Bay Centre by incorporating the following:

Enhance and improve the public domain and the provision of public facilities
a) Enhance the public domain of Double Bay by applying a coordinated approach to the public domain and streetscape.
b) Encourage multiple uses of Council car park sites such as providing community services and facilities at the ground floor and/or street façade and/or the roof terrace of Council’s car park properties.
c) Promote the important role that public transport plays in Double Bay.

Ensure that the centre maintains its commercial viability and competitive position within the Sydney retail market
a) Foster the existing mix of uses of the centre such as hotels, retail and commercial and upper level residential.
b) Encourage a flexible built form that can potentially support a diverse mix of uses in the centre.
c) Consolidate the retail centre and intensify its usage by encouraging active retail frontage to laneways and establishing transition areas on the edge of the centre to mediate between the centre and residential areas beyond.
d) Enhance the image of Double Bay as a premier boutique and designer fashion store destination.
e) Encourage increased food and service retail uses.

Develop the particular qualities of different parts of the centre
a) Encourage redevelopment of Double Bay’s address to New South Head Road by:
   – intensifying the urban scale and vitality of New South Head Road;
   – encouraging development that responds to and continues to describe the strong curved form of New South Head Road through the centre; and
   – retaining the views to large areas of vegetation existing at each end of the centre, beyond Bellevue Road to the east and Manning Road to the west.
b) Retain and enhance the sunlit block of arcades between Knox Street and Cross Street.
c) Spatially define the distinctive street geometry of Knox Street.
d) Reinforce the Bay Street promenade and vista to the harbour foreshore.
e) Retain the scale of small lot development and street character of Bay Street south of Short Street.

f) Reinforce the urban space at the end of Guilfoyle Park, using built form controls.

g) Create a new local focus on Kiaora Lane by completing the Kiaora Lands development which includes new retail shops, a library and public plaza.

**Retain and enhance pedestrian access and amenity in and around the centre**

a) Reinforce the intimate scale, active retail frontage and pedestrian amenity of the lanes and little streets in the centre.

b) Improve the pedestrian environment by:
   - increasing connectivity through the large block bound by Cross, Bay and William Streets, and Jamberoo Lane;
   - providing building setbacks and footpaths in lanes;
   - requiring continuous awnings in nominated areas.

c) Improve the pedestrian environment by encouraging well designed arcades and open air connections at nominated locations that complement the street and lane structure and which:
   - promote public access across private land;
   - are transition spaces between public places;
   - are activated by retail frontage;
   - have through-site visibility.

**Improve Double Bay’s built form to provide appropriate definition to the public domain**

a) Provide direction and certainty of outcome in relation to built form to ensure:
   - a coherent street scale;
   - compatibility with existing urban fabric;
   - a variety of building types;
   - a high level of environmental amenity.

b) Promote high quality architectural design throughout the centre that positively contributes to the streetscape.

c) Ensure that new development is compatible with the existing built, streetscape and village character

d) Establish building envelopes that define building height and building lines (at lower and upper levels) to provide coherent street definition.

e) Reinforce continuous active retail frontages along street boundaries.

f) Reinforce the presence of corner buildings addressing the public domain, recognising their importance in the centre in terms of street vistas, urban scale and identity.

g) Encourage view sharing and privacy.
h) Encourage discrete vehicle access from rear lanes, while retaining some active use and address to those lanes.

i) Preserve the ‘small shop’ urban character of the centre by limiting the width of retail frontages.

**Promote sustainable design principles and objectives in the development and use of the built environment**

a) Promote environmentally sustainable design (ESD) principles such as conserving energy, facilitating natural ventilation and lighting, limiting the depth of buildings and providing favourable orientation.

b) Promote developments that innovatively combine ecological, social, cultural and economic objectives.

**Conserve and enhance the visual and environmental amenity of all buildings and places of heritage significance in the centre.**

a) To identify character buildings within the Double Bay Centre.

b) To ensure that alterations and additions to character buildings and heritage items are compatible in scale, form and material with these buildings and items, and adjoining developments.

**To improve parking in the centre**

a) Improve parking and traffic conditions in the centre.

b) To improve traffic and parking management in the centre and minimise vehicular/pedestrian conflicts.

c) Provide adequate parking in new developments at basement level, in the centre of blocks or in other discrete locations.

d) Limit the impact of overflow commercial parking in predominantly residential areas.
D5.4 Street character

D5.4.1 Desired future character

The street is the primary organising element of urban structure. The street edge is the place where the public and private domains meet. By defining a particular vision for each street, public domain improvements and private development can be coordinated to produce a desired outcome.

This section describes the desired future character of each street in the Double Bay Centre. The Double Bay Centre Public Domain Improvements Plan (1999) should be used as a reference for works in the public domain, such as street tree planting, footpath design, street furniture and traffic devices.

The following is provided for each street in the centre:

- Existing character, which describes elements such as built form, streetscape, lighting, landscape and views;
- Desired future character, which outlines the urban design criteria for each street;
- Annotated street sections, which illustrate the existing and the desired future built form.

This information sets the context for development control described in Sections D5.5 and D5.6.

D5.4.2 Common street strategies

- Strengthen the spatial definition of streets by encouraging building to the street boundary.
- Provide continuous active retail frontage at ground floor level.
- Increase street surveillance and promote a safe environment.
- Strengthen all built form on corner sites.
D5.4.3 New South Head Road

Existing character

New South Head Road is a historically significant road connecting the city to South Head. The road traverses the Double Bay Centre where it has a strong curved form punctuated with vistas of green at either end. The quality and scale of existing buildings do not yet realise the potential of the space.

Desired future character

a) Accentuate the curved street geometry of New South Head Road with four and five storey buildings.

b) Retain green vistas at each end of New South Head Road.

FIGURE 12
Existing view towards the south west at the five way intersection of Cross Street and New South Head Road
FIGURE 13
Potential development at the five way intersection and New South Head Road based on the controls in this DCP

Setback development of the upper-most floor level from the street boundary

Build to the street alignment with masonry walls, articulated with deep window reveals or punched openings

Integrate sound attenuation devices into the design of the built street edge with enclosable balconies, articulated window sills, string courses, double glazing and the like

Parapets encouraged

Use the ground floor level articulation zone to encourage transition from the street to the shop – this space could also be used for outdoor dining or shop display

Provide continuous awning
D5.4.4 Bay Street (south)

Existing character

Bay Street connects New South Head Road with the harbour. Its north-south orientation results in the street being sunny throughout the day. It is lined by modest buildings on narrow lots, with irregular setbacks at street level and street trees. Together the elements contribute to an intimate and relaxed atmosphere. There are a number of buildings that have been identified as character buildings in Section 5.6.3.8 Heritage items and character buildings. These include several Victorian terraces that have been modified for retail use.

Desired future character

a) Retain the existing modest, lot related building widths and retail frontages.
b) Provide setback areas at ground level that can be used for outdoor eating or public circulation.
c) Retain the character buildings along Bay Street.
d) Maintain the avenue of trees.

FIGURE 14 Existing view down Bay Street to Cross Street
A variety of roof forms is encouraged
Balconies and rooms should overlook the street
Use adjustable screening to protect rooms from low angle summer sun
Character buildings retain existing front setback

Partially build to the street alignment with shop fronts, projecting rooms and balconies
Outdoor dining at street level is encouraged
Character buildings retain existing front setback
D5.4.5 Bay Street (centre)

Existing character

The central section of Bay Street is focused on Guilfoyle Park, which together with the surrounding streets, creates a generous area of open space. This space is defined and contained by the buildings on Bay Street and Guilfoyle Avenue.

Desired future character

a) Lot amalgamations on blocks in proximity to Guilfoyle Park.

b) Expand the public domain at street level and improve the civic character with street level building colonnades that face central Bay Street and Guilfoyle Park. Provide a built form that responds to the scale and civic importance of Guilfoyle Park.

c) Higher buildings are permitted around the park to provide appropriate definition of the space.

Location map and section direction

A variety of roof forms is encouraged
Build to street alignment with loggias and balconies
Provide adjustable screening to protect rooms from low angle summer sun

Design colonnades including the size and spacing of the columns integral with the building design and with regard to adjoining colonnades if they exist
D5.4.6 Knox Street

Existing character

Knox Street is located at the physical centre of Double Bay, and has high value retail premises. The street section is asymmetrical with the Cosmopolitan Centre having a higher form to the south. The lower built edge to the north is fragmented and varied, and some buildings suggest street level connections to other streets. The street has a pronounced curve which is articulated by the buildings on the north side and the lower levels of the Cosmopolitan Centre.

Desired future character

a) Retain the asymmetrical street section.

b) Accentuate the curved street geometry of Knox Street by encouraging building to the street boundary and continuous awning cover on the south side.

c) Retain street level connections to Knox Lane.

d) Allow 4 storey built forms on 50% of each site frontage to Knox Lane. See Control Drawings for more information.

Location map and section direction

Generally setback level 5 development from the street boundary

Continuous awning
Build to street alignment with articulated deep window reveals and balconies

Indicative existing built form
Articulation zone

Extend median planting of Oriental Plane trees
D5.4.7 Cross Street

Existing character

The subdivision pattern on each side of Cross Street differs significantly resulting in highly differentiated built form. The southern side of the street has wide and shallow lots, with arcades and sunny courtyards, which perforate the built form. The large buildings on the northern side are generally coarsely modelled and articulated. Corner buildings on Cross Street do not, in the main, provide good street definition.

Desired future character

a) Unify the street on the north side by building to the street boundary.
b) Retain street level connections to Knox Lane.
c) Allow 4 storeys on 50% of each site frontage to Knox Lane. See Control Drawings for more information.
d) Encourage arcades and courtyards on the south side that cater for outdoor eating and informal gathering.
e) Strengthen built form on corner sites.

FIGURE 16 Existing view down Cross Street at the corner of Transvaal Avenue
**FIGURE 17** Potential street character on Cross Street based on the proposed controls

- Set back level 4 development from the street boundary
- Use the ground level articulation zone to create courtyards or outdoor rooms which activate the street edge
- Continuous retail frontage

![Diagram showing potential street character on Cross Street based on proposed controls]

Continuous awning
Demountable enclosures for outdoor eating are permissible on this side of Cross Street

Indicative existing built form
Articulation zone
D5.4.8 The Lanes

Existing character

Most of the lanes are currently the “back” of lots. These are characterised by their lack of pedestrian amenity and extensive vehicle crossovers, and tend to be visually blighted by service areas and unscreened rubbish areas.

Desired future character

a) Facilitate the service role of lanes, while encouraging increased active retail frontage.

b) Improve pedestrian amenity by providing adequate footpaths, limiting the width and numbers of vehicle crossovers, setting buildings back on one side and preserving natural daylight to the lanes.

c) Enhance the spatial definition of lanes with ground and first floor building lines and buildings up to two storeys in height.
D5.4.9 Knox Lane

Existing character

Knox Lane has an intimate scale which is partly due to the lane’s changing alignment and related spatial enclosure. Physical and visual connection to other spaces at street level is primarily via through-site connections to Knox Street and courtyards to Cross Street. The spatial definition along the lane varies although most of the buildings are two to three storeys.

Desired future character

a) Retain and enhance the varied spatial definition of Knox Lane.

b) Retain and enhance the honeycomb of arcades and courtyards which connect Knox Street to Cross Street.

c) Encourage visual and physical connections between Knox and Cross Streets using:
   - arcaded and/or outdoor connections;
   - north oriented courtyards; and
   - arcade and courtyard creating buildings, which may vary from the control drawings in Section 5.5.8.

Location map and section direction

The use of roof terraces as open space is encouraged

Widen footpath to increase pedestrian activity

Increase active retail frontage

Two storey buildings along the lane frontage may be interspersed with arcades and courtyards.

Each development site may be permitted to build to 4 storeys on 50% of the Knox Lane frontage if it is interspersed with 2 storey development.

The build-to line is setback to expand the public domain at street level and improve pedestrian amenity.
D5.4.10 Short Street

Existing character

The building on the northern side of Short Street, and its extensive vehicle crossovers, establishes an overbearing scale and unmodulated façade which dominates the spatial quality of Short Street.

Desired future character

a) Increase active retail frontage.

b) Moderate the scale of built form along the north side of the lane with buildings of predominantly two storeys, set back 2m from the lane boundary, and interspersed with four storey development.

c) Apply a 3m setback on No.2 Short Street at the Short Street frontage.

d) Protect the amenity of the lane by preventing uninterrupted four storey buildings constructed to the street boundary along the northern built edge.

e) Widen footpath to southern side of Short Street.

The building line is setback to expand the public domain at street level and improve pedestrian amenity

Location map and section direction

Each development site may be permitted to build to 4 storeys on 50% of Short Street frontage if it is interspersed with 2 storey development.

Increase active retail frontage

Indicative existing built form

Articulation zone
D5.4.11 Gumtree Lane

Existing character

Gumtree Lane is spatially defined by the discontinuous two storey built form on its west side and the lane geometry that creates a central triangular site.

Desired future character

a) Retain the two storey built form and 2m setback on the west side.
b) Apply a 1m setback to the eastern side of Gumtree Lane.
c) Increase the spatial definition of the lane, and street surveillance with an articulated building addressing the lane from the central triangular site.

The use of roof terraces as open space is encouraged

Increase active retail frontage

The building line is set back to expand the public domain at street level and improve pedestrian amenity
D5.4.12 Goldman Lane

Existing character

The character of Goldman Lane is quite intimate with restaurant entrances on both sides of the lane and through-site links connecting to New South Head Road. Its spatial quality could be improved by strengthening the built form along each side.

Desired future character

a) Increase the spatial definition of the lane and street surveillance with an articulated building addressing the lane from the central triangular site.

b) Retain and extend the 2m set back on the south-eastern side of Goldman Lane.

c) Apply a 1m setback on the north-western side of Goldman Lane.
D5.4.13 Kiaora Lane

Existing character

The character of Kiaora Lane is compromised by its current “back of house” status, with loading vehicles, exposed on-site loading bays and rubbish bins. Recent lane widening creates a framework within which to improve the general character and particularly pedestrian amenity. A setback zone to its north side has been partially built.

Kiaora Lands occupies the southern side of the laneway. It comprises a three storey retail development with public space opposite the Double Bay Library and public car park. An arcade provides access from Kiaora Lands to New South Head Road near Knox Street.

