

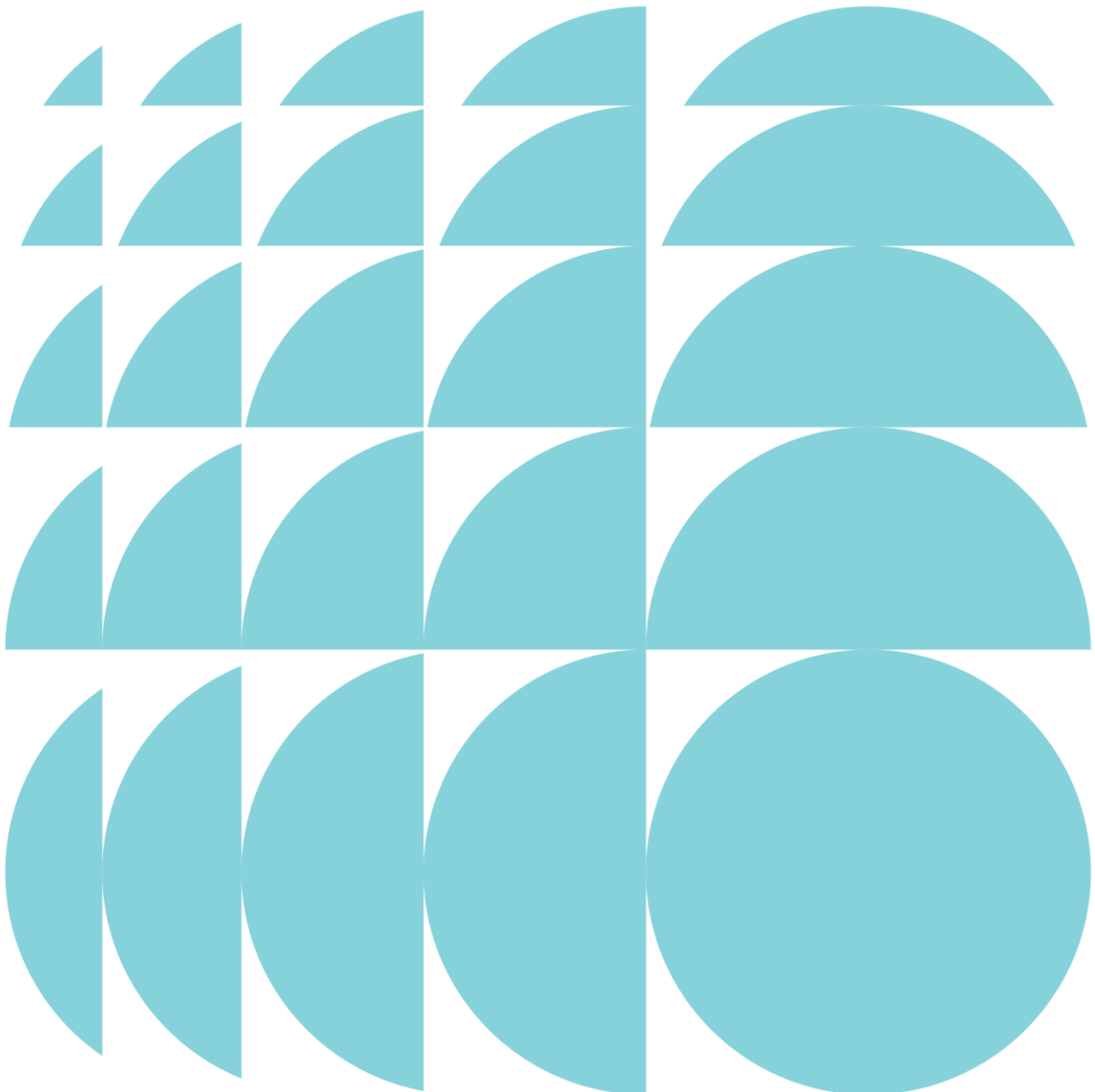
Statement of Environmental Effects

Stage 2 Development Application
Liverpool Civic Place – Phase A
52 Scott Street and 306-310 Macquarie Street, Liverpool

Public administration building, commercial premises,
public library and public domain

Submitted to Liverpool City Council
On behalf of Built Development Group

07 October 2020 | 2200178



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1.0 Introduction

This Statement of Environmental Effects (SEE) is submitted to Liverpool City Council (Council) in support of a Development Application (DA) for a detailed 'Stage 2' proposal for Phase A of the Liverpool Civic Place mixed-use development, located at 52 Scott Street and 306-310 Macquarie Street, Liverpool (the site).

This DA follows the approval of a Concept Proposal in September 2020 (DA-585/2019), which set out land uses and building envelopes for the entire Liverpool Civic Place project. This DA constitutes the first detailed 'Stage 2' proposal following approval of the Concept Proposal, and represents the first phase of development. Specifically, the DA seeks approval for:

- Construction and use of a six (6) storey information and education facility (public library);
- Construction and use of a fourteen (14) storey mixed use building comprising:
 - Eight (8) storeys of public administration building floor space to be occupied by Liverpool City Council;
 - Four (4) storeys of commercial premises (office) floor space;
 - Lower ground and upper ground retail space;
 - Single storey above ground child care centre on Level 6; and
 - A single storey of rooftop plant;
- Construction of a five (5) level basement, including:
 - 343 parking spaces to service the development; and
 - 153 public car parking spaces;
 - Motorcycle, bicycle parking spaces and end of trip facilities; and
 - Loading dock facilities;
- Landscaping and public domain works including:
 - an internal shared road connecting to Scott Street with basement access;
 - a public plaza fronting Scott Street; and
 - an elevated pocket park fronting Terminus Street.
- Extension and augmentation of services and infrastructure as required.

This Stage 2 DA has been developed with consideration of a suite of applications that are required for the design coordination and delivery of the envisaged Liverpool Civic Place redevelopment. The overall planning pathway to realise the project has included two previous DAs, including a Concept DA (DA-585/2019) and an Early Works DA (DA-906/2019). The approved Concept DA consent has set the land use and building envelope parameters for the overall project, and the Early Works DA has expedited site works for demolition, excavation, and the provision of a basement retention structure.

As this DA is lodged following approval of a Concept DA for the site, the provisions of Section 4.22 of the *Environmental Planning and Assessment Act 1979* (EP&A Act) will apply in the assessment of this DA.

This SEE has been prepared by Ethos Urban on behalf of Built Development Group and is based on the Architectural Drawings provided by FJMT (**Appendix A**) and other supporting technical information appended to the report (see Table of Contents). This report describes the site, its environs and the proposed development, and provides an assessment of the environmental impacts and identifies the steps to be taken to protect or lessen the potential impacts on the environment.

1.1 Background

1.1.1 Approved Concept DA

Clause 7.5A of the *Liverpool Local Environmental Plan 2008* (Liverpool LEP 2008) relates to certain land within the Liverpool City Centre which is provided incentive planning controls (FSR and height) if certain criteria within the clause are met. Pursuant to Clause 7.5A(2) of the Liverpool LEP 2008, in order to realise the incentives within the clause, a site must be located within 'Area 8' on the Floor Space Ratio (FSR) map, have a lot size exceeding 1,500m² and have two or more street frontages, and at least 20% of the proposed GFA must be used for the purposes of business premises, centre-based child care facilities, community facilities, educational establishments, entertainment facilities, food and drink premises, functions centres, information and education facilities, medical centres, public administration buildings or retail premises. Clause 7.5A(3) requires that a site-specific development control plan is prepared for development benefitting from the clause.

Section 4.23 of the EP&A Act identifies that if an environmental planning instrument requires the preparation of a development control plan before any particular or kind of development is carried out on any land, that obligation may be satisfied by the making and approval of a Concept DA in respect of that land. A Concept DA made under Section 4.22 of the EP&A Act is one that sets out concept proposals for the development of a site, and for which detailed proposals for separate parts of the site are to be the subject of subsequent DAs.

In accordance with Section 4.22 of the EP&A Act and Clause 7.5A of the Liverpool LEP 2008, a Concept DA (DA-585/2019) was approved by the Sydney Western City Planning Panel. The Concept DA consent has set the parameters for the future development of the site, including the approved land uses, building envelopes and an expanse of public domain and basement. The Concept DA did not approve any physical works. The full Liverpool Civic Place site, subject to the Concept DA approval is illustrated at **Figure 1** however the scope of this Stage 2 DA is limited to Phase A, as illustrated at **Figure 2** Phase B and Phase C will be subject to future Stage 2 detailed proposal DAs.

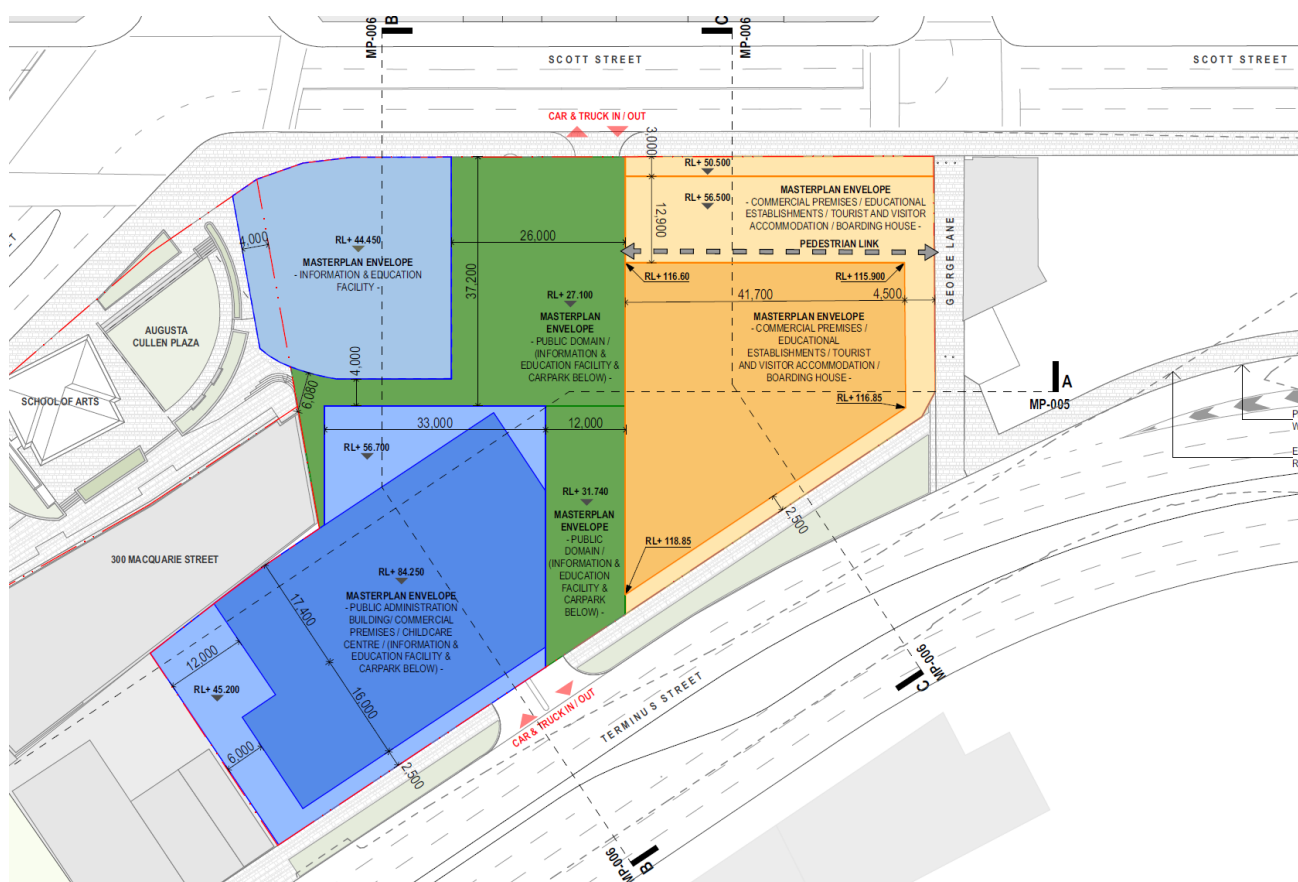


Figure 1 Liverpool Civic Place approved concept (overall site)