Desired future character

a) Improve the civic quality of the lane and this side of the centre with a public building and public square adjacent to a through-site link to New South Head Road.

b) Enhance pedestrian amenity with a car park on the existing car park site with active retail addressing the lane.

c) Moderate the scale of built form along the north side of the lane with buildings of predominantly two storeys, set back 2m from the lane boundary, and interspersed with four storey development.

d) Protect the amenity of the lane by preventing uninterrupted four storey buildings constructed to the street boundary along the northern built edge.

Location map and section direction

A variety of roof forms is encouraged

4 storey development may be permitted on 50% of the site frontage.

A 2m setback is required to expand the public domain at street level and improve pedestrian amenity

Indicative existing built form (2014)

Articulation zone

Note: Refer to the built form envelopes in Appendix 2 Kiaora Lands for objectives and strategy for Kiaora Lane as it relates to the Kiaora Lane site.
D5.5 Built form envelopes: Control drawings

D5.5.1 Urban form methodology

This section contains control drawings which show building envelopes for every site in the Double Bay Centre.

The envelopes generally establish:
- four storey heights along streets;
- two storey heights along lanes; and
- lesser building depths above the first floor to achieve high amenity development flexible for residential or commercial uses.

This framework has been tailored to each site, taking into consideration its particular characteristics. These include:
- the relationship of buildings to the public domain such as the street, public park or square;
- the desired future character of the street in which the site is situated;
- its size and orientation;
- the significance of existing buildings and landscape;
- its optimum development potential; and
- managing the impact of its development on adjoining commercial or residential properties.

This urban form methodology defines a physical outcome for the centre, while encouraging innovative architectural design within the building envelopes. It provides more certainty of outcome for Council, community and site owners.

Controls for levels 1-2 (ground and first floor) differ to those for levels 3-5.

At street level the integration of retail and commercial uses, vehicular access and street awnings, are the primary needs to be considered. Upper floor level envelopes are designed to facilitate quality residential and commercial development.

For this reason there are two control drawings for each urban block in the Double Bay Centre, illustrating the level 1 and 2 and level 3-5 envelopes for every site. Summary built form drawings for the Double Bay Centre are provided in Sections 5.5.3 and 5.5.4.

The maximum floor space permitted is determined by the floor space ratio (FSR) in Woollahra LEP 2014. All development must comply with the applicable FSR control.

The control drawings use building envelopes to illustrate how floor space is to be distributed over the site. The envelopes have been designed to achieve a loose fit with the FSR to encourage building articulation, through-site connections, and some variation of building form and building character. The envelopes allow varied and innovative design; they are not to be used as a justification for FSR in excess of the LEP control.
A summary of some of the development controls in Section D5.6 such as setbacks and building articulation are provided with the control diagrams. The control drawings in this section should be read in conjunction with Section D5.6 which provides further explanation, and includes other relevant controls.
D5.5.2 Explanatory legend

The control drawings incorporate the following graphic symbols:

- **BUILDING ENVELOPE**
  - 100% of this area per floor may be built on
  - 50% of this area per floor may be built on
  - Area for building articulation
  - Refer to 6.3.3 for percentage of floor space permitted
  - Possible roof, roof terrace or courtyard below

- **MAXIMUM PERMISSIBLE BUILDING HEIGHT**
  - 8m height
  - 11.5m height
  - 14.7m height
  - 18.1m height

- **BUILDING LINES**
  - Continuous building line - 100%
  - Building line 50% - 100%

- **UPPER LEVEL SETBACK**
  - 3.5m setback of uppermost floor level (either level 4 or 5)

- **RELATIONSHIP TO THE PUBLIC DOMAIN**
  - Colonnade
  - Continuous awning
  - Arcades and walkways (indicated on 5.5.3 Double Bay built form envelopes - ground and first floor)

- **HERITAGE ITEMS + CHARACTER BUILDINGS**
  - Refer to 6.3.8 Heritage items character buildings
  - Sites with heritage listed items
  - Footprint of heritage listed building
  - Character buildings

- **LANDSCAPED AREA**
D5.5.3 Double Bay Centre built form envelopes, ground and first floors (levels 1 and 2)
D5.5.4 Double Bay Centre built form envelopes (levels 3 and above)
5.6.3 Urban character

Articulation
At the street frontage on levels 2-5 articulation comprises 80% internal space 20% external space. For the ground floor along New South Head Road, at least 60% of the articulation zone is external space.

See Section 5.6.3.3 Building articulation for more information.

Setbacks
Zero front setback to New South Head Road, Manning Road and Kiaora Road.
2m rear setback on Kiaora Lane.

See Section 5.6.3.4 Setbacks for more information.

Corner buildings
Selected corner sites are eligible for bonus FSR under Woollahra LEP 2014.

See Section 5.6.3.5 Corner buildings for more information.

Heritage items
New development or work to the Golden Sheaf Hotel at 423-431 New South Head Road must be compatible with the significance of this heritage item.

See Section 5.6.3.8 Heritage items and character buildings for all heritage controls and Woollahra LEP 2014.

Note: Section 5.6.3 also includes Architectural resolution and Roof design.

5.6.5 Amenity

Landscape areas
357-359 New South Head Road includes 50m² of landscaped area.

See also:
- Section 5.6.4 Relationship to public domain
- Section 5.6.6 Solar access and natural ventilation
5.6.3 Urban character

Articulation

New South Head Road: On levels 2-5, up to 80% of the street façade articulation zone must be internal space with the balance of the area used for external space.

Elsewhere: At the street frontage, articulation on all levels should be comprised of up to 40% internal space with 60% external space. See Section 5.6.3.3 Building articulation for more information.

Setbacks

Ground floor: Zero front setback to New South Head Road, Cross Lane and Transvaal Avenue, except Nos. 17-19 Transvaal Avenue which must be setback to align with adjoining cottages in the HCA.

A 2.4m setback applies on Cross Street between Transvaal Avenue and Jamberoo Lane.

Levels 2-5: Setbacks to match ground floor except at the corners of Transvaal Avenue and Jamberoo Lane as illustrated.

See Section 5.6.3.4 Setbacks for more information.

Character buildings

Character building: Cooper’s Corner, 475 New South Head Road.

See Section 5.6.3.8 Heritage items and character buildings for controls for character buildings.

Heritage conservation areas

Refer to Appendix 1 for development in the Transvaal Heritage Conservation Area.

Note: Section 5.6.3 also includes Architectural resolution and Roof design.

See also:
- 5.6.4 Relationship to public domain
- 5.6.5 Amenity
- 5.6.6 Solar access and natural ventilation
5.6.3 Urban character

Articulation
At the street frontage, articulation on levels 2-5 should be comprised of up to 40% internal space with 60% external space. See Section 5.6.3.3 Building articulation for more information.

Setbacks
Ground floor: Zero front setback to Bay Street. 3m setback on Transvaal Avenue except for Nos. 18-20 which must be setback to align with adjoining cottages in the HCA. 3.5m on Cross Street between Bay Street and Transvaal Avenue.

Levels 2-5: Setbacks to match ground floor except at the corner of Cross Street and Transvaal Avenue as illustrated. Balconies on levels 3 and 4 can project 1.2m into the setback, except balconies on level 4 if it is the top level.

See Section 5.6.3.4 Setbacks for more information.

Heritage conservation areas
Refer to Appendix 1 for development within the Transvaal Avenue Heritage Conservation Area.

Note: Section 5.6.3 also includes Architectural resolution and Roof design.

See also:
- 5.6.4 Relationship to public domain
- 5.6.5 Amenity
- 5.6.6 Solar access and natural ventilation
5.6.3 Urban character

Articulation

Cross Street: On the ground floor, internal space can occupy up to 100% of articulation zone. On levels 2-5, up to 40% of the articulation zone may be internal or external space.

New South Head Road: On levels 2-5, up to 80% of the street facade articulation zone must be internal space with the balance of the area used for external space.

Setbacks

Ground floor: A zero front setback applies except in Bay Street and Guilfoyle Avenue where a 2.4m setback applies, and at the Knox Street frontage of 45A Bay Street where a 3m setback applies.

Levels 4-5: A 3.5m setback applies to the uppermost level as indicated.

Corner buildings

Selected corner sites are eligible for bonus FSR under Woollahra LEP 2014.

See Section 5.6.3.5 Corner buildings for more information.

Character buildings

Character buildings: 45A Bay Street and 21-25 Knox Street.

See Section 5.6.3.8 Heritage items and character buildings for controls for character buildings.

Note: Section 5.6.3 includes information on Architectural resolution and Roof design.

5.6.4 Relationship to public domain

Colonnades

Colonnades must be constructed on the ground floor frontage of Guilfoyle Avenue and Knox Street and at the Bay Street frontage of 45A Bay Street.

Note: Section 5.6.4 includes more information on colonnades and a section on awnings.

5.6.5 Amenity

Lanscaped areas

38 Bay Street must include 265m² of landscaped area.

See Section 5.6.6 Solar access and natural ventilation also.
5.6.3 Urban character

Articulation

Bay Street: On the ground floor, internal space can occupy up to 100% of articulation zone. On levels 2-5, up to 40% of the articulation zone may be internal or external space. See Section 5.6.3.3 Building articulation for more information.

Setbacks

Ground floor: Zero front setback except for Nos. 28 and 30-36 Bay Street and 2 Guilfoyle Avenue which require a 2.4m for colonnades. A 2m rear setback applies to Gumtree Lane and a 0.7m setback applies to part of Brooklyn Lane.

Levels 2-5: Setbacks to match ground floor, except level 4 which must be setback 3.5m as indicated along Bay Street.

See Section 5.6.3.4 Setbacks for more information.

Character buildings

Character buildings are located at 14, 24-26, 9-15 and 29-37 Bay Street.

See Section 5.6.3.8 Heritage items and character buildings for controls for character buildings.

Note: Section 5.6.3 includes Architectural resolution and Roof design.

1.6.4 Relationship to public domain

Colonnades

Colonnades must be constructed on the ground floor frontage of Guilfoyle Avenue and Bay Street.

Note: Section 5.6.4 includes more information on colonnades and a section on awnings.

1.6.5 Amenity

Landscaped areas

28 and 30-36 Bay Street and 2 Guilfoyle Avenue must include landscaped areas as indicated.

See Section 5.6.6 Solar access and natural ventilation for more information.

Control drawing 5

Indicates location of street sections
D5.5.10 Control drawing 6

5.6.3 Urban character

Articulation
New South Head Road: On levels 3-5, up to 80% of the street façade articulation zone must be internal space with the balance of the area used for external space.

Knox Street: On the ground floor, internal space can occupy up to 100% of articulation zone. On levels 2-5, up to 40% of the articulation zone may be internal space.

See Section 5.6.3.3 Building articulation for more information.

Setbacks
The following setbacks apply: Bay Street, ground floor - 2.4m. 320-366 New South Head Road - 2m rear setback. 2-22 Knox Street 2m to Short Street and Goldman Lane. The uppermost floor of levels 4 or 5 at 2-22 Knox Street and 316-374 New South Head Road - 3.5m.

See Section 5.6.3.4 Setbacks for more information.

Note: Section 5.6.3 also includes Architectural resolution and Roof design.

5.6.4 Relationship to public domain

Awnings
A continuous awning must be provided at the frontage of properties on New South Head Road and Knox Street.

See Section 5.6.4.1 Awnings for more information.

Colonnades
Colonnades must be constructed on the ground floor frontage of Bay Street.

See Section 5.6.4.2 Colonnades for more information.
D5.5.11 Control drawing 7

### 5.6.3 Urban character

**Articulation**

On levels 3-4 up to 40% of the street façade articulation zone may be internal space with 60% external space. See Section 5.6.3.3 Building articulation for more information.

**Setbacks**

2.4m setback applies to the ground floor of 4 Manning Road and 11 Patterson Street on Kiaora Lane. See Section 5.6.3.4 Setbacks for more information.

Note: Section 5.6.3 also includes Architectural resolution and Roof design.

### 5.6.5 Amenity

**Landscaped areas**

8 Manning Road must include 90m² of landscaped area. See Section 5.6.6 Solar access and natural ventilation for more information.

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**Note:** The built form envelope controls for land that forms part of the Kiaora Lands site are replaced by the controls shown in clause A2.4 (Built form envelopes) of Appendix 2: Kiaora Lands.
D5.5.12 View 1: 3D view of building envelopes

View east along Cross Street
The building envelopes illustrate the permitted distribution of floor space in the centre. The FSR controls in Woollahra LEP 2014 limit the amount of floor space in the centre.

Note: This 3D view does not illustrate building envelopes as described in Appendix 2 Kiaora Lands.


D5.5.13 View 2: 3D view of building envelopes

View north along Bay Street

The building envelopes illustrate the permitted distribution of floor space in the centre. The FSR controls in Woollahra LEP 2014 limit the amount of floor space in the centre.

Note: This 3D view does not illustrate building envelopes as described in Appendix 2 Kiaora Lands.
D5.6 Development controls

D5.6.1 Format

This section contains the development controls for building and site elements in the Double Bay Centre. It provides further explanation of the Section D5.5 Built Form Envelopes: Control Drawings, and introduces additional controls not described in these drawings.

The following format is used:

Introduction

For most controls there is an introduction which explains the need and importance of including that particular element.

Objectives

The objectives define Council’s intention. They relate to the aims and objectives in Section D5.3 Urban structure, and the desired future character outlined in Section D5.4 Street character.

Controls

The controls establish the means of achieving the objectives. This section must be read in conjunction with the Built Form Envelopes: Control drawings that illustrate the site specific controls. Diagrams are incorporated with the development controls to assist interpretation.

Not all controls will be relevant to every development. The applicant must nominate and provide justification for any controls they consider irrelevant to their development.

If a development proposal departs from a relevant control the applicant must demonstrate how the development satisfies the underlying objectives of the control.
D5.6.2 Use

The distinctive mix of small scale shops, boutiques, restaurants, cafes, hotels, commercial premises and the like in the Double Bay Centre creates a friendly street environment that caters for the daily needs of the centre’s users and creates an attractive environment for visitors.

Continuous ground level retail frontage offers the benefits of safety, commercial activity and street life. The provision of mixed development can make a significant contribution to the local character, providing street surveillance and after hour activity in the centre.