Source: FJMT

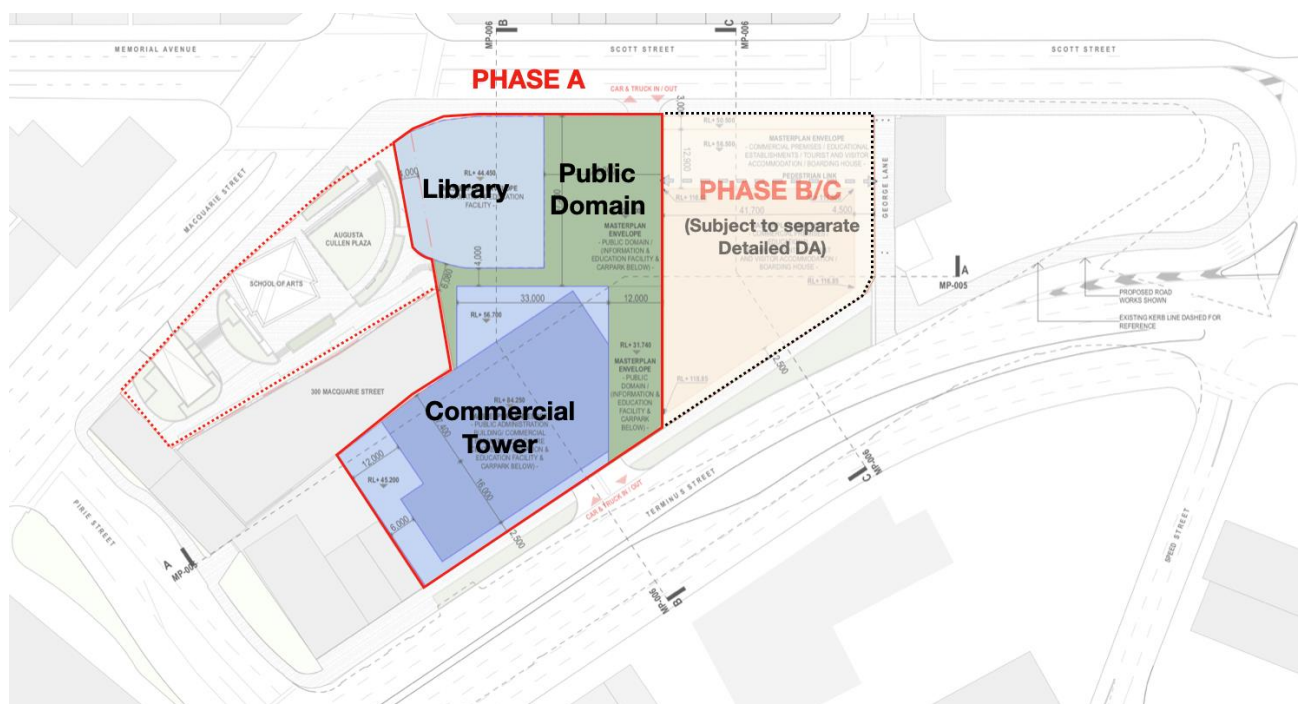


Figure 2 Liverpool Civic Place Phase A site (the subject of this DA)

Source: FJMT

1.1.2 Early works DA

DA-906/2019 was approved by the Sydney Western City Planning Panel on 29 June 2020. The determination provided development consent for the following works:

- The demolition of all structures on site including:
 - the two storey commercial building fronting Scott Street and the associated above ground car parking structure fronting Terminus Street; and
 - the two storey retail building fronting Scott Street and the associated at grade car park fronting Terminus Street.
- Bulk earthworks involving the excavation of land at 52 Scott Street to a maximum depth of RL 10.35 to accommodate the required basement levels.
- Removal of seven trees select tree removal and bulk earthworks including shoring through the use of piles.

Importantly, a modification to DA-906/2019 was lodged on 25 September 2020 which seeks to modify the approved consent to increase the depth of excavation by 3.6m below the approved level (to RL 6.75), in order to accommodate a fifth basement level, given identified additional demand for public car parking in the future basement.

Early works commenced on site in September 2020 and are scheduled for completion in August 2021.

1.2 Consultation

Architectus has been engaged by Council to undertake an independent assessment of the DA. Accordingly, a pre-lodgement meeting was held with Council and Architectus staff on 19 August 2020. In addition, the Proponent met with Council's Design Excellence Panel (DEP) on 20 August 2020, to give the panel an opportunity to inform the detailed design of the proposal. Architectus provided written feedback on 10 September 2020, which included minutes from the DEP meeting. This feedback has been addressed in the design where possible and a full response has been provided to all the pre-lodgement feedback in **Appendix B**.

The proponent Built has been committed to productive engagement with the assessment stakeholders from the inception of the Concept DA, through to the submission of this Stage 2 DA. This has included numerous meetings, throughout the Concept DA assessment, including:

- 21 June 2019 – Pre DA Meeting 1 (Architectus and Council)
- 9 September 2019 – Pre DA Meeting 2 (Architectus and Council)
- 26 November 2019 – DEP Meeting 1 (DEP, Architectus and Council)
- 17 March 2020 – DEP Meeting 2 (DEP, Architectus and Council)

The proponent is committed to a productive and meaningful consultation program with the key assessment stakeholders, and to further engagement throughout the assessment of this Stage 2 DA.

2.0 Site analysis

2.1 Site location and context

The site is located at 52 Scott Street and 306-310 Macquarie Street, Liverpool within the Liverpool City Council Local Government Area, as illustrated in **Figure 3**. The site is located approximately 300m south west of Liverpool Railway Station and is also in the vicinity of a number of regionally significant land uses and features including Liverpool Hospital, Westfield Liverpool, Western Sydney University Liverpool Campus, the Georges River and Biggie Park public open space as illustrated in **Figure 3**.