Previously there was very little residential use within the Double Bay Centre. Development in the last 10 years has tended to be mixed use, with ground floor retail with residential above. Residential development is encouraged within the centre to:

- increase the areas activity and vibrancy at night;
- encourage the provision of a range of retail services, particularly food stores; and
- reduce the reliance on cars to access the centre.

Objectives

O1 Encourage upper storey residential development within the centre to enhance the cosmopolitan character of the Double Bay Centre.

O2 Encourage mixed use development to reduce transport and travel requirements.

O3 Encourage the continuation of retail and commercial uses at street level in the centre.

O4 Encourage first floor retail and commercial use.

O5 Encourage arcades and double fronted shops that provide through block connections for pedestrians.

O6 Limit the width of retail frontage to preserve the small shop character of the centre.

O7 Encourage multi-level dwellings on the upper storeys of development as a means of redeveloping small narrow allotments.
O8  Encourage activities which do not have unacceptable noise or other environmental impacts.

O9  Ensure that buildings are designed and constructed to minimise noise and other impacts on building occupants and adjoining properties.

**FIGURE 19** Reinforce existing small lot development prevalent in the centre

Site amalgamation is particularly discouraged on these lots.

Where small lots (lots that are less than 6m wide and/or less than 30m deep) are amalgamated, the façade of the new buildings should be articulated and modulated to reflect the historic subdivision pattern.

**Controls**

C1  Design for a mix of uses within buildings.

C2  Design durable and adaptable buildings, spaces and places.

C3  Design for retail, commercial and community uses at ground and first floor levels. Consider design solutions that promote retail, commercial use at first floor level such as galleried arcades.

C4  Access to residential uses should not occupy more than 20% of the ground floor frontage.

C5  The maximum retail frontage at street level for individual premises identified on the diagram above must correspond with current lot widths. Other lots must not exceed 15m for each street frontage.

C6  The architectural resolution of buildings on amalgamated small lots identified in Figure 19 must express existing lot widths.
D5.6.3 Urban character

5.6.3.1 Building envelopes

Building envelopes illustrate the limits of permissible building height, depth and location and are described on the control drawings, Section 5.5.5—5.5.11. The envelopes allow development that maintains the environmental amenity of buildings and the public domain with regard to building bulk, overshadowing, access to natural light and ventilation and views.

The building envelopes have been developed to foster a mix of uses in the centre, and to promote built form not reliant on artificial lighting, heating and ventilation. The deep ground and first floor building envelopes are suitable for retail and commercial uses, while the depths of envelopes for levels 3-5 are suitable for residential uses. The depth of residential buildings promoted in this chapter is based on the guidelines contained in the Residential Flat Design Code.

The building envelopes have been considered in conjunction with FSR. The FSR controls in Woollahra LEP 2014 limit the amount of floor space in the centre. The building envelopes illustrate the permitted distribution of floor space in the centre. The permissible floor space for each site (determined by FSR) is generally 80% of the theoretical floor space achievable within the building envelopes.

Uniform FSR facilitates development equity between sites; the envelopes allow flexibility in the ways the built form will be realised including the provision of arcades and through-site links.

Car parking above ground is not encouraged. If car parking is proposed at or above ground level (i.e. within the building envelope) the development may not achieve its maximum permissible floor space, and Council will not support a larger building envelope to provide for additional floor space.

FIGURE 20 3-dimensional controls
Highlighting the building envelopes.
Objectives

O1 Development should contribute to the desired future character of streetscapes with appropriate and consistent building forms.

O2 Encourage courtyards and light wells at ground and first floor level of deep blocks to allow natural lighting and ventilation.

O3 Enable the provision of through-site links and arcades.

O4 Encourage a variety of interior volumes, i.e. split levels, double height spaces and arcades.

Controls

C1 Development must occur within the building envelopes shown on the Built Form Envelopes: Control Drawings, Section 5.5.5—5.5.11.

C2 To create built form which is not reliant on artificial heating and cooling:
   a) habitable rooms should generally achieve a minimum floor to ceiling height of 2.7m; and
   b) level 3-5 building depth is limited to 15.6m including the articulation zones. When this is difficult to achieve in the residential component of a development, Council will consider variations to the overall building depth providing a minimum 80% of dwellings have windows that can be opened and/or doors in walls with differing orientations, to facilitate cross ventilation.

C3 Deep building footprints are permitted at the ground and first floor only.

C4 Building forms allow for:
   a) natural day lighting and ventilation; and
   b) privacy between dwellings or commercial premises.
5.6.3.2 Height

The permissible height of development in the Double Bay Centre is set in Woollahra LEP 2014. The control drawings in Section 5.5.5—5.5.11 illustrate the desired number of storeys for each part of the centre.

Building height has been determined by the need to preserve a pedestrian scale in the centre. Factors which play a role in achieving an appropriate scale relate to the width, orientation and character of streets and lanes. The envelopes generally establish three to four storey building heights along streets, and two storey building heights along lanes. Building above this height is required to be setback from the street or lane boundary to preserve amenity in the public domain.

Short Street, Kiaora Lane and Knox Lane have the potential to be more like little streets than lanes being wider than other lanes in the centre, and may include four storey buildings along the lane frontage interspersed with two storey buildings, provided that at least 50% of lane frontage is two storeys or less.

Objectives

O1 Encourage buildings to achieve the heights along street and lane frontages described by the control drawings.

O2 Provide floor to floor heights that provide amenity to building users and allow adaptable reuse of levels.

Controls

C1 To reinforce the built definition of streets, buildings should be well designed and achieve the maximum prescribed height along the primary street frontage.

C2 To achieve a variety of roof forms the floor level of the uppermost habitable storey must be at least 3.5m below the maximum permissible building height.

C3 The building (including lift tower machinery plant rooms and storage space) must be contained within the envelope height, with the following exclusions: chimneys, flues, masts, flagpoles communication devices, satellite dishes and antennae.

C4 The minimum floor to floor heights for the Double Bay Centre comply with the table below.

<table>
<thead>
<tr>
<th>Level</th>
<th>Use</th>
<th>Height</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ground floor</td>
<td>Retail¹</td>
<td>4m</td>
</tr>
<tr>
<td>Levels 2-5</td>
<td>Commercial office</td>
<td>3.4m</td>
</tr>
<tr>
<td>Levels 2-5</td>
<td>Residential</td>
<td>3.1m</td>
</tr>
</tbody>
</table>

¹ Applicants may choose to vary storey height using 3.7m height for ground floor and Level 2 to create double storey spaces with a combined floor to floor height of 7.4m.
5.6.3.3 Building articulation

Building articulation refers to the three dimensional modelling of a building facade. The control drawings indicate the area for building articulation on a site-by-site basis (see Section 5.5.5–5.5.11).

Building articulation along the street or laneway frontage establishes the relationship between a building and the street, through the use of entry porches, loggias, balconies, bay windows and the like. Building facades can be articulated to create a strong street address, and enrich the character of the street or laneway. Existing buildings along the south-eastern side of Bay Street in particular demonstrate a range of transition areas and modelled facades.

Building articulation should respond to environmental conditions such as orientation, noise, breezes, privacy and views, through the use of appropriate sun shading devices, noise barriers, privacy screens, and the careful location of balconies, terraces and loggias.

The street façade articulation zone shown on the control diagrams may be occupied by two types of space:

- **External:**
  - open balconies
  - void not occupied by built form
  - recessed balconies counted in proportion to the amount of the façade they are open to.

- **Internal:**
  - habitable rooms
  - bay windows
  - enclosed balconies
  - wintergardens.
FIGURE 22  3-dimensional controls
Highlighting the area for building articulation

FIGURE 23  Building articulation
The written controls nominate percentages of the building articulation zone to be “external space or internal space”. These include loggias, balconies, terraces, open stairs and walkways, and the like and must be wholly contained within the envelope.

Objectives

O1  Promote buildings of articulated design and massing, with building facades that contribute to the character of the street, and provide useable external spaces.

O2  Use building articulation to:
   a) generate high quality architectural resolution;
   b) provide private open space which addresses and overlooks streets and lanes;
   c) provide environmental amenity such as noise reduction and visual privacy through building articulation;
   d) provide thermal amenity within buildings such as screening and balconies for summer sunshading and maximising solar access in winter, appropriately scaled to their use and context; and
   e) encourage activity such as outdoor eating along street edges, to help animate the street.
Controls

C1 The following percentages of internal and external space should be incorporated with the composition of the building to achieve high quality architectural resolution at the street or laneway frontage.

C2 The mix of internal and external space for articulation areas shown on the control drawings that do not front a street or laneway may be determined by the applicant.

Note: The use of a palette of articulation elements is recommended to achieve high quality architectural resolution.

FIGURE 24 New South Head Road
On levels 2-5 up to 80% the street façade articulation zone may be internal space with the balance of the area used for external space.

On the ground floor of the south side of New South Head Road up to 40% of the street façade articulation zone should be internal space. The remaining 60% must be level with the footpath and should be part of the building or shop entry.

FIGURE 25 Bay Street South and south side of Cross Street
On levels 2-5 up to 40% of the street façade articulation zone must be occupied with either or both internal or external space.

On the ground floor up to 100% of the street façade articulation zone can be internal space.

FIGURE 26 All other areas
On levels 2-5 up to 40% the street façade articulation zone can be occupied with internal space.

On the ground floor up to 100% of the street façade articulation zone can be internal space.
5.6.3.4 Setbacks

Setbacks at street level can increase pedestrian amenity. Street level setbacks are most successful when they establish continuous and consistent building alignments.

Setbacks on upper levels allow solar access to streets, and establish an appropriate relationship between building height and street width.

The controls include a continuous or discontinuous building line that requires development to meet this alignment to reinforce or create a particular street character. For example the building lines and articulation zones will create lightly articulated buildings (New South Head Road) or highly articulated buildings with recessed balconies (Knox Street).

Objectives

O1 Encourage consistent building lines to provide coherent streetscapes.

O2 Introduce new setbacks at street level in selected laneways to improve pedestrian amenity.

O3 Where indicated provide street setbacks to the upper level of development to permit mid-winter sunlight.

Controls

C1 Building alignment must comply with the building lines shown on the Built Form Envelopes: Control Drawings, Section 5.5.5—5.5.11.

C2 Front setbacks are identified as building lines on the control drawings, Section 5.5.5—5.5.11. Front setbacks must define a coherent alignment to the public domain.

C3 Side setbacks must:
   a) protect privacy to adjoining buildings; and
   b) protect access to natural light and ventilation to adjoining buildings and residential areas.

C4 Rear setbacks must:
   a) where required, accommodate vehicle access to the rear of lots, provide consolidated deep soil landscaped areas where blocks adjoin residential areas; and
   b) protect privacy and facilitate solar access to adjoining buildings and gardens.

C5 Upper level street setbacks are identified on the control drawings, Section 5.5.5—5.5.11. Building articulation excluding floor area elements may be used between the setback line and the street boundary. Refer to Section 5.6.3.3 Building articulation.
5.6.3.5 Corner buildings

Corner buildings are highly visible and provide the opportunity for notable design solutions. Strong corner buildings can provide valuable street definition. Existing buildings within the study area that provide this definition include the buildings on the corners of Knox Street and New South Head Road, and Coopers Corner on the intersection of Bellevue Road and New South Head Road. Due to the distinctive street geometry strong corner buildings can play an important urban design role in the Double Bay Centre.

The corner lots that may be granted additional floor space are identified in clause 4.4A of Woollahra LEP 2014. Figure 27 is an example of a strong existing corner building. Figure 28 is an example of existing corner building that lacks scale. New development at this corner intersection should take a form similar to that illustrated in Figure 29.

FIGURE 27 376 New South Head Road
Located on the corner of Knox Street and New South Head Road, this building demonstrates good corner address

FIGURE 28 Existing corner buildings at the five way intersection near Cross Street currently lack the scale to adequately address this large space

FIGURE 29 The five way intersection could become a distinctive entry to the Double Bay Centre as illustrated, with buildings that strongly address the intersection. Where street geometries permit entries and windows should address the corner such as shown in this example
Objectives

O1 Encourage building massing and articulation that creates strong corner buildings.

O2 To outline the desired future character of corner sites where applicants seek to use an FSR of 3:1 per clause 4.4A of Woollahra LEP 2014.

Controls

C1 Consider the design of corner buildings in relation to street geometry, topography, sight lines and the design of skyline elements.

C2 Distribute building massing, such as height, to enhance the corner.

C3 Corner buildings are encouraged to achieve the maximum prescribed height along the street edge.

C4 Developments on sites listed below that comply with the development controls may be eligible for an FSR of 3:1 (refer to the floor space provisions in clause 4.4A of Woollahra LEP 2014):

a) Bay Street - 26, 28, 30/36, 38, 43, 45A, 49, 55;

b) Cross Street - 53; and


5.6.3.6 Architectural resolution

Buildings in the Double Bay Centre represent a mixture of 20th century buildings that are of variable style and quality. High quality architectural resolution will improve living and working environments, contribute toward an improved built definition of the public domain, and can help to define a local identity.

FIGURE 30 Architectural resolution

The masonry elements of a building can give it coherence
FIGURE 31  An existing building at Knox Lane showing an articulated upper level and roof

FIGURE 32  Architectural resolution
The building wall is set back from the street and is modelled with attached building elements

FIGURE 33  Twenty One Espresso demonstrates fine grained building form in Knox Street
Objectives

O1 Promote high quality architectural design throughout the Double Bay Centre to create a desirable and memorable environment.

O2 Encourage coherent streetscapes based on common design principles for each street and lane.

O3 Minimise the negative impacts of glare and reflectivity on adjoining public and private properties.

O4 To ensure that development enhances the visual quality and identity of the centre through well considered design, high quality materials and facade colours that do not dominate the street.

O5 The colour of the building facade is not intrusive or unreasonably dominant within the streetscape, and is compatible with the character of the centre.

Controls

C1 Provide a clear street address to each building. Clearly define pedestrian entries.

C2 Provide predominantly glazed shopfronts to ground floor retail areas. Roller shutters to shopfronts are not permitted.

C3 New buildings and facades do not result in glare that causes discomfort or threatens safety of pedestrians or drivers.

Note: A reflectivity report that analyses the potential glare from the proposed new development on pedestrians or motorists may be required.

C4 New buildings and facades must minimise the impact of glare and reflectivity on adjoining land.

C5 Materials must be compatible with the existing urban context, such as red face brick and rendered masonry, in street facade design.

C6 The external painting of a building in bright colours, corporate colours or fluorescent colours should be avoided.

C7 Any individual business branding and identity in external painting and colour schemes is to be subordinate to the main colour schemes in the street. (Also refer to the signage controls in Part E7 of the DCP, Section 7.2.2 When external painting of a building constitutes a wall sign.)

C8 The design of window and balcony openings must account for streetscape, heritage items, privacy, orientation and outlook.

C9 Richly articulate facades to express the different levels of the building and/or its functions.

C10 Blank party walls are to be avoided.

C11 Design commercial space to permit maximum flexibility for future uses.
C12 All rooms above ground floor level, including kitchens and bathrooms, are to have windows or skylights.

C13 The residential component of buildings must contain a variety of apartment sizes and layouts.

C14 Vehicular entries must be discrete and minimise conflicts with pedestrians.

### 5.6.3.7 Roof design

The Double Bay Centre is located at the base of a large natural amphitheatre. As a result, building roof forms are highly visible, often forming the foreground to a harbour view, and require a well-considered design response.

Existing roof forms vary with building type and architectural style and include a range of hip roofs, gables, flat roofs, parapets and roof decks. A predominance of buildings with parapets contributes to the urban quality of New South Head Road.

**FIGURE 34 Roof design**

A variety of roof types are possible in the Double Bay Centre. Roof forms need to be articulated to control the apparent scale of the building when viewed from above.

### Objectives

- **O1** Encourage highly articulated roof design that responds to building orientation and the location and character of Double Bay.
- **O2** Roof designs should create distinctive building silhouettes.
- **O3** Encourage a variety of articulated roof forms for the Double Bay Centre such as hips, gables, flat roofs, parapets and roof decks.
- **O4** Discourage the provision of air conditioning plant and equipment on the roofs of buildings to minimise visual impact of these services.
Controls

C1 Roof design must form a coherent part of the whole building and be articulated.

C2 A variety of roofs are permitted, including gabled and hipped roofs with habitable attic spaces, flat roofs and roof decks.

C3 Buildings along New South Head Road should provide a parapet.

C4 The profile and silhouette of parapets, eaves and roof top elements must be considered in roof design.

C5 Roof design must minimise building bulk and overshadowing.

C6 Air conditioning plant and equipment must be concealed from the exterior and be within the building. When roof plant is proposed it must be screened from neighbours and be integrated with the design of the roof and the composition of the building.

5.6.3.8 Heritage items and character buildings

Woollahra Council supports the conservation of the rich mixture of buildings, parks and places of special significance within the Municipality. Woollahra LEP 2014 contains various controls relating to the conservation of heritage items and areas. Woollahra LEP 2014 also contains incentives for developments that include the conservation of heritage items.

In the Double Bay Centre Woollahra LEP 2014 identifies heritage items and a conservation area. For example, the Golden Sheaf Hotel and the Transvaal Avenue Heritage Conservation Area which comprises single storey Federation semi-detached cottages. Development proposals must comply with the heritage provisions in Woollahra LEP 2014.

In addition, a number of buildings have been identified as character buildings. These have high streetscape value because of their strong architectural character and the way in which they address the street:

- Coopers Corner, 475-479 New South Head Road;
- Twenty One, 21-25 Knox Street;
- 45A Bay Street;
- 24-26 Bay Street;
- 14 Bay Street;
- 37 Bay Street;
- 35 Bay Street;
- 29-33 Bay Street;
- 9 Bay Street;
- 11 Bay Street;
- 13 Bay Street; and
- 15 Bay Street.
The Golden Sheaf Hotel is a heritage listed building. It demonstrates the contribution buildings constructed to the street boundary can make to the public spaces they address.
Objectives

O1 Protect and enhance heritage items and conservation areas.

O2 Encourage the sensitive adaptation or reuse of buildings that contribute to the spatial definition of the urban spaces they address.

Controls

C1 All new developments and works to existing developments are to be designed to be compatible with the significance of listed heritage items, conservation areas and nominated character buildings.

C2 For development within the Transvaal Avenue Heritage Conservation Area refer to Appendix 1.

C3 Development to a character building is to respect the building and complement and enhance the key characteristics of the building including:
   a) street edge definition;
   b) its material, detailing and character;
   c) its holistic building character related to articulation, massing, and patterns and distribution of wall opening.

C4 Variations to the building envelope will only be considered where it can be demonstrated that the variations support the sensitive adaptive reuse of heritage items relating to the building's massing.

C5 Where a character building is proposed to be replaced, the architectural quality and streetscape contribution of the proposed building must be at least equal to the quality of the building's material, character and detailing.

C6 Modifications to character buildings must retain or enhance the architectural streetscape value of the existing building.
D5.6.4 Relationship to public domain

The success of commercial centres is dependent on street edge activity. Street activation requires a safe, cohesive and attractive public domain. This section establishes objectives and controls for the street frontage elements of built form such as awnings, colonnades, arcades, walkways, courtyards, outdoor eating and address to laneways.

5.6.4.1 Awnings

Continuous awnings contribute to the street character of retail centres and provide weather protection for pedestrians. There are currently continuous awnings on both sides of New South Head Road and along a considerable part of the southern side of Knox Street. Awnings elsewhere in the centre are more varied and less continuous, and are often used to highlight building entrances.

FIGURE 37  Continuous awnings
Continuous awnings are required in these locations

FIGURE 38  Awning design
Suspended steel box section type with a minimum soffit height of 3.2m
Objectives

O1 Retain and supplement the existing awnings in the designated areas shown in the control drawings.

O2 Encourage consistent awning design throughout the centre.

Controls

C1 Development must provide continuous awnings to street frontages as indicated on the control drawings, Section 5.5.5-5.5.11.

C2 Awning cover should be within 5° of horizontal, with a minimum soffit height of 3.2m.

C3 The awning design should provide protection from sun and rain and be integrated with the building’s architectural resolution.

C4 Where no awnings are indicated on the control drawings, Section 5.5.5-5.5.11—the building entrances must have generous cover.

C5 Canvas blinds along the outer edge of awnings may be used to provide sun shading to the east and west facades. No advertising is permitted, however business identification signage may be acceptable.

C6 Under awning lighting may be recessed into the soffit of the awning or wall mounted on the building.
5.6.4.2 Colonnades

A colonnade is created when a building is set back from the boundary at street level with vertical supports such as columns supporting the building directly above. A continuous colonnade improves pedestrian amenity by extending the footpath at ground floor level, and providing shelter. Consistently spaced colonnade posts establish a pedestrian related rhythm.

Colonnades are most successful when they are continuous and consistent. Guilfoyle Park on Bay Street makes a substantial contribution to the ambience of the centre. This quality could be enhanced through appropriate built form which interprets the park’s civic importance in its address to the park.

**FIGURE 39 Colonnades**

Colonnades are required in these locations

**FIGURE 40 Colonnades on Bay Street articulate the importance of Double Bay’s main public place – Guilfoyle Park**
Objectives

O1 Encourage colonnaded buildings in Bay Street, between Cross Street and Short Street, which interpret Guilfoyle Park’s civic importance and establishes a spatial relationship between the park and the buildings which address it.

Controls

C1 Colonnades should be provided at ground floor level to street frontages as indicated on the control drawings, Section 5.5.5–5.5.11 and the street sections.

C2 Colonnade width must be 2.4m.

C3 Colonnades must have a minimum soffit height of 3.6m.

C4 Colonnade supports must be integrated with the building design and adjoining colonnades if they exist, and not unduly impact upon pedestrian thoroughfare, or obscure ground floor activity from the street.

C5 Colonnade design must respond to the articulation of adjacent buildings, and the broader desired future character.

C6 Colonnades must be level with the street paving, and be paved in accordance with the standard Double Bay pavers (refer to the Public Domain Improvements Plan 1999 and Council’s Technical Services Division for advice).
5.6.4.3 Arcades, walkways and courtyards

One of the defining characteristics of Double Bay is its honeycomb of external walkways and arcades. Good quality arcades have active retail frontages, and contribute to a vibrant pedestrian shopping environment. The provision of good quality arcades and walkways with a light and airy character is encouraged.

**FIGURE 41 Goldman Lane**
This walkway off Knox Street has retail frontages on both sides and a light airy character, which is promoted in this chapter

**FIGURE 42 Locations of existing arcades and through site links**
When redeveloping a site, existing arcades or through site links must be retained

|——— arcade |
|——— walkway |

**FIGURE 43 Desirable through block connections**
Arcades are permitted throughout the centre except on corner lots. This drawing shows the most desirable through block connections. Consider the proximity of nearby arcades when providing a new arcaded connection

|——— arcade |
|——— walkway |
Objectives

O1 Encourage new arcades and walkways that provide:
   a) public access across private land; and
   b) connections between streets and other parts of the public domain.

O2 Create arcades with active retail frontages.

O3 Encourage arcades that are supplemented with outdoor areas such as courtyards or outdoor rooms.

O4 To provide suitable amenity within arcades.

Controls

C1 All existing arcades and walkways must be retained or replaced when a site is redeveloped.

C2 Arcades must be mostly naturally lit and ventilated.

C3 External walkways must be paved in accordance with the standard Double Bay pavers (refer to the Public Domain Improvements Plan 1999 and Council’s Technical Services Division for advice).

C4 The proportions and character of arcades should reflect their importance in expanding the public domain and their location in the centre.

C5 Arcades must have a minimum:
   a) width of 3m; and
   b) ceiling height of 3.6m.

C6 Arcades must, to the extent possible, provide a clear sightline from one end to the other for surveillance and accessibility.
5.6.4.4 Outdoor eating

The Double Bay Centre is a desirable location for the provision of outdoor eating facilities due to the temperate climate, favourable orientation, leafy quality of streets and active street frontage.

Outdoor eating facilities have the potential to add to the liveliness of streets and activate other outdoor places.

![FIGURE 44 Outdoor eating](image)

Outdoor eating establishments can provide lively street activity in suitable locations

Objectives

O1  Encourage outdoor eating establishments where they provide a pleasant outdoor eating environment with minimal disturbance to pedestrian circulation and where they comply with Council’s associated codes and policies.

Controls

C1  Development is to comply with Council’s policy for footway restaurants.

5.6.4.5 Ground floor active lane frontage

Active street frontage is characterised by liveliness and activity associated with pedestrian activity, building entrances, shop entries and attractive shop displays.

The Double Bay Centre benefits greatly from a network of lanes that work in conjunction with arcades to provide pedestrian connections. As active pedestrian environments, the laneways have unrealised potential to intensify retail activity in the centre.

Note: An active frontage is defined as one or a combination of the following: entrance to retail, retail shopfront, entrance to residential/commercial above, cafe or restaurant if accompanied by an entry.
Objectives

O1 Provide an active frontage at the ground level of buildings facing lanes to add to the vitality, and usefulness of both lane and building.

O2 Coordinate the provision of vehicular and service access to maximise ground floor activity along lanes.

O3 Improve the pedestrian amenity of lanes to encourage a wide range of uses.

O4 Improve safety and security by providing active shopfronts to improve general lane surveillance.

O5 Discourage off-street loading facilities in laneways if on-street loading bays are available.

Controls

C1 A minimum of 75% active frontage to lanes, measured as a linear ratio across the width of a lot, is generally required. Development on narrow lots may vary this requirement if applicants demonstrate that the vitality and usefulness of the lot frontage is maximised.

C2 Vehicle access points and building entrances must be separate and clearly defined to avoid pedestrian and vehicular conflicts.

C3 Ensure service areas are unobtrusive and have minimal lane presence. Preferably orientate service areas within the building envelope, perpendicular to lane frontage.
C4 Services, such as garbage areas and electrical substations, should not dominate the laneway frontage or otherwise unreasonably reduce the opportunity to establish an active frontage to the laneway. Services should generally be located within the building envelope and integrated with the building design.

C5 Retail, restaurant, cafe shopfronts should be glazed and able to be opened and/or provide through shop/lot visibility.
D5.6.5 Amenity

5.6.5.1 Visual privacy

Visual privacy is an important consideration for residential development within the centre, and neighbours adjacent to the centre, as it is a major determinant of amenity.

**FIGURE 46** Recommended minimum separations between openings to achieve visual privacy

- **Habitable room**
  A room used for normal domestic activities that includes: a bedroom, living room, lounge room, music room, television room, dining room, sewing room, study, playroom, sunroom and kitchen.

- **Non-habitable room**
  A room of a specialised service nature occupied neither frequently nor for extended periods, including a bathroom, laundry, water closet, food storage pantry, walk in wardrobe, corridor, hallway, lobby or clothes drying room.

Source: AMCORD, 1995

**Objectives**

- **O1** Ensure development protects the privacy of adjacent residential neighbours.
- **O2** Ensure residential apartments and private open spaces have adequate visual privacy.
Controls

C1 Orientate main living spaces, and their primary openings, to the street or rear garden to avoid overlooking between neighbouring properties. Living areas with primary openings facing the side boundary should be avoided.

C2 Where openings face the side boundaries of properties, protect visual privacy between neighbouring dwellings by:
   a) providing adequate distance between opposite windows - use the illustrations in this section as a guide;
   b) offsetting facing windows of neighbouring dwellings; and
   c) providing obscure glazing, screening or planting.

C3 Protect privacy between dwellings proposed on a single development by adopting the recommended distance between openings illustrated in Figure 46. Alternatively use vegetation and balcony screening to protect privacy.

C4 Use building articulation, particularly in required building articulation zones, to provide visual privacy between buildings and the public domain.

C5 Primary door and window openings in residential living areas should be located towards the street and/or rear to protect privacy. Living areas with primary openings facing the side boundary should be avoided.

FIGURE 47 Carefully locate balconies to protect privacy

FIGURE 48 Vegetation and balcony screening must be used to enhance privacy when the recommended separations are not able to be achieved.

Source: AMCORD, 1995
5.6.5.2 Acoustic privacy

Acoustic privacy is an important consideration in relation to the residential component of the centre, and neighbours adjacent to the centre, because it is a major determinant of amenity.

Objectives

O1 Ensure adequate acoustic privacy to residential apartments and private open spaces in the centre.