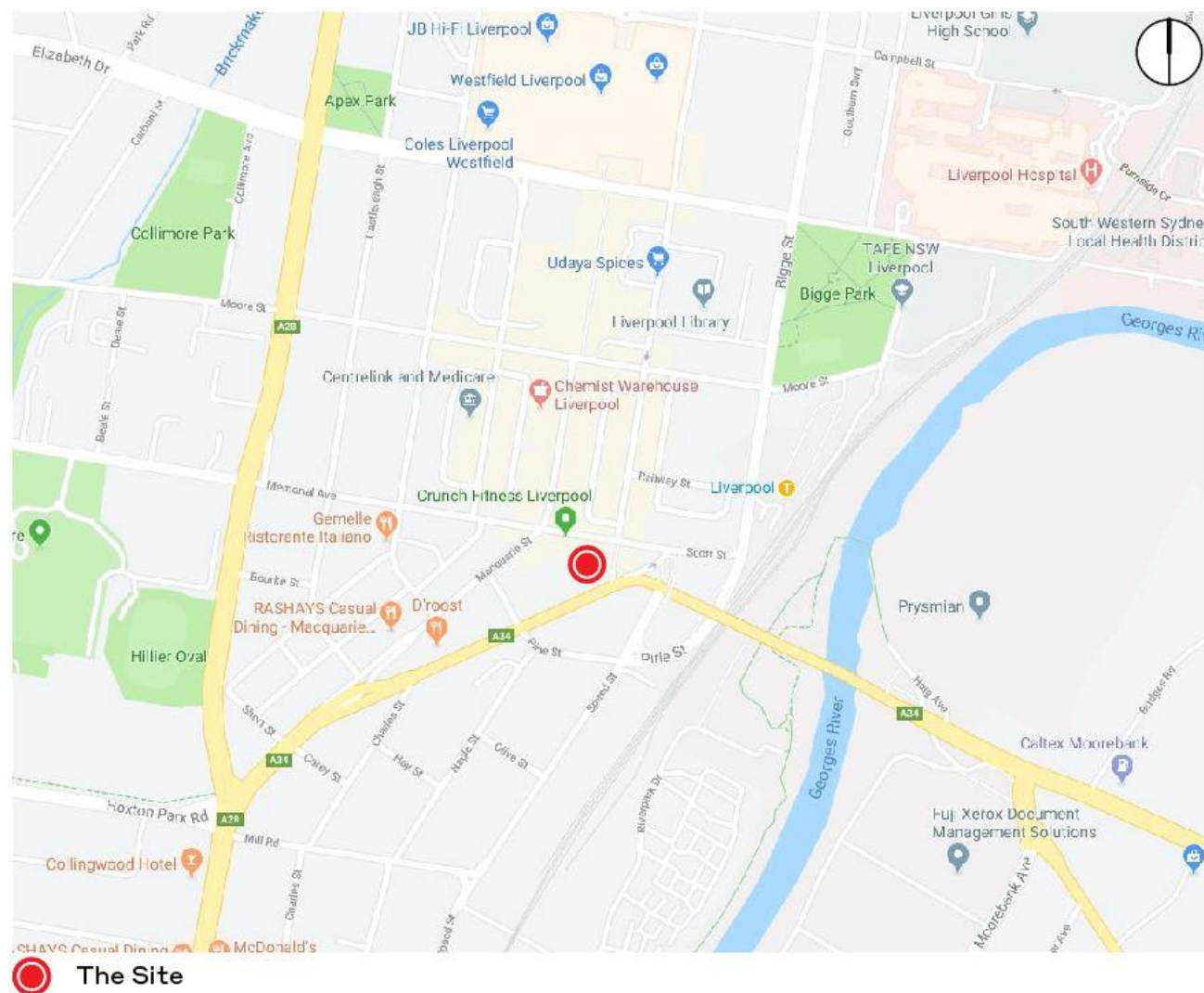


Figure 3 Site location

Source: Google Maps and Ethos Urban

2.2 Site description

The Phase A site to which this DA relates is identified within the Liverpool Civic Place overall boundary in **Figure 4** with the lots constituting Phase A and Phase B/C summarised in **Table 1**. The overall Liverpool Civic Place site (the subject of the wider Concept DA approval) is irregular in shape, and comprises 12 lots, **Figure 4**.

Table 1 Summary of lot details

Phase A (the subject site)	Phase B/C
<ul style="list-style-type: none"> Lot 100 in DP 877435 Lot 22 in DP 441010 Lot 1 in DP 229979 Lot 3 in DP 229979; Lot 1 in DP 514817 	<ul style="list-style-type: none"> Lot 17 in DP 81842 Lot 11 in DP 522284 Lot 12 in DP 657056.



Figure 4 Site lot boundaries

Source: Sixmaps and Ethos Urban

The overall Liverpool Civic Place site has a total area of 9,189.5m² and has three primary road frontages including a primary frontage to Scott Street (98m frontage) to the north, George Lane (40m frontage) to the east and Terminus Street (115m frontage) to the south. The site boundary also extends along Macquarie Street.

The Phase A site to which the DA relates comprises a total site area of 5,187m². The Phase A site has two primary road frontages, including a primary frontage to Scott Street (66m frontage) to the north and Terminus Street (89m frontage) to the south. An aerial photograph of the site is shown in **Figure 5**.

The following sections of this site analysis will describe the Phase A site, to which the subject DA relates.



Figure 5 Site aerial

Source: Nearmap and Ethos Urban

2.2.1 Existing development

At the time of writing, the following elements described in this section exist on site, however the Early Works DA approved under DA-906/2019 approves the demolition of existing structures on site. The site is largely occupied by a two-storey commercial building with a large frontage to Scott Street (**Figure 6** and **Figure 7**). The commercial building is provided with an above ground car parking structure at the rear with a frontage to Terminus Street (**Figure 8**). Photographs of the existing development are provided at **Figure 6** to **Figure 8** below.



Figure 6 Commercial building occupying the site as viewed from Scott Street (north east)



Figure 7 Commercial building occupying the site as viewed from Scott Street (north west)



Figure 8 Above ground car parking structure as viewed from Terminus Street (south east)

2.2.2 Topography and vegetation

A Site Survey has been prepared by Veris is provided in **Appendix C**. The survey illustrates that the site slopes to north with a fall of approximately 3.5m from its Terminus Street frontage (RL 25.95) to its Scott Street frontage (RL 22.74). The site is largely free of vegetation, with street trees lining the Terminus Street boundary.

2.2.3 Access and connectivity

Vehicular access and parking

The site has two primary street frontages, to Scott Street and Terminus Street. The site also has a frontage to Macquarie Street. Scott Street functions as a collector road connecting Memorial Avenue through to Bigge Street and is aligned in an east-west direction. Scott Street is a two-way, two lane road within a 12m wide carriageway with no vehicle access points to the site. Terminus Street is a classified RMS road including a two-way, two lane road within a 13m carriageway. The site is currently provided with two left in/left out vehicle access points off Terminus Street **Figure 9** and **Figure 10**.



Figure 9 Existing development from the south



Figure 10 Existing development from the south east

Surrounding the site, on-street parking is generally paid and subject to a one hour time restriction. The western side of Macquarie Street has approximately four kerbside spaces. The northern side of Scott Street has approximately nine kerbside spaces and the southern side has approximately three kerbside parking spaces. The following off-street car parking is available within a short walking distance from the site:

- Northumberland Street Car Park – 440 spaces
- Bathurst Street South Car Park – 49 spaces
- Speed Street Car Park – 87 spaces
- Warren Service Way Car Park – 704 spaces

Pedestrian access

Scott Street, Terminus Street and Macquarie Street are well-established pedestrian routes, with Liverpool Railway Station and the Liverpool retail precinct to the north being major generators of footfall traffic around the site. The site's eastern boundary fronts the George Street pedestrian access way which links Scott Street to Terminus Street.

Public transport

The site is well serviced by public transport, with Liverpool Railway Station located approximately 300m to the north west of the site. Liverpool Railway Station can be accessed via the T3 Bankstown Line, the T2 Inner West and Leppington Line, and the T5 Cumberland Line.

Bus services are active along George Street to the north of the site. Specifically, George Street is serviced by five bus routes, linking Liverpool to Casula, Moorebank, Holsworthy, Chipping Norton, Burwood.

2.2.4 Heritage

Lot 201 DP 1224084, 306-310 Macquarie Street contains a heritage item, being the Memorial School of Arts building (I99). However, the site is not located within a heritage conservation area, as illustrated in **Figure 11** below. The site is in the vicinity of several heritage items identified within the Liverpool LEP 2008. Notable amongst these heritage items includes:

- I89 – Plan of Town of Liverpool (Early town centre street layout – Hoddle 1827);
- I91 – Commercial Building (formerly Rural bank and State bank);
- I92 – Boer War Memorial, including memorial to Private A.E Smith;
- I93 – Macquarie Monument;
- I94 – Row of 3 palm trees; and
- I109 – Liverpool Fire Station.