O2 Protect the acoustic privacy of residential neighbours adjacent to the centre.

O3 Ensure the viability of housing, and greatly increase the amenity of dwellings, by minimising the impact of external noise sources.

Controls

C1 Building siting and layout, particularly with regard to the location of courtyards, terraces and balconies and the like, should minimise the transmission of noise to other buildings and private open space on the site and on adjacent land. The use of openings, screens and blade walls, and the choice of materials, should also be designed to minimise the transmission of noise.

C2 Minimising the impact of external noise sources on dwellings near noise sources by:
   a) addressing New South Head Road with recessed balconies, enclosed balconies, kitchens and/or living rooms; and
   b) locating bedrooms away from noise sources.

C3 Bedrooms should be located away from noise sources such as goods delivery and early morning garbage collections.

C4 Restaurants should be designed to minimise the impact of noise associated with late night operation on nearby residents.

C5 Rear courtyards are only permitted for restaurant use if Council is satisfied that the hours of operation do not have an unreasonable impact on residential amenity.

Note: Council may require a noise impact assessment report to accompany a development application.
5.6.5.3 Landscaped areas

Private gardens at the rear of residential blocks adjoining the centre collectively create large scale open spaces. To ensure development immediately adjoining these blocks preserves and extends these open spaces a landscaped area requirement is included in the control drawings, Section 5.5.5—5.5.11. Landscaped areas may be private, communal or publicly accessible.
Objectives

O1  Ensure development immediately adjoining residential blocks continues the pattern of built form and open space established in the block.

O2  Provide landscaped areas, typically in the centre of blocks, to preserve and extend established open spaces.

O3  Provide landscaped areas that preserve neighbouring residences’ access to day light and natural ventilation and provides visual privacy.

O4  Mature trees and other planting is encouraged within landscaped areas to maintain Double Bay’s existing leafy quality. Permeable surfaces are also encouraged to maximise the on-site infiltration of stormwater.

Controls

C1  Above ground development may not occur within the landscaped area shown on the control drawings, Section 5.5.5—5.5.11. 50% of the area designated as landscaped area must be a deep soil landscaped area.

C2  Car parking should be located under the building footprint to maximise deep soil landscaped areas.

C3  Plantings over underground structures should have sufficient soil depth to allow sustainable planting.

Note: A site-specific landscape specification is to be prepared for landscaping above underground structures. The specification should include considerations such as plant species, soil depth and drainage.

C4  One large mature tree, planted in deep soil, is required for every 100m² of landscaped area.
5.6.5.4 Private open space

Private open space includes ground floor garden areas and above ground open spaces such as terraces, loggias, balconies, or decks. The availability and accessibility of comfortable private and communal outdoor living areas is a major determinant of the ability of occupants to enjoy living and working in the Double Bay Centre.

**FIGURE 50** Above ground open space

Above ground open space may be created as a roof terrace

**FIGURE 51** Above ground open space

Above ground open space may be created within the articulation zone and should utilise prevalent breezes

**FIGURE 52** Lightweight pergolas, sun screens and planters can enhance the quality of roof spaces, and provide privacy
Objectives

O1  Ensure every dwelling in the Double Bay Centre has direct access to private open space.

O2  Encourage occupied roof areas with roof gardens behind parapets where private open space at ground level is not available.

Controls

C1  Provide at least one balcony, terrace, verandah, loggia, roof terrace or deck for each dwelling, within the area nominated for building articulation. This open space must be accessible from a principal living area.

C2  The preferred depth of the required open space is 2.4m and the minimum permissible depth is 1.8m. The minimum area of private open space is determined by the dwelling size:

<table>
<thead>
<tr>
<th>Dwelling size</th>
<th>Minimum required area of above ground open space</th>
</tr>
</thead>
<tbody>
<tr>
<td>Small dwelling: less than 60m²</td>
<td>8m²</td>
</tr>
<tr>
<td>Medium dwelling: 60m² - 90m²</td>
<td>12m²</td>
</tr>
<tr>
<td>Large dwelling: more than 90m²</td>
<td>16m²</td>
</tr>
</tbody>
</table>

C3  Roof terraces and balconies must be designed and orientated to protect the privacy of neighbours.

C4  Lightweight pergolas, sunscreens, privacy screens and planters are permitted on roof terraces provided they do not increase the bulk of the building. These elements should not significantly affect the views available from adjoining properties, the immediate vicinity or on the nearby ridges.

C5  The profile and silhouette of parapets, eaves and roof top elements must be considered in roof terrace design to provide an attractive building finish when viewed from the public and private domain.
D5.6.6 Solar access and natural ventilation

5.6.6.1 Solar access

Solar access is a major determinant of environmental comfort and residential amenity. Good passive solar design offers financial and environmental benefits, by reducing the need for artificial heating and cooling.

**FIGURE 53** Mid-winter and mid-summer solar angles for openings facing true north

The design of north facing balconies and rooms should aim to admit low angle winter sunlight, and exclude high angle summer sunlight.

**FIGURE 54** Solar angles for windows facing true north

Eaves, screens and the size of openings for north facing balconies and rooms, should be designed with regard to the noon 17 October / 26 February sun angles to maximise winter sunlight penetration, and minimise summer sunlight penetration.

Source: Energy Information Centre information sheet, May 1994
Objectives

O1 Minimise overshadowing of adjoining properties or publicly accessible spaces.

O2 Building form, separation and plan layout should facilitate good solar access to internal and external living spaces, to maximise natural heating and cooling and minimise the use of artificial systems.

Controls

C1 Preserve solar access to Guilfoyle Park and the footpath on the south side of Knox Street, Cross Street, and New South Head Road between 12 noon and 2pm on 21 June.

C2 Development should comply with the control drawings in Section D5.5 to ensure adequate solar access is provided to neighbouring properties.

C3 Development which does not comply with the control drawings must maintain existing solar access to existing development for at least three hours between 9am and 3pm on 21 June to north facing windows of habitable rooms, and at least two hours to at least 50% of the private open space.

C4 Access to sunlight should be achieved for a minimum period of three hours between 9am and 3pm on 21 June to windows of habitable rooms and two hours to private open space of new development.

C5 Locate main living spaces including lounge, dining, kitchen and family rooms toward north where possible.

C6 Skylights which provide the sole source of daylight and ventilation to habitable rooms are not permitted in residential or commercial development.
5.6.6.2 Cross ventilation

The design of buildings provides an opportunity to reduce long term energy consumption. Building envelopes in this plan promote thin cross section buildings which do not rely on artificial lighting and ventilation. Building design for natural ventilation should capitalise on Double Bay’s harbour side location and on-shore breezes.

**FIGURE 55 Cross ventilation**

Thin cross-section design achieves good cross ventilation and assists day lighting of rooms

**Objectives**

O1 All buildings should be designed to achieve natural ventilation.

O2 Design buildings with naturally lit habitable rooms.

**Controls**

C1 The maximum building depth of development for levels 3-5 is 15.6m to achieve buildings that are substantially naturally lit and ventilated.

C2 Encourage the provision of windows to all rooms, including kitchens and bathrooms, to facilitate natural light and ventilation. Avoid or minimise the reliance on mechanical ventilation or air conditioning.

C3 Encourage building articulation, such as light wells and courtyards, that allows daylight into ground and first floor levels.

C4 All dwellings in each development must have windows that can be opened and/or doors in walls with differing orientations, to facilitate cross ventilation by locating windows opposite each other. When this is difficult to achieve on non-rectangular lots with limited street address, at least 80% of dwellings within that development must comply.

C5 Skylights that provide the sole source of daylight and ventilation to habitable rooms are not permitted.
D5.6.7 Geotechnology and hydrogeology

Council will normally require geotechnical and hydrogeological reports for development applications which include below ground structures.

This is because the subsurface conditions within the Double Bay Commercial Centre generally comprise water charged alluvial sediments to great depth. The alluvium is predominantly sand which is typically loose near the surface but may at some locations be interlayered with soft compressible clay or peat bands at depth.

The groundwater level in the valley area is generally high and varies between RL 1.0 and RL 2.5.

Any proposed development with below ground structures must consider the sub-surface conditions and the effects of construction on adjacent properties. In addition, those which are likely to extend below the level of seasonal fluctuations in the groundwater table, must also consider the effect of any changes induced in the sub-surface water levels and the groundwater flow patterns on adjacent properties. Unless site specific information exists to the contrary, excavations deeper than 1m must be assumed to have this potential to intersect the groundwater level.

Council’s principal objective is to ensure there are no adverse geotechnical and hydrogeological impacts on any surrounding property and infrastructure as a result of development, during and after construction. Typically, adverse geotechnical impacts may include vibration induced settlements from construction methods and equipment and inadequate support of adjacent land during and after construction. Typically adverse hydrogeological impacts may include settlement induced by changes in the groundwater level and seepage problems.

Objectives

Buildings must be designed and constructed with appropriate support and retention systems to ensure that:

- **O1** There will be no ground settlement or movement, during and after construction, sufficient to cause an adverse impact on adjoining properties and infrastructure.
- **O2** There will be no change to the ground water level, during and after construction, sufficient to cause an adverse impact on surrounding properties and infrastructure.
- **O3** Vibration during construction is minimised or eliminated to ensure no adverse impact on surrounding properties and infrastructure.
- **O4** The risk of damage to adjacent existing property and infrastructure by the new development will be reduced to a level no greater than that from an event with an “unlikely” likelihood of occurrence and “minor” consequence.

Note: “adverse impact” means any damage caused to the improvements on adjoining properties by the demolition, excavation or construction on the development site.
Controls

C1 Excavation below 1m is accompanied by a geotechnical report and a structural report to demonstrate that the works will not have any adverse effect on the neighbouring structures.

Note: Council may identify other circumstances where these reports are required. All reports must be prepared in accordance with Council’s guidelines. Council may also require the preparation and submission of a pre-commencement dilapidation report for properties neighbouring the development.

Development applications include a design statement and supporting drawings (if necessary) that show the proposed design measures minimise risk and ensure that no adverse impacts will occur.
D5.6.8 Parking and servicing

5.6.8.1 On-site parking

The opportunity for on-site parking is restricted in many areas of the Double Bay Centre. The narrow width of some lots makes it impossible to accommodate more than two spaces on-site, and the level of the existing water table in the centre may make site excavation for underground parking difficult. This chapter aims to satisfy the parking demand likely to be generated by future development, whilst facilitating the redevelopment of narrow lots and discouraging over-reliance on cars.

FIGURE 5.6 On-site parking

If on-site parking is provided consider using a car hoist and turntable to maximise the efficiency of basement parking

Objectives

O1  Ensure the impact of car parking on the site and streetscape is handled discretely.

O2  Ensure the design of on-site car parking is safe and efficient, and integrated with the overall site and building design.

O3  Maximise natural light and ventilation to parking areas where possible.

O4  Encourage cooperative approaches to car parking provision between adjoining lots that are less than 6m wide and/or less than 30m deep.

O5  Ensure underground car parking facilities do not collectively create a continuous barrier to subsurface water flow.
Controls

C1  Parking provision must comply with Part E of this DCP, Chapter E1 Parking and Access, except where detailed below.

C2  Consolidated parking areas are preferred below ground level where possible and concentrated under building footprints to maximise the area for landscaping areas.

C3  Basement parking should be naturally ventilated if possible.

Notes:

Part E of this DCP, Chapter E1 Parking and Access provides the parking generation rates for the Double Bay Centre. In certain circumstances on-site parking is not required. See the Parking and Access chapter for details.

Major developments on the north-western side of New South Head Road are encouraged to provide spaces additional to their development requirements for public parking. This should be negotiated with Council during the pre-DA stage.

A cooperative approach to parking provision, where car parks may be amalgamated and share access and egress points, are encouraged between two or three lots that are less than 6m wide and/or less than 30m deep.

5.6.8.2 Vehicular access

The continuity of retail frontages is essential to the liveliness of the Double Bay Centre and its urban character. Vehicular crossings interrupt street activity, diminish amenity, and reduce the area for public on-street parking.

Objectives

O1  Maximise retail frontage in streets and lanes.

O2  Maximise pedestrian safety and amenity by minimising conflict between pedestrians and vehicles.

O3  Entrances to parking and servicing should not dominate the streetscape. The design, size and location of access to parking and servicing areas are to be discrete.

O4  Encourage cooperative approaches to car parking provision to reduce the number of vehicle access and egress points.

O5  Coordinate vehicular access with the provision of active frontages to lanes.
Controls

C1 Vehicular access to a building is only permitted via a rear lane or rear right of way where possible.

C2 If loading facilities are provided they must be located in a rear lane or side street.

C3 Driveway widths should be kept to minimum dimensions. Driveway crossings should generally be 3m, however a maximum width of 6m may be considered depending on the site, the location of the access point, and the capacity of the car park. Wider driveways are permitted only when it is necessitated by compliance with Australian Standards.

C4 Driveways to car parking above, below and at the ground floor level should be designed with minimal visual impact on the street, and maximum pedestrian safety. Pedestrian access to the development should be separate and clearly defined.

C5 Garage doors should be set back from the building line.

C6 Access ways to car parking should not be located in direct proximity to doors or windows to habitable rooms.

C7 Devices such as car hoists and turntables may be incorporated to provide access to car parking above and below the ground floor.

Note: Driveways and kerb crossings must be sited to have minimum impact on the root zone of existing street trees, and be designed having regard to the Public Domain Improvements Plan (1999) and Streetscape Design Manual and advice from Council’s Technical Services Division.

5.6.8.3 First floor car parking

This chapter aims to maximise the active frontage at street level throughout the Double Bay Centre. As car parking is an inactive space that can disrupt the vitality of a street, the provision of street level car parking should be minimised. Where basement car parking is not possible, first floor car parking may be permitted. Where first floor car parking is necessary, careful design should ensure it is unobtrusive and does not detract from the streetscape.

Objective

O1 Ensure first floor car parking is unobtrusive and does not have a negative impact on streetscapes.

Controls

C1 First floor car parking is not permitted to address street fronts. Parking space must be located in the middle of blocks or toward the rear of the allotment.

C2 First floor car parking that is incorporated within the building must be behind the building alignment and screened from the street.
C3 Facades screening car parks from the street must be high quality and allow natural lighting and ventilation.

C4 Vehicle access to first floor car parking must be integrated with the provision of active frontage to laneways. Vehicle access may not ramp along the street or lane alignments.

C5 Innovative approaches to car access and changing level, that minimise street impact and use space efficiently, such as car hoists, are encouraged.

5.6.8.4 Site facilities

Site facilities include loading areas, garbage areas, mailboxes, external stores, laundries and clothes drying areas. Development should provide appropriate site facilities for retail, commercial and residential uses, and minimise impact on the streetscape.

Objectives

O1 Ensure adequate provision of site facilities.

O2 Ensure site facilities are accessible, functional and unobtrusive.

Controls

C1 Site facilities, particularly garage areas, are to be visually integrated with the development to minimise their visibility from the street. Preferably orientate service areas within the building envelope, perpendicular to lane frontage. Such facilities must be located away from operable windows to habitable rooms to avoid amenity problems associated with smell. They must be located close to rear lanes where access is available.

C2 Ensure service areas are unobtrusive and have minimal lane presence. Preferably orientate service areas within the building envelope, perpendicular to lane frontage.

C3 Fire hydrants and booster pumps must be integrated into the front of the building façade and enclosed with doors. The enclosure should be clearly identified in a colour that suitably contrasts the façade.

C4 Lockable mailboxes must be provided close to the street, integrated with front fences or building entries.

C5 Buildings are designed to accommodate venting from ground floor uses to avoid potential impacts from exhaust and odour such as cooking smells.

C6 Air conditioning units and other plant equipment should not be readily visible from the public domain.
D5.6.9 Application of concessions

Concessions for cultural facilities

Cultural facilities are encouraged within the Double Bay Centre. Where applicants can demonstrate that the building form required for a cultural facility does not comply with the building envelope, flexibility with regard to the building envelopes may be granted.

- The following building uses are considered cultural facilities:
  - entertainment facilities; and
  - community facilities.

- Cultural facilities may be granted concessions with regard to permissible building envelope. No concessions to the LEP height and FSR controls will be permitted.

- To warrant concessions applicants need to demonstrate the proposed cultural facility:
  - maintains a building form compatible with the surrounding built form and streetscape;
  - meets the objectives of solar access; and
  - provides natural lighting and ventilation where possible.

Concessions for corner buildings

Strong corner buildings, which enhance the spatial definition of the public spaces they address, are encouraged. Selected corner buildings are eligible for an additional 0.5:1 of FSR under Woollahra LEP 2014, subject to meeting certain requirements.

Refer to Section 5.6.3.5 Corner buildings in this chapter and clause 4.4A of Woollahra LEP 2014, which outlines the controls that relate to corner buildings.
Appendix 1: Transvaal Avenue Heritage Conservation Area

A1.1 Introduction

Objectives

O1 To retain and enhance the existing contributory buildings in Transvaal Avenue and to ensure that they retain their visual prominence in the streetscape.

O2 To conserve the characteristics which give the Transvaal Avenue group of former residences its special sense of identity.

O3 To encourage replacement of buildings that detract from the townscape character of Transvaal Avenue.

Application of management policy

The management policy contained in clause A1.5 applies to the Transvaal Avenue Heritage Conservation Area.

A1.2 Historical outline

The property developer Edward Knox Harkness established Transvaal Avenue in 1900. The residential street was developed in the early 1900s with eight pairs of semi-detached houses, each named after the Transvaal victories that the British forces were enjoying in South Africa in the Boer War. The houses on the east side, Nos. 1-13 were named after the battles of the campaign and the houses on the west, Nos. 2-16 after the victorious British commanders, including Colonel Robert Baden Powell.

Transvaal Avenue was extended to its current length in the early 1920s, with the subdivision of the Lowlands Estate and the construction of six new detached dwellings. The avenue remained a quiet residential street until the 1970s when pressure mounted to develop the area. The ensuing debate finally resulted in the street being declared a conservation area under Woollahra LEP 2014 1995 and it remains so today.
A1.3 Character and description

Existing character

The character of Transvaal Avenue is formed by a unique relationship between the consistent and richly decorated Federation style semi-detached cottages, the street trees and landscaped central garden, the subdivision pattern which does not allow for car parking on site and its distinctive building form.

Each cottage has a steeply pitched terracotta hipped roof with chimneys and a gable with decorative timber barges. Occasionally bays occur at the street frontage. Low roof forms occurring towards the rear are covered in corrugated sheet metal.

The combination of these factors makes the shapes of buildings in relation to the street highly visible and its general bulk and massing critical.

The façade treatment and consistency of detailing are very important contributors to the streetscape character. The lack of awnings, the single storey building mass and close proximity of each pair of buildings tie the buildings together into a cohesive group within the street, while the variety of façade decoration adds visual interest and creates diversity within that overall cohesiveness.

Description of former residential building groups — Nos. 2-16 and 3-13

<table>
<thead>
<tr>
<th>Feature</th>
<th>Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>Roof</td>
<td>Terracotta hipped roof form with projecting gables at street front. Chimneys in face brickwork with unpainted stucco detail and terracotta chimney pots.</td>
</tr>
<tr>
<td>Verandahs</td>
<td>Verandahs with timber fretwork across the width of the building as a continuation of the main roof plane with a tiled projecting bay or gable. End blade walls with decorative brackets and urns. Tessellated tiled verandahs with marble thresholds.</td>
</tr>
<tr>
<td>Walls</td>
<td>Tuck pointed face brickwork with rendered base course.</td>
</tr>
<tr>
<td>Entrance doorways</td>
<td>Separated by projecting party walls.</td>
</tr>
<tr>
<td>Fences</td>
<td>Dividing front fences with timber square top palings.</td>
</tr>
<tr>
<td>Windows</td>
<td>Vertically proportioned double hung in painted timber.</td>
</tr>
<tr>
<td>Small front gardens</td>
<td>Now all paved.</td>
</tr>
<tr>
<td>Original interiors to the front two rooms</td>
<td>Coffered plaster ceilings with marble fireplaces separating the front two rooms.</td>
</tr>
</tbody>
</table>
A1.4 Summary statement of significance

The Transvaal Avenue retail strip provides a physical record of a significant historical phase in the evolution of the Double Bay Commercial Centre.

The group of buildings provides physical evidence of the working class residential boom at the end of the 19th century by a renowned local developer, Edward Knox Harkness, who was responsible for many fine Federation styled semi-detached cottages within the Double Bay area.

The quality and distinction of the architectural decoration of the turn of the century buildings exemplifies the economic boom in that period and the expansion of residential development after the introduction of the tram service to the City in 1894 and from Rose Bay in 1898.

The area provides an historical record of the time through the naming of each of the properties and the avenue after the victories of the British force in the South African Boer War. Transvaal is the alternate name of the South African Republic.

The consistency and relative intactness of the cottages with their fine Federation but Gothic style brick and tile construction, stucco details and timber fretwork creates a distinctive and aesthetically pleasing character.

The uniformity of form and scale within the Harkness development of the single storey brick and tile semi-detached cottages contributes to the unique qualities of the housing group within the Double Bay commercial precinct.

The streetscape has high aesthetic value which is enhanced by the closed vistas and the carefully maintained street trees and landscape works at the northern end.

The area has social significance to the local community, demonstrated through the involvement of the local community during the 1980s when the area was granted heritage conservation area status after the number of objections raised to the proposed redevelopment of the group.

A1.5 Management policy

The following policy statement encapsulates the approach to the development and care of the heritage significance of the Transvaal Avenue Heritage Conservation Area:

In recognition of the heritage significance of the Transvaal Avenue Heritage Conservation Area and its contributory buildings, the impact of proposed development on individual buildings, on the character of the streetscape and on the overall significance of the area must be considered as part of the assessment of all development applications in the area.

A heritage impact statement must accompany all development applications involving proposed changes to the external appearance of properties within the area, unless those proposed changes are deemed by Council to be of a minor nature and to not result in adverse heritage impacts.

Evidence of the historical fabric of the buildings must be retained and conserved, including evidence of the previous residential historical uses. Former place names and the decorative architectural features of the front two rooms and of the front roof form and elevations are of particular interest and must be retained and conserved.
The original terracotta roof forms, chimneys and chimney pots must be retained and conserved.

Significant and contributory shopfronts and interiors must be retained and conserved. Other shopfronts may either be retained or replaced unless identified as intrusive, in which case, replacement is the preferred option.

Contributory buildings in the Transvaal Avenue Heritage Conservation Area map, must be retained and conserved - specifically Nos. 2-16 and 3-15 Transvaal Avenue. These buildings must comply with the diagram of proposed controls below.

Contributory buildings which have been structurally altered should be reconstructed to their original appearance as viewed from the street front.

Buildings whose contribution is ranked as neutral in the Transvaal Avenue Heritage Conservation Area map shall (preferably) be retained and enhanced, but alternatively, may be redeveloped.

Buildings whose contribution is ranked as intrusive or neutral which are proposed to be redeveloped must comply with Section D5.5 Built form envelopes: Control drawings and D5.6 Development controls.

Additions must be located at the rear behind an extension of the existing terra cotta tile roof form, screened by a gablet form as indicated in the diagram of proposed controls. Additions must have regard to their potential impact on the character of the streetscape and should not result in changes in the apparent scale, form or bulk of existing buildings.

Off-street car parking is not permitted.
Significant street trees must be retained. The planting of trees and shrubs on the verges by property owners is discouraged unless the species and location is in accordance with Council’s Street Tree Master Plan.

**Diagram of proposed controls**

**KEY**

- **L1** Existing main section with tiled hip roof
- **L2** Existing secondary wing with corrugated steel roof
- **H1** Height to be equal to existing eaves
- **H2** Maximum permissible height to be equal to the height of the existing front ridgeline
Appendix 2: Kiaora Lands

A2.1 Background

The Kiaora Lands site shown in Figure 1 is a significant local precinct within the Double Bay Commercial Centre. The site comprises substantial public and private land holdings. In recognition of the precinct’s importance to the Double Bay Centre’s function and commercial vitality special provisions have been prepared.

Appendix 2 provides development objectives, strategies, principles and controls for the Kiaora Lands site. Other relevant objectives and controls are provided in Sections D5.1 to D5.6 of this plan. The provisions of Appendix 2 prevail over those in other parts unless otherwise specified.

Land beyond the boundary shown on Figure 1 may be included within the site for the purpose of development such as awnings, signs, architectural features, public domain improvement works and car parking.

FIGURE 1 Kiaora Lands
A2.2 Objectives

The objectives for development of the Kiaora Lands site are:

O1 To maximise the public benefit from ownership and development of the Council owned lands that form part of the site.

O2 To develop a high quality public domain that demonstrates a high standard of planning, urban design and landscape architecture.

O3 To protect and enhance the commercial role of the Double Bay Centre both locally and generally throughout Metropolitan Sydney.

O4 To provide a catalyst for increased business activity and private sector development in Double Bay.

O5 To increase the attractiveness of Double Bay as a place to live, work and shop.

O6 To improve traffic and pedestrian safety in Kiaora Lane.

O7 To minimise the effects of traffic, car parking and loading on local residents.

O8 To provide sufficient accessible and safe public and private car parking for development on the site.

O9 To provide additional public car parking that assists with meeting future needs within the Double Bay Centre.

O10 To establish high quality community facilities and public domain.

O11 To establish high quality commercial and retail development, including an expanded supermarket.

O12 To integrate the new private and public domain development with Double Bay’s existing public spaces and built form.

O13 To maintain or improve the amenity of adjoining residential areas and to protect the surrounding environment.

O14 To minimise the impact of development on adjoining properties and properties in the immediate locality.

O15 To ensure that development on private and public land is accessible.

O16 To provide a prominent public connection between Kiaora Lane and the public spaces of Knox Street and Guilfoyle Park.

O17 To ensure that the development meets best practice standards in environmentally sustainable design.
A2.3 Development framework

A2.3.1 Urban structure of Kiaora Lands site

Layout and street pattern

- Provides pedestrian connections.
- Provides a large footprint for a potential supermarket.
- Allows the closure of public roads to provide for a large footprint supermarket and car parking.

Built form

- Reinforces the form of buildings constructed to the street boundary along New South Head Road.
- Provides a transition between commercial and residential areas.

Public domain

- Provides a new arcade between Kiaora Lane and New South Head Road.
- Upgrades Kiaora Lane.
- Provides a public plaza adjoining Kiaora Lane.
- Provides new street tree planting.
- Provides an integrated pedestrian network.
FIGURE 2 Existing structure

FIGURE 3 Future structure
A2.3.2 Street character

This section describes the desired future character of existing streets within the Kiaora Lands site.

It takes into consideration the scale of each street and the interface between the public and private domains. The redevelopment of the Kiaora Lands site will bring about changes to the character of the existing streets.

The Double Bay Centre Public Domain Improvements Plan (1999) should be used as a guide to works in the public domain such as street tree planting, pavement design and street furniture. Applicants should also speak with Council’s Technical Services staff prior to submitting applications for work in the public domain.

The description of street character is to be read in conjunction with the built form envelope controls in Section A2.4 of this appendix.

Kiaora Road

Existing character

The Kiaora Road section of the Kiaora Lands site is currently residential and is dominated by modest scaled attached and detached bungalows. It is located opposite the Jamberoo Creek stormwater channel, which has been identified as one of several urban projects in the Double Bay Centre Public Domain Improvements Plan. Kiaora Road forms an edge of the commercial centre and reads as a continuum of the important Post Office intersection on New South Head Road.

Desired future character objectives

O1 Ensure that the built form on Kiaora Road is integrated with the desired future character of the commercial centre.

O2 Create a distinctive and identifiable edge to the commercial centre.

Strategy

a) Provide highly articulated buildings constructed to the street boundary.

b) Strengthen the built form at the corner of Kiaora Road and Kiaora Lane.

c) Design loading docks to minimise conflicts between pedestrian and vehicles. Pedestrians are to be given priority where car park and loading dock crossovers occur.

d) Provide new street planting to contribute to the tree lined nature of Kiaora Road.
**Patterson Street**

**Existing character**

Patterson Street is currently a leafy residential street with detached single storey dwellings on the south side with the Council car park and a three storey residential flat building on the north side.

**Desired future character objectives**

O1 Allow the closure of the eastern part of Patterson Street to accommodate a suitable footprint for a supermarket and car parking.

O2 Reinforce the existing leafy character at the western part of Patterson Street.