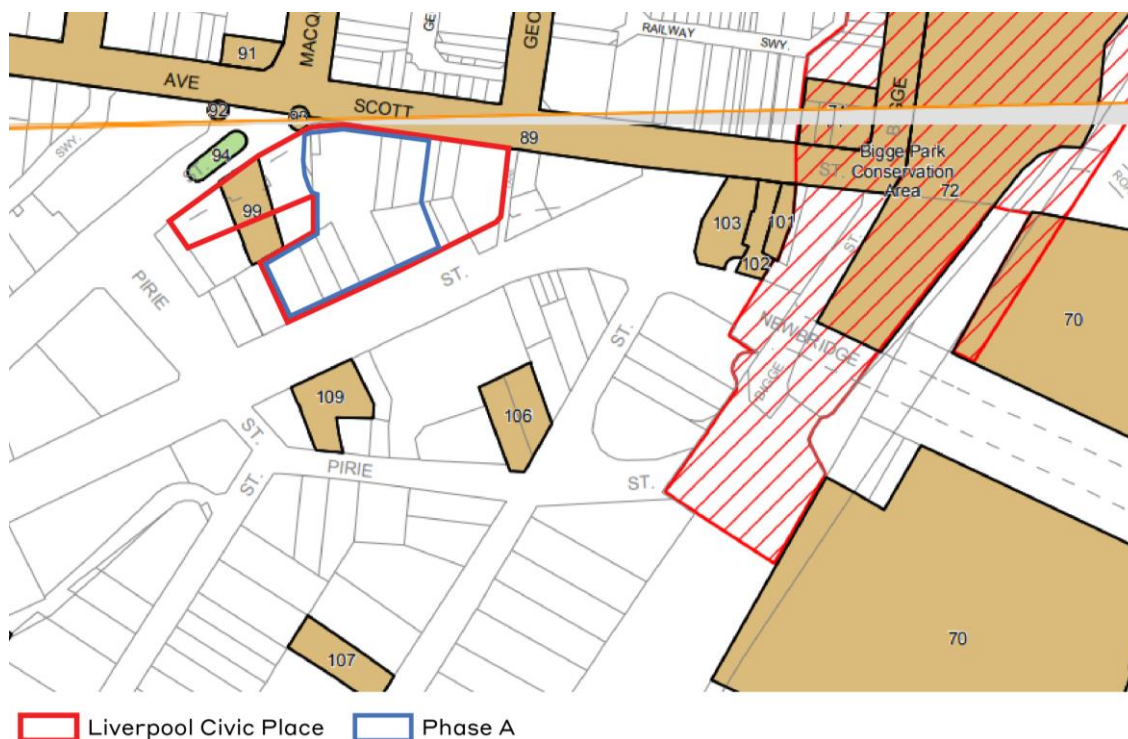


Figure 11 Heritage items in the vicinity of the site

Source: Liverpool LEP 2008 with additions

2.3 Surrounding development

The Liverpool CBD is a growing strategic centre within Greater Western Sydney, comprising a true mixed-use character. The Liverpool CBD is currently presented with opportunities for renewal and urban transformation which reflects the precinct's strategic positioning between Parramatta as Sydney's Central CBD and the future Badgerys Creek Aerotropolis. Key land uses within the surrounding area are illustrated in **Figure 12** and the site's immediate surrounding context is outlined below.



Figure 12 Site context

Source: FJMT

North

Development to the north of the site, on the opposite side of Scott Street, includes retail and commercial buildings of two to three storeys, primarily containing retail and commercial uses (**Figure 13**). To the north east, the street block contains higher density commercial and serviced apartment uses (**Figure 14**). Further north, this development transitions into the Liverpool civic and retail centre bounded by Macquarie Street (**Figure 15**) and George Street (**Figure 16**).



Figure 13 Retail and commercial buildings to the north



Figure 14 Higher density development to the north east

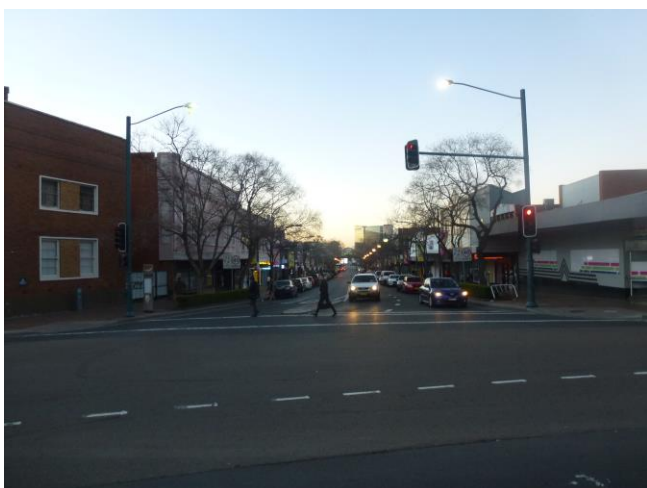


Figure 15 Macquarie Street to the north



Figure 16 George Street to the north

East

At the time of writing, the immediate east of the site comprises two vacant lots with scattered grass cover. Adjacent to these lots, on the east, is a two storey retail building (**Figure 17**) with an adjoining car park at the rear (**Figure 18**). Notably, this existing development is contained within the Liverpool Civic Place Site. The Early Works DA relating to the Liverpool Civic Place site (DA-906/2019) approved early works to demolish the existing buildings, including the components identified in **Figure 19** and **Figure 20**.



Figure 17 Commercial building to the east of the Phase A site, as viewed from Scott Street (north east)



Figure 18 Rear car park of the commercial building as viewed from Terminus Street (south east)

To the east of the entire Liverpool Civic Place site, development includes a two storey commercial building (**Figure 19**). This building is not listed as a heritage significant item. To the east of this building is a larger two storey commercial building (**Figure 20**), which extends to the Scott Street and Terminus Street intersection. The Georges River and Liverpool Railway Station are a further 300m from the site and effectively mark the eastern boundary of the Liverpool CBD.



Figure 19 Two storey commercial building to the east of the George Street through site link



Figure 20 Two storey commercial building at the intersection of Scott and Terminus Street

South

To the south of the site, and on the opposite side of Terminus Street, is the Telstra Exchange building that has a height of approximately four storeys **Figure 21**. As well as this, various retail stores front Terminus Street. Further south of the commercial Terminus Street strip, the area transitions to a residential character with a number of four to five storey residential flat buildings **Figure 22**.



Figure 21 Telstra Exchange building and adjoining retail tenancies to the south



Figure 22 Retail and medium density residential uses fronting Terminus Street to the south

West

Immediately to the west is a nine-storey mixed use development at 300 Macquarie Street (**Figure 23**). The mixed-use building presents a partial blank party wall to the site at the rear (**Figure 24**) and contains ground floor retail uses which are set back from the Memorial Arts Building (and Macquarie Street (**Figure 25**). This adjoins a consolidation of low scale automotive service tenancies to the west (**Figure 26**).



Figure 23 Nine storey mixed use residential building to the west



Figure 24 Rear party wall presented to the site



Figure 25 Memorial Arts Building



Figure 26 Consolidated automotive service tenancies to the west

3.0 Description of proposed development

This DA seeks approval for the following development:

- Construction and use of a six (6) storey information and education facility (public library);
- Construction and use of a fourteen (14) storey mixed use building comprising:
 - Eight (8) storeys of public administration building floor space to be occupied by Liverpool City Council;
 - Four (4) storeys of commercial premises (office) floor space;
 - Lower ground and upper ground retail space;
 - Single storey above ground child care centre on Level 6; and
 - A single storey of rooftop plant;
- Construction of a five (5) level basement, including:
 - 343 parking spaces to service the development; and
 - 153 public car parking spaces;
 - Motorcycle, bicycle parking spaces and end of trip facilities; and
 - Loading dock facilities;
- Landscaping and public domain works including:
 - an internal shared road connecting to Scott Street with basement access;
 - a public plaza fronting Scott Street; and
 - an elevated pocket park fronting Terminus Street.
- Extension and augmentation of services and infrastructure as required.

Architectural drawings illustrating the proposed development are included in **Appendix A**.



Figure 27 Photomontage of the proposed development

Source: FJMT

3.1 Numerical overview

The key numeric development information of the proposed development is summarised in **Table 2**.