O3 Provide a transition between the commercial centre and the adjacent residential areas.

**Strategy**

a) Retain the existing London Plane tree on the northern side of Patterson Street opposite No.4 Patterson Street.

b) Retain existing street trees where feasible and supplement with new street tree planting.

c) Minimise conflict between pedestrians and vehicles.

d) Provide a dedicated pedestrian connection between Patterson Street and the car park.

e) Built form should be designed to contribute to the street. Outlook from the supermarket retailing area should be considered at the end of these streets as a means of providing surveillance along the street, hence increasing safety and animating and enlivening the building, particularly at night.

**Anderson Street**

**Existing character**

Anderson Street is currently a leafy tree lined street with car parks to both sides at the northern end.

**Desired future character objectives**

O1 Allow for the closure of part of the street to provide a suitable footprint for a supermarket and car parking.

O2 Reinforce the existing leafy character at the southern end of Anderson Street.
Strategy

a) Provide a dedicated pedestrian access and egress point between Anderson Street and the car park.

b) Built form should be designed to contribute to the street. Outlook from the supermarket retailing area should be considered at the end of these streets as a means of providing surveillance along the street, hence increasing safety and animating and enlivening the building, particularly at night.

New South Head Road

Existing character

The New South Head Road frontage is currently occupied by the single storey Woolworths supermarket.

This building provides a blank single storey frontage which is setback from the back of pavement approximately 1.2m.

Desired future character objectives

O1 Reinforce the character of building to the street boundary along New South Head Road.

O2 Provide a built form that recognises, and is sympathetic to, the adjacent heritage item.

O3 Establish a new civic building and presence.

O4 Provide a new, clearly visible arcade which connects New South Head Road to development south of Kiaora Lane.

Strategy

a) Comply with the street edge profile specified in Section D5.5 Built form envelopes: Control Drawings, except as stated in the following:

- Clearly indicate the entry point to the arcade on the elevation. Refer to Section A2.5.7 The new arcade.

- Setback the building to the west of the arcade at least 1.35m from the street boundary. Refer to edge condition D (West).

- Omit the 3.5m setback at the upper level of the New South Head Road frontage east of the arcade. Refer to edge condition D (East).

b) Provide a sophisticated high quality design response that reflects the civic role of the building.
Kiaora Lane

Existing character

The existing character of Kiaora Lane is compromised by its ‘back of house’ status, with loading vehicles, exposed on-site loading bays and rubbish bins. The lane lacks containment and activity on its south side due to the at-grade car park.

Pedestrian activity is generated by the car park and the four existing arcades that feed onto the lane from New South Head Road. Narrow and inadequate pathways on the lane cause conflict between vehicles and pedestrians.

Desired future character objectives

O1 To make Kiaora Lane into a significant part of the public domain in the Double Bay Centre.

The controls for Kiaora Lane are located in Section A2.5.5 The new public domain.
A2.3.3 Street trees

Existing character

The existing character of Kiaora Lands is strongly influenced by the mature trees on the site.

Desired future character objectives

O1 Retain the tree lined character of streets on and surrounding Kiaora Lands.

Strategy

Retain the following trees:

<table>
<thead>
<tr>
<th>Tree type</th>
<th>Botanical name</th>
<th>Location</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 London Plane</td>
<td><em>Plantanus orientalis</em></td>
<td>Road verge north side of Patterson Street approx. 85m east of Manning Road</td>
</tr>
<tr>
<td>2 London Plane</td>
<td><em>Plantanus orientalis</em></td>
<td>Road verge south side of Patterson Street approx. 85m east of Manning Road</td>
</tr>
<tr>
<td>3 London Plane</td>
<td><em>Plantanus orientalis</em></td>
<td>Road verge south side of Patterson Street approx. 65m east of Manning Road</td>
</tr>
<tr>
<td>4 London Plane</td>
<td><em>Plantanus orientalis</em></td>
<td>Road verge north side of Patterson Street approx. 45m east of Manning Road</td>
</tr>
<tr>
<td>5 London Plane</td>
<td><em>Plantanus orientalis</em></td>
<td>Road verge east side of Anderson Street approx. 40m north of Court Road</td>
</tr>
<tr>
<td>6 London Plane</td>
<td><em>Plantanus orientalis</em></td>
<td>Road verge west side of Anderson Street approx. 35m north Court Road</td>
</tr>
<tr>
<td>7 London Plane</td>
<td><em>Plantanus orientalis</em></td>
<td>Road verge west side of Anderson Street approx. 20m north of Court Road</td>
</tr>
<tr>
<td>8 London Plane</td>
<td><em>Plantanus orientalis</em></td>
<td>Road verge east side of Anderson Street approx. 15m north of Court Road</td>
</tr>
<tr>
<td>9 Swamp Mahogany</td>
<td><em>Eucalyptus robusta</em></td>
<td>Road verge west side of Kiaora Road approx. 20m south of Kiaora Lane</td>
</tr>
<tr>
<td>10 Southern Mahogany</td>
<td><em>Eucalyptus botryodios</em></td>
<td>Road verge west side of Kiaora Road approx. 30m south of Kiaora Lane</td>
</tr>
<tr>
<td>11 Oak</td>
<td><em>Genus quercus</em></td>
<td>Road verge south side of Kiaora Lane approx. 55m east of Manning Road</td>
</tr>
</tbody>
</table>
A2.4 Built form envelopes

Building envelopes illustrate the limits of permissible building height, depth and location and are described on the control drawings for New South Head Road and Kiaora Lane/Patterson Street.

Note: The statutory maximum building heights are in Woollahra LEP 2014. The maximum building heights are also shown in the chapter to provide detail to the envelope controls.

FIGURE 4

Edge conditions
D (East) – Boundary edge façade up to 18.1m to the east part of the frontage.
D (West) – A 1.35m setback to west part of frontage up to 14m and with a 3.5m setback up to 18.1m.
E – 32° inclined plane springing from the southern edge of the Plaza. Frontage a minimum of 18m from the southern edge of the Plaza. Variation to the inclined plane may be considered if the principal dining /public area on the south side of the plaza has sunlight access at 12 noon in mid-winter.

Note: The shape and location of the plaza in the diagram above is indicative only.
FIGURE 5
Edge conditions
A – 32° inclined plane springing from 3.5m south of the boundary, and with a building setback from the boundary of 7m for the ground floor level and 13.8m for levels above.
B – 64° inclined plane springing from the boundary, and a building setback of 1.5m from the boundary.
C – 32° inclined plane springing from the southern side of Patterson Street.
F – Plaza edge façade up to 13m. 2m deep colonnade at ground level.
G – Kiaora Road edge frontage up to 13m.
H – 45° inclined plane springing from a point 3m above ground level and 2.5m from the boundary to the adjacent property.
I – 64° inclined plane springing from the boundary, and a building setback of 2.5m from the boundary.
J – Kiaora Lane edge frontage up to 13m. A minimum of 7.9m from northern boundary of Kiaora Lane.

Note: The shape and location of the plaza in the diagram above is indicative only.
Condition D (West)

Conditions E + F

Condition G

Condition H
A2.5 Development controls

This section contains development controls that apply specifically to the Kiaora Lands site. These are to be read in conjunction with the relevant development controls in Sections 5.6.1–5.6.7 of this chapter.

A2.5.1 Use

The image and vitality of the Double Bay Centre will benefit from the mix of uses that is permissible on the Kiaora Lands site.

These uses include:
- shopping facilities such as a major supermarket, specialty food outlets and additional retail floor space, all of which supplement the existing distinctive mix of small scale shops, boutiques, restaurants, cafes and commercial premises that characterise the centre;
- community facilities that will give a civic presence to the centre;
- commercial premises; and
- parking.

A2.5.2 Height

The height of the building envelope for the Kiaora Lands site is indicated on the control drawings in Section A2.4 Built form envelopes.

The following table provides the approximate floor to floor heights for different uses:

<table>
<thead>
<tr>
<th>Use</th>
<th>Height</th>
</tr>
</thead>
<tbody>
<tr>
<td>Retail (small footprint)</td>
<td>4m</td>
</tr>
<tr>
<td>Supermarket</td>
<td>6m</td>
</tr>
<tr>
<td>Library</td>
<td>5.5m</td>
</tr>
<tr>
<td>Commercial</td>
<td>3.5m</td>
</tr>
<tr>
<td>Car parking</td>
<td>3m</td>
</tr>
</tbody>
</table>
A2.5.3 Built form south of Kiaora Lane

Principles

P1  The functional and operational requirements of large retail outlets should not compromise the qualities of the adjacent public domain.

P2  The built form should not compromise the amenity of adjoining properties.

P3  The built form should be compatible with producing attractive public domain.

Controls

C1  Comply with edge conditions in Section A2.4 Built form envelopes, Figure 5.

C2  The building setback included in edge condition A is to accommodate deep soil landscaped areas to mitigate the impact of the built form. The minimum width for deep soil landscaped area is 4.5m.

C3  The supermarket should not present uninterrupted blank walls onto streets and public spaces.

C4  The building frontage facing Kiaora Lane, Patterson Street and Kiaora Road is to be articulated so as to break up the length of the built form and reflect the vertical proportions of development in the Double Bay Centre.

C5  The main frontage of the supermarket is to be highly transparent and activated.

C6  Access to specialty retail outlets is to be directly from the public domain.

C7  Awnings are to be provided along the Kiaora Road and Kiaora Lane retail frontages.

C8  Provide wet weather protection at the entrance of the supermarket.

C9  The retail and office development at Kiaora Road should provide articulated walls and windows to street.

C10  All mechanical plant is to be designed on the basis that if that equipment could operate at any time of the day or night, then its noise emission component, when measured at the nearest, or at any other residential property façade, must not exceed the nocturnal background level.

The cumulative noise level from all relevant items of mechanical plant and equipment, when measured at the same location must not exceed the nocturnal background level by more than 5dB(A).

Note: The background noise level is to be measured on a windless Tuesday night which is normally the quietest night of the week. The results of this measurement must not be degraded by the noise of passing traffic, or by the noise from vehicles entering, or exiting the Anderson Street entry and exit. This may require the background noise level to be measured when the Anderson Street entry and exit is closed.
C11 The use of the premises must not give rise to noise which exceeds the relevant nocturnal background sound levels by more than 5dB(A) when measured at the façade of the nearest, or any other residential premises.

C12 External pipes, vents, fans or other items of plant must be individually specified to produce components of noise emission which are less than the relevant background sound level at the façade of the nearest of any other residential property. All such plant is to be located as far away as possible from residential properties. In the event that pipes, high velocity air discharge outlets or other pipe work are installed on the face of the building or extend through the rooftop, those outlets must be equipped with acoustically effective discharge silencers and have their directional discharge pointing in a north-westerly direction.

C13 The façade to Patterson Street is to be highly articulated with the use of a variety of materials and finishes to mitigate its bulk and visual impact.

C14 Screen landscaping sufficient to mitigate the bulk of the building is to be provided in the perimeter landscape areas.

C15 The landscaped area between the Court Road property boundaries and the proposed supermarket is to be a minimum of 7m wide.

C16 The landscaped area is to be free of car parking.

C17 The ground floor car parking where it faces residential properties to the south is to be completely enclosed.

C18 The ground floor level car park roof is to have a green roof design.
A2.5.4 Built form north of Kiaora Lane

Principles

P1 The building is to be of exemplary design commensurate with its civic function.

P2 The building should not compromise the adjoining heritage item.

P3 The pedestrian connection between New South Head Road and Kiaora Lane is to be strengthened.

Controls

C1 Comply with edge conditions in Section A2.4 Built form envelopes, Figure 4.

C2 At the New South Head Road frontage, the setback between the adjacent heritage item to the west and the northern end of the arcade is to be a minimum of 1.35m from the street boundary to reflect that point on the adjoining heritage item where the gable parapet wall springs up from the façade parapet.

C3 The building is to accommodate a clearly visible arcade which connects New South Head Road to development south of Kiaora Lane (see Section A2.5.7 The new arcade).

C4 A public plaza is to be provided to the south of the building (see Section A2.5.8 The new public plaza).

C5 Active retail or civic frontages are to be provided to the New South Head Road frontage, the plaza and the arcade.

C6 Access to specialty retail outlets is to be directly from the public domain.
A2.5.5 The new public domain

The public domain of Double Bay is characterised by an intricate pedestrian network of streets, lanes, walkways and arcades, making it a highly permeable shopping centre.

The planning and urban design provisions for the Kiaora Lands site reinforce this permeability with requirements for a new arcade between New South Head Road and Kiaora Lane, a new plaza, restrictions on vehicle movements along Kiaora Lane and the maintenance of pedestrian links between Kiaora Lane and Anderson Street.

The Double Bay Centre is also characterised by a series of distinctive public places such as Knox Street, Bay Street, Guilfoyle Park and Transvaal Avenue.

The public domain of the Kiaora Lands site will be a premier public space within the centre’s hierarchy of spaces. The character of the public domain is largely derived from the relationship between the buildings that address and form the public domain. It is also dependent upon the nature and quality of streetscape elements such as paving, street furniture, lighting and planting material.

Principles for all public domain on Kiaora Lands

P1 Ensure the public domain is of a high standard and exemplary urban design.

P2 Provide a high level of pedestrian amenity and create improved public spaces with a community focus.

P3 Consider the needs of people with access difficulties.

P4 Reduce conflicts between pedestrians and vehicles.

P5 Enrich and enliven the main spaces by providing high quality design elements and/or works of contemporary art.

Controls

C1 The public domain design should consider the Double Bay Centre Public Domain Improvement Plan 1999 and seek advice from Council’s Technical Services staff prior to submitting a development application.

C2 The pavement system used in the main spaces is to be of predominantly segmental stone elements (laid on a suitable concrete base).

C3 The pavement system is to comply with AS/NZS 4586 Slip resistance classification of pedestrian surface materials for safety and slip resistance.

C4 Ensure that shops are level with the adjacent external public spaces.

C5 Reinstate the tree lined nature of the streets and lanes.

C6 Awnings must be designed to accommodate street trees.

C7 Minimise the presence of vehicles in Kiaora Lane and the plaza.
C8 Use bollards to allow freedom of pedestrian movement while preventing vehicular access to specific areas. Bollards are to be used sparingly and are not to be used simply to define edges to vehicular paths.