Table 2 Key development information

Component	Proposal
Overall development	
Site area	5,187m ²
Proposed GFA total:	21,689m²
<ul style="list-style-type: none"> Commercial Child care Public administration Information and education facility (public library) 	<ul style="list-style-type: none"> 4,914m² 1,478m² 10,297m² 5,000m²
FSR	2.32:1 ¹
Maximum building height	RL 80.75
Car spaces – total	• 343 (including 7 accessible spaces)
<ul style="list-style-type: none"> Public spaces Private spaces Child care 	<ul style="list-style-type: none"> 153 190 10
Bicycle Parking – total	• 138
<ul style="list-style-type: none"> End of trip Visitor 	<ul style="list-style-type: none"> 108 30
Motorcycle Parking - total	• 18
Library building	
Height in storeys	6
Maximum building height	RL 41.9
GFA	5,000m ²
Public administration building and commercial premises	
Height in storeys	14
Maximum building height	RL 80.75
GFA – total	16,689m²
<ul style="list-style-type: none"> Commercial Child care Public administration 	<ul style="list-style-type: none"> 4,914m² 1,478m² 10,297m²

3.2 Development and urban design principles

The planning and design principles adopted for the proposed development of the site are as follows:

- Ensure the design of the Liverpool Civic Place project positions it prominently as a key civic and focal point in the context of the Liverpool CBD and Metropolitan Sydney.
- Identify key heritage, urban design, built form, civic, public domain and transport opportunities and constraints throughout the wider precinct.
- Create a next generation workplace environment that realises the opportunities that are emerging in future work practice, wellbeing and sustainability, communication and digital technologies, security and mixed-use development.

¹ Site area for the purposes of calculating FSR in accordance with Clause 4.5 of the Liverpool LEP 2008 is 9,348m².

- Create a development that is consistent with transit-oriented development principles, to reflect the scale and density appropriate for a site within the Liverpool CBD and proximity to the railway station.
- Make an outstanding contribution to Liverpool's urban realm both in terms of its fit into the existing and emerging built fabric, and in terms of its public experience.
- Create a visible gateway precinct at the southern end of Liverpool's CBD which will be highly visible from arterial roads, Liverpool Railway Station and main civic streets including Macquarie Street and George Street.
- Provide a mixed-use precinct that supports community and neighbourhood collaboration through a range of functions and versatile spaces, reflecting the needs of Liverpool and its diverse demographic.
- Respond to the transitioning population that is set to dramatically increase over the next 20 years by breaking the precinct down into a variety of scales, providing social infrastructure that assists in reinforcing community, and delivering a hybrid precinct typology which helps in offering an attractive destination.

3.3 Site layout and proposed buildings

The detailed design can be separated into three main components, being the public library building, the mixed use civic building and the large expanse of public domain, as illustrated in

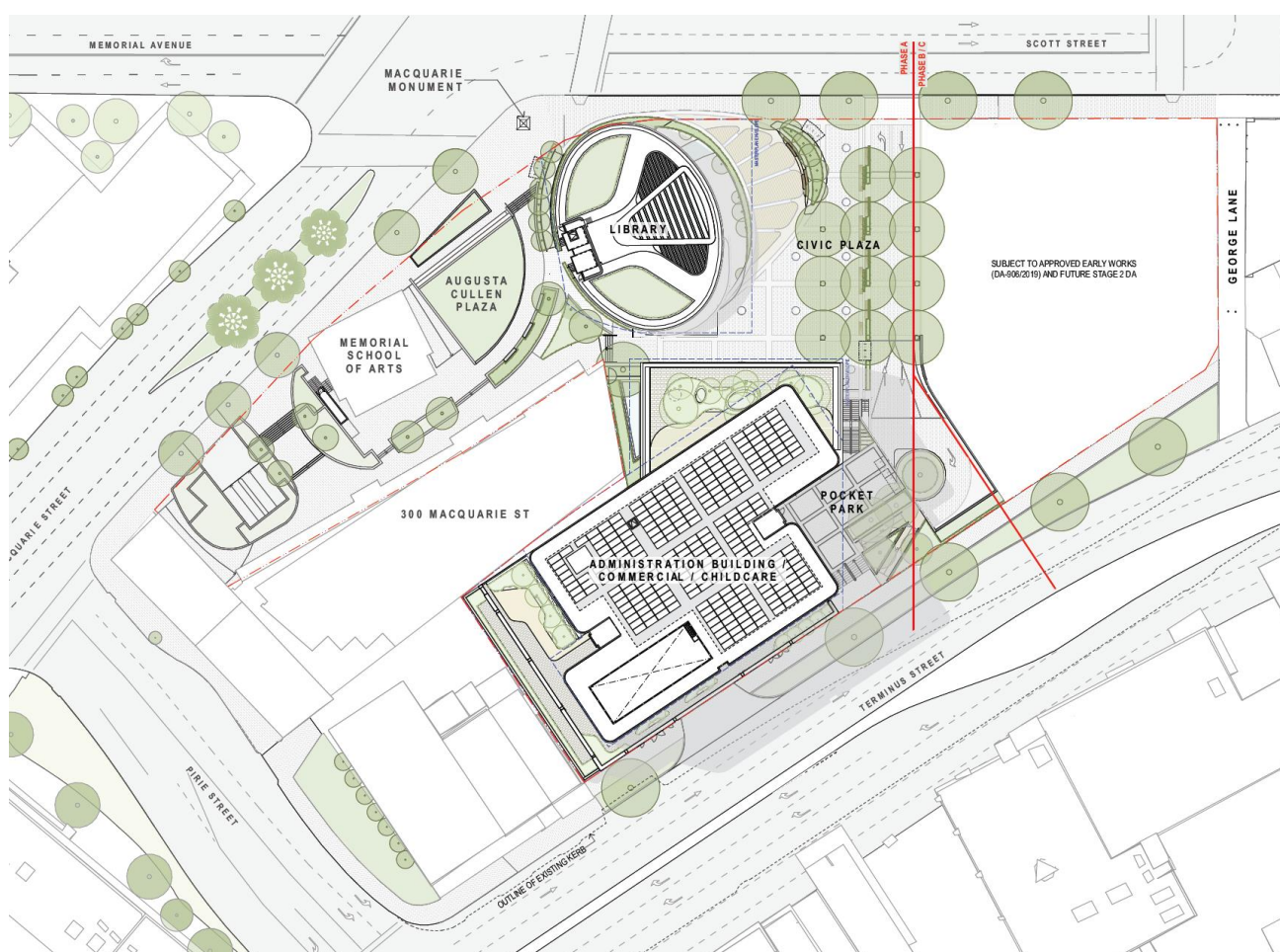
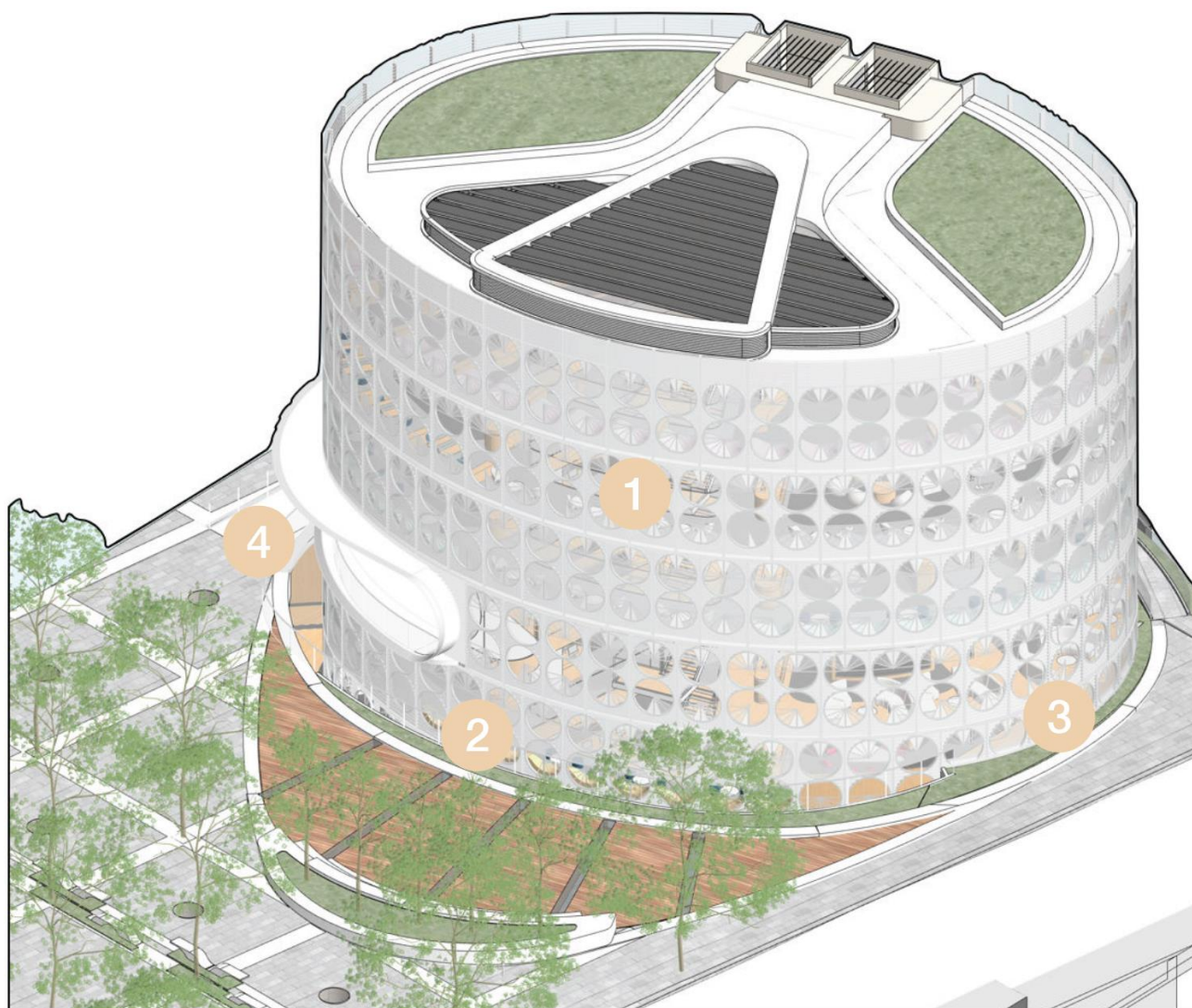


Figure 28 Proposed site layout and built form

Source: FJMT

3.3.1 Public library

The public library building anchors the site to the north west, as a landmark for the southern end of the Liverpool City Centre, addressing Scott Street and Macquarie Street. The public library building will contain floor space distributed over six levels, including a lower ground level. The library building constitutes a highly distinct, rounded architectural form that addresses the public domain surrounding it at every frontage. The library anchors the street corner with a nil setback to create an important civic focal point when viewed from the public domain and the CBD's main streets. Importantly, the public library building does not occupy the full extent of the building envelope approved under the Concept DA, which allows the provision of additional activated public domain at the interface with the ground plane, particularly to the east and west of the library footprint.



/ Facade elements

1. Full Height glazing with sun control
2. Void to sunken garden below
3. Mezzanine floor with high level glazing to Scott Street
4. Sculptural entrance canopy and terrace

Figure 29 Public library building

Source: FJMT

3.3.2 Mixed use civic building

To the south of the public library is the proposed civic and commercial building. The civic building comprises a podium and tower design with varying orientations. This is a true mixed-use building, comprising public administration, child care centre and commercial office uses up to a maximum height of 14 storeys.

The civic building is characterised by its unique geometric form and architecture, as illustrated in **Figure 30**. The building is irregular in shape, and is comprised of varied elements reflecting the building's mixed use program. The northern wing of the podium is oriented north, and accommodates key Council functions and presents as a main civic address from the public domain. The podium is responsive to the surrounding development, particularly to the west, where it partially abuts the rear party wall of the mixed-use building at 300 Macquarie Street.

The Terminus Street frontage of the building reflects a more traditional tower and podium form, with both components provided with a more consistent language, including curved edges, differing from the northern wing. This frontage constitutes a podium built to Terminus Street up to approximately 19m in height. The tower from is then set back 2.5m from the Terminus Street wall, extending to a maximum building height of approximately 55m (when measured from the Terminus Street level). The tower form is heavily modulated, with varied orientations and secondary façade setbacks.



Figure 30 Liverpool Civic Place – Civic building (viewed from Terminus Street)

Source: FJMT

3.4 External materials and finishes

The proposed external materials and finishes are set out in detail in the design report (**Appendix D**). The proposal comprises a unique design constituting varied materials and finishes of a high quality, throughout the two buildings, which is discussed in the following sections.

3.4.1 Public library building

The library building comprises a careful selection of materials and finishes, characterised mainly by the large circular frames contained within the façade. The library is viewed 'in the round', with each orientation activates a portion of the public realm. Its highly transparent facade allows the activity within to be displayed to the street and adjacent open spaces, seamlessly connecting exterior and interior public space. **Figure 31** illustrates the configuration of the façade elements, which include:

- a curtain wall system with floor to ceiling vision panel
- automated blinds (rotary fan style or similar) for solar heat gain and glare control
- manual override available for blinds to lower vision window outside of sun-strike conditions