C9 Minimise use of signage.

C10 The Davis Cup commemorative plaque is to be reinstated and is to be explained with interpretive signage. The position of the plaque is to be determined with regard to the location of the original tennis courts.

**A2.5.6 Kiaora Lane**

Kiaora Lane is to function as a shared pedestrian and vehicular way for the whole of its length. Its role as a service lane will continue but this is to be subservient to its primary role as a high quality public space. The predominant character of the lane is to be that of a high quality, pedestrian dominated space that maximises pedestrian connections between other public spaces and building entrances.

**Principles**

P1 Ensure that Kiaora Lane has good connections to existing arcades.

P2 Enhance the pedestrian experience and amenity of the lane.

P3 Reinforce the spatial definition of the lane.

P4 Encourage a mix of uses onto the lane including community facilities and food retailing.

P5 Enhance public safety and security of the lane.

P6 Encourage an active shared zone.

P7 Provide a high quality urban space.

**Controls**

C1 Frontages to Kiaora Lane are to be active retail or civic functions.

C2 Kiaora Lane is to be a shared zone as defined by the Roads and Traffic Authority.

C3 Provide a high quality unified pavement treatment along the full length of Kiaora Lane from Manning Road to Kiaora Road.

C4 The selection of materials for the shared zone in Kiaora Lane is to identify it as a space where pedestrians have priority.
**A2.5.7 The new arcade**

A major arcade is to be provided between New South Head Road and Kiaora Lane.

**Principles**

P1 Provide a major public pedestrian link between New South Head Road and Kiaora Lane.

**Controls**

C1 The arcade must be naturally lit from above and naturally ventilated.

C2 The arcade is to be a minimum width of 5m at the ground and upper levels.

C3 The arcade is to be designed for 24 hour public access.

C4 The entrance to the arcade at New South Head Road is to be clearly identified through architectural design.

C5 The shop frontages to the arcade are to be designed to create a visually unified whole.

C6 The floor treatment to the arcade should read as a continuation of the adjacent public spaces.

**A2.5.8 The new public plaza**

A new pedestrian plaza is required as part of the redevelopment of the site. The plaza is to be designed as a special place. It will require site specific design elements and the incorporation of public art. The space should be modulated to allow for defined areas of public circulation, seating areas and potential outdoor eating areas.

**FIGURE 6 Location of plaza**

*Note: The shape and location of the plaza in the diagram below is indicative only*
**Principles**

P1 Ensure that the plaza has a distinctive character that is commensurate with its importance as a key civic space in the Double Bay Centre and the civic role of the adjoining building which fronts New South Head Road.

P2 Active retail and civic uses are to face the plaza.

P3 Ensure the plaza is animated by sunlight.

**Controls**

C1 Provide a space which accommodates the section diagram (see edge condition diagram E + F in Section A2.4 Built form envelopes).

C2 Ensure that the floor of the plaza receives solar access at midday on June 21.

C3 Provide a 32° inclined plane as a component of the building envelope controls to ensure solar access during winter. Refer to condition E of Section A2.4 Built form envelopes.

C4 The plaza is to be designed as an identifiable public space, allowing 24 hour access.

C5 The plaza is to be designed primarily as a place for people, but will permit vehicles to pass through under the shared zone arrangements for Kiaora Lane.

C6 The plaza is to be a minimum of 18m in any direction. It is to have an area of at least 500m² which is a single space such that people in any two places in the plaza can see each other.

C7 Frontages to the plaza are to accommodate active retail or civic functions.

C8 The majority of the area of the plaza is to be uncovered and free of overhanging buildings, colonnades and awnings.

C9 An overhang of 2m, 3.5m above the finished ground level of the plaza is permitted on the southern side of the plaza.

C10 Overhanging balconies of 2.4m on the first floor level are permitted on up to 30% of the building on the northern side of the plaza.

C11 The northern edge of the supermarket, where it adjoins the plaza, should provide windows overlooking the plaza.

C12 The plaza shall have a distinctive unified ground treatment.
A2.5.9 Public toilets

Public toilets are to be provided.

Principles

P1 Provide public toilet facilities on the Kiaora Lands site.

P2 Public toilets are to be in a safe and convenient location.

Controls

C1 Position the public toilets close to the plaza in a safe and convenient location.

C2 Ensure adequate surveillance to the entries of the public toilets.

C3 Access from the plaza to the public toilets is to comply with the performance criteria in the Building Code of Australia DP1 DP2 DP3.

A2.5.10 Car park and loading dock design

Principles

Ensure the design of the car park:

P1 Facilitates ease of access.

P2 Facilitates walking and bicycle use.

P3 Provides a high level of safety for all uses.

P4 Minimises opportunities for crime to property and persons through consideration of crime prevention through environmental design principles.

P5 Minimises the amenity impacts of the car parking and loading docks on surrounding properties and public domain.

Controls

C1 Provide a car park layout that maximises visibility and legibility.

C2 Ensure dedicated pedestrian entry and egress points to the public car parking are available from the plaza, Kiaora Lane, Patterson Street, Anderson Street and the supermarket entry.

C3 Access to liftwells and stairways or directions to the car park access points must be clearly visible from every car parking space.

C4 Car parking spaces for disabled people should be located in highly visible and accessible locations and in proximity to lifts and ramps.
C5 Dedicated bicycle parking is to be provided in a convenient location at the rate of 1 bicycle per 25 car spaces.

C6 Dedicated motorbike parking is to be provided in a convenient location at the rate of 1 motorbike per 25 car spaces.

C7 Lighting throughout the car park must conform to the requirements of AS 2890 Off Street Car parking and AS 1680.2 Interior Lighting.

C8 Pedestrian access ways to, from and around the car park must be well lit.

C9 A ground level through-site pedestrian footpath linking the plaza and Anderson Street must, as a minimum, incorporate the following design and operational features:
   a) dignified, direct and unobstructed access from the plaza to Anderson Street;
   b) have a minimum clear width of 2.5m;
   c) have a minimum headroom of 3m.

C10 Vehicular access to the car park and loading docks south of Kiaora Lane is not to be provided from Kiaora Lane, unless it can be demonstrated that a turntable solution for the Kiaora Lane/Patterson Street loading dock is not feasible.

C11 Access to loading docks may be from Kiaora Road and Patterson Street only, unless it can be demonstrated that a turntable solution for the Kiaora Lane/Patterson Street loading dock is not feasible.

C12 If a loading dock is located off Patterson Street, the design and size of the dock must be limited to accommodate fixed rigid vehicles only (i.e. not semi-trailers).

C13 Vehicle ramps between car parking levels are to be enclosed to contain noise and light spill impacts. The walls and ceiling of the ramp enclosure are to be provided with an appropriately selected and effective fire resistant, sound absorbing facing (an approved acoustical spray, or modular acoustical panels/tiles) to provide an effective reduction of the reverberant characteristics of that area.

C14 Loading docks are to be designed to minimise conflict between pedestrians and vehicles.

C15 Loading docks are to be as unobtrusive as reasonably possible.

C16 Loading dock doors are to be no larger than the dimensions required for functional operation.

C17 Loading docks must be fully enclosed.

C18 The loading docks are to provide for the forward entry and exit of service vehicles. The docks are to be designed so that all truck reversals can take place within the loading docks with the loading dock doors closed.

C19 The loading docks are to be provided with automated doors with a surface mass greater than 3kg/m² and the sides, head and thresholds of each is to be designed to obviate, or minimise any undesirable sound leakage.
The loading dock doors are to be designed so that their noise emission components when either opening or closing are no more than 5dB(A) above the background sound level when measured at the façade of the nearest, or any other residential property.

The ceiling, as well as significant areas of the walls of the loading docks are to be provided with an appropriately selected and effective fire resistant, sound absorbing facing (an approved acoustical spray, or modular acoustical panels/tiles) to provide an effective reduction of the reverberant characteristics of that area and ensure there is minimum possibility of the loading docks impacting on neighbours.

The consent authority may impose conditions restricting the operation of the loading docks and car parks to specified hours.

A Carparking and Loading Dock Plan of Management is to be prepared and submitted with the development application for the comprehensive redevelopment of the site. The Plan of Management must address the following matters:

a) the designated areas in which motorcycles will be permitted to park;

b) the areas within the car park from which motorcycle traffic will be excluded;

c) the hours of operation, or restrictions, that may be imposed in relation to the use of the upper level car park and the mechanisms through which any such restrictions may be further strengthened in order to deal with unexpected situations;

d) explicit restrictions in relation to times of use of specific entries or exits which may be imposed to control, or minimise potentially intrusive nocturnal noise emission. This requirement most aptly applies to the Anderson Street entry and exit because vehicular movement both within, and outside the car park will be exacerbated by the nocturnal use of that entry and exit;

e) signage to identify entry restrictions for vehicles which may be too large, too high or too noisy to enter the car parks; and

f) appropriate signage and designated areas of the ground floor car park where patrons of licensed premises should park their vehicles in order to minimise the potential for neighbour noise at night.

Appropriately designed and acoustically effective barriers are to be provided around the perimeter of the ground floor car park. The uppermost 2m or 3m section of the acoustic barrier is to be angled inwards. The acoustic barriers are to be provided with a sound absorbing lining to reduce the sound reflections and reverberant characteristics of the car park.

To achieve the noise goal referred to in C11 Section A2.5.3 Built form south of Kiaora Lane, a roof is to be provided over the car park, adjacent to the Kiaora Road vehicular entry and exits at the rear of 8 Kiaora Road. The underside of that roof is to be provided with an appropriately selected and effective fire resistant, sound absorbing facing (an approved acoustical spray, or modular acoustical panels/tiles) to provide an effective reduction of the reverberant characteristics of that area.
C26 The soffit of the supermarket floor is to be provided with an appropriately selected and effective fire resistant, sound absorbing facing (an approved acoustical spray, or modular acoustical panels/tiles) to provide an effective reduction of the reverberant characteristics of that area.

C27 The car park floors, as well as the interconnecting ramp between the ground level and rooftop car park are to have a surface that will not generate tyre squeal. The development application must include the specifications for the quality of the surface finish which may be achieved by the addition of an appropriate and functionally effective particular dusting or surface coating or by the application of fine sand on the finished floor surface before it has cured which will ensure positive tyre adhesion, and preclude tyre squeal problems.

C28 The interconnecting ramp between the ground level and rooftop car park is to have a smooth primary surface and not parallel ribbed surfaces. The ramp should incorporate small angled parallel grooves in a chevron pattern which may be cut into the surface of the cured concrete. The surface must be designed to preclude structural vibration and adverse related intrusive noise levels (or noise radiation from the main building structure) as well as provide positive tyre adhesion in the presence of water or oil.

C29 The car park is to be equipped with an effective electronic vacant car space identification system through which a driver may more rapidly find an empty car space to minimise the need to circle around the car park to find where they can park.

C30 Appropriately designed and effective acoustic barriers are to be provided around the perimeter of the rooftop car park to prevent noise impact on surrounding residential properties.

C31 The car park ramp is to be fully enclosed as required to meet the noise goal set out in C11 Section A2.5.3 Built form south of Kiaora Lane. If necessary, the enclosure is to extend beyond the point where the ramp surface intersects with the upper level car park floor.

C32 The ceiling and walls of the entry and exit structure to Kiaora Road are to be provided with an appropriately selected and effective fire resistant, sound absorbing facing (an approved acoustical spray, or modular acoustical panels/tiles) to provide an effective reduction of the reverberant characteristics of that area.

C33 The south-eastern wall of the car park entry/exit to Kiaora Road must extend to the street alignment.
### A2.5.11 Roof design

The roofscape is a significant visual component of the development and can be seen from the surrounding suburbs of Edgecliff, Darling Point and Bellevue Hill. These controls seek to reduce potential visual and amenity impacts of the roof top parking.

#### Principles

**P1** The roofscape should not present as an obtrusive and single unarticulated mass.

**P2** The roof is to be designed to minimise the amenity impacts to surrounding residences.

#### Controls

**C1** A combination of landscape treatments and shade structures should be used so that the roofscape does not present as an obtrusive and single unarticulated mass.

**C2** A combination of landscape treatments and shade structures should be used to minimise glare from the surface of the roof top and the cars parked on the roof.

**C3** The roof treatment is to provide shade structures for vehicles.

**C4** Surface treatments which minimise noise are to be used to minimise tyre squeal.

**C5** To contain noise, motorbike parking should be limited to the ground level.

**C6** The roof design should minimise light spill from cars.

**C7** The design of fixed lighting on the roof should comply with AS 428-1997 *Control of the Obtrusive Effects of Outdoor Lighting* (urban standards).
A2.5.12 Flooding and water sensitive urban design

The Kiaora Lands site is flood prone land. Major redevelopment of the site will affect existing overland flow paths. The new plaza should provide an overland flow path for stormwater. Thorough and informed consideration of flooding issues at the design stage is essential to ensure that redevelopment does not have detrimental impacts on the surrounding development, infrastructure and public domain.

Principles

P1   Ensure there is no increase in stormwater runoff from the site.

P2   Ensure the built form on the site does not block overland flow, in such a way as to impact on adjoining properties.

P3   Use water sensitive urban design techniques to reduce demand on the Sydney water supply and to provide water for plant irrigation.

P4   Ensure development on the site is adequately protected from flooding.

P5   The new plaza should act as a part of the overland flow path for stormwater.

Controls

C1   Development is to be designed having regard to the recommendations of a flood study prepared by a suitably qualified hydraulic engineer. The flood study must identify how property on and off the site, including the public domain, will be protected from the 1 in 100 years flood event.

C2   Development, including services, below the 1 in 100 years flood level is to be designed to be safe in a flood event.

C3   Provide a Site Emergency Response Plan (SERP) demonstrating the ability to safely evacuate persons to a safe refuge area.

C4   On site detention is not required.

C5   Collect rainwater for non-potable uses on site.

A2.5.13 Environmentally sustainable design

The Kiaora Lands project is to provide best practice environmentally sustainable design. Refer to Chapters E2 Stormwater and Flood Risk Management, E5 Waste Management and E6 Sustainability for further information.

Principles

P1 Promote environmentally sustainable design.

Controls

C1 Development must be designed to provide for best practice environmentally sustainable design outcomes as may be established through the Green Star Certified Rating system, or a similar tool.