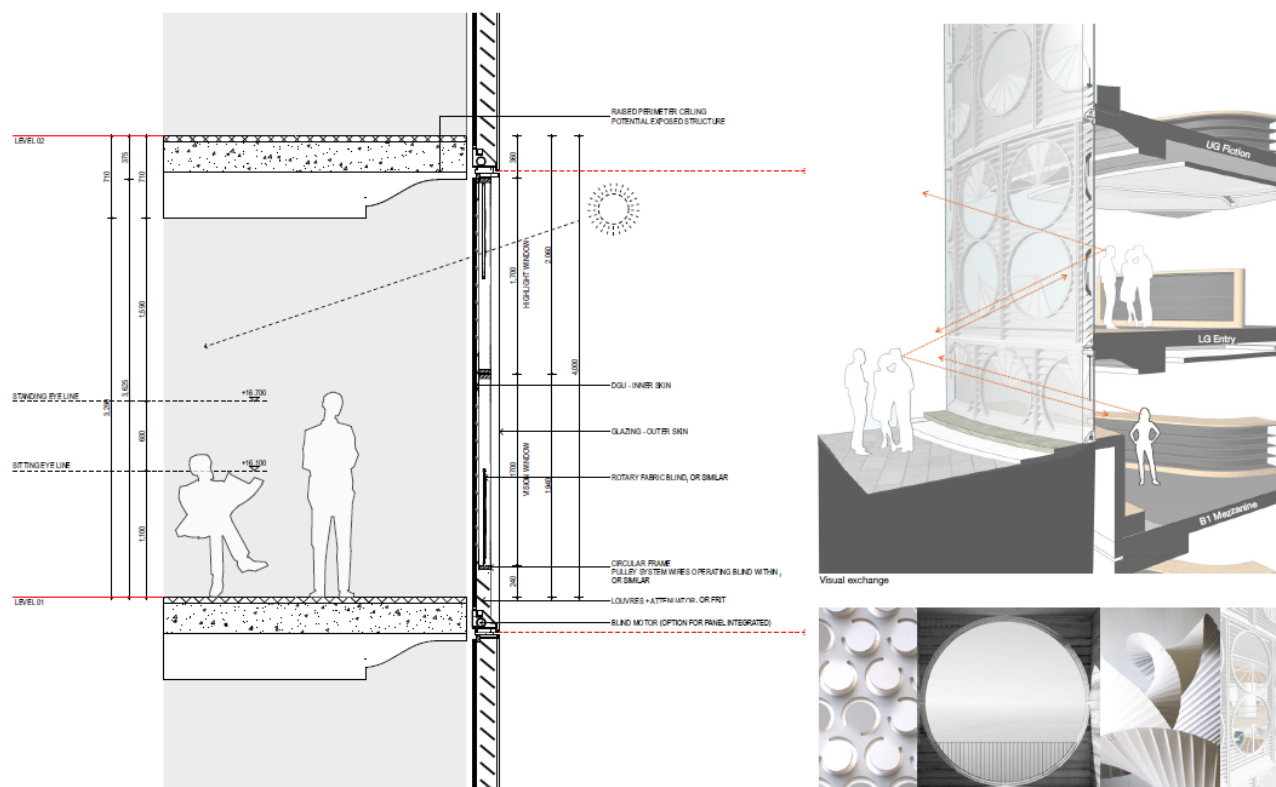


Figure 31 Library façade features

Source: FJMT

The library building includes a solid façade which provides a practical design solution to conceal the fire stairs (see item 1 in **Figure 32**. The façade at parts of level 2 and 3 includes fixed (closed) radial blinds to prevent overlooking, in the exact location identified in **Figure 32**.

The proposed library building contains a glazed roof that has sun tracking technology, enabling it to automatically activate fixed louvres to regulate the level of light that is diffused through the atrium of the building. At the perimeter of the atrium void, the roof design includes smoke ventilation louvres. There are green roof features on the northern and southern side of the roof. The perimeter of the roof is bounded by a clear access zone. Manhole access to the plant is gained from the west of the roof. The overall design of the roof is illustrated in **Figure 33**.

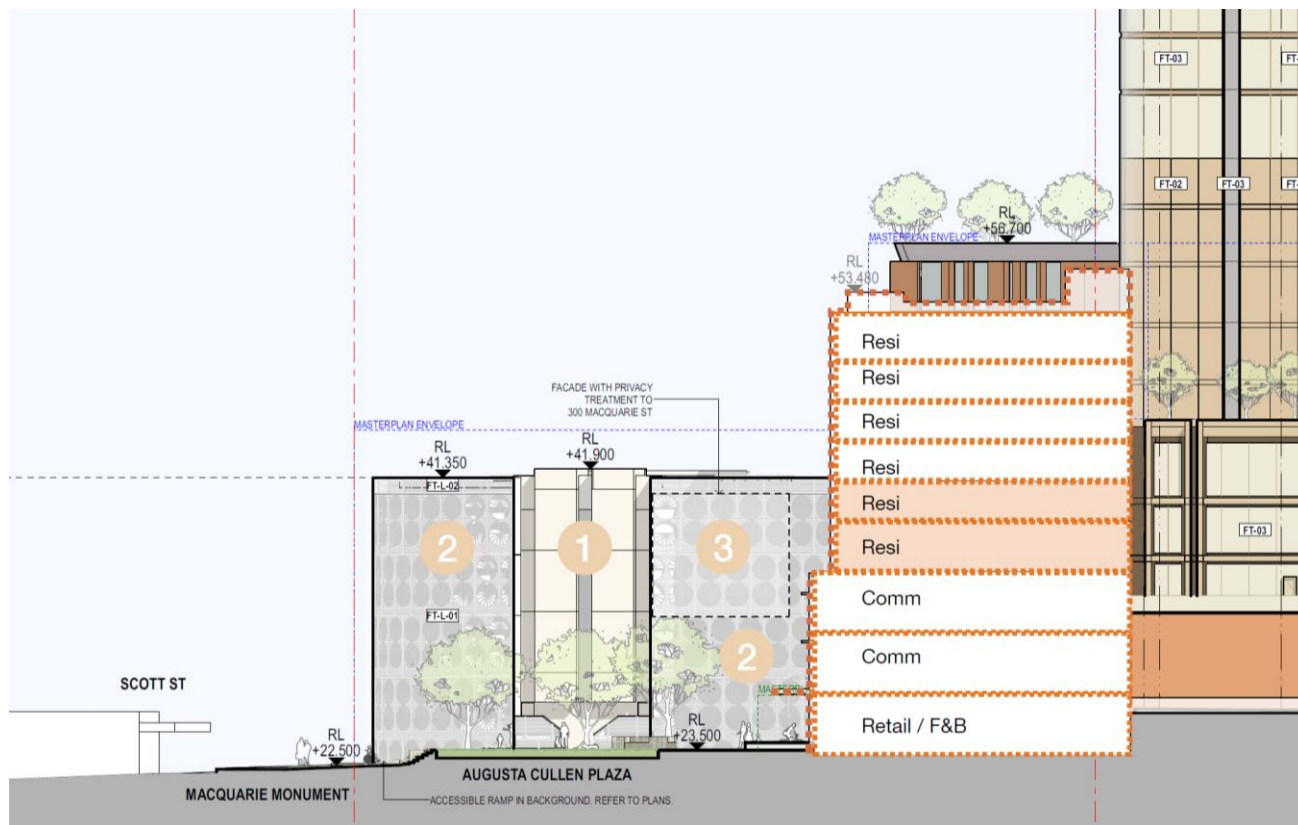


Figure 32 Proposed façade privacy treatment

Source: FJMT

/ Roof elements

1. Glazed skylight - Light sun control via fixed louvres
2. Smoke ventilation louvres to perimeter of atrium void
3. Green Roof, refer to landscaping section for details
4. Manhole access to Plant zone - horizontal screening over
5. Perimeter clear access zone adjacent to facade
6. Lift overrun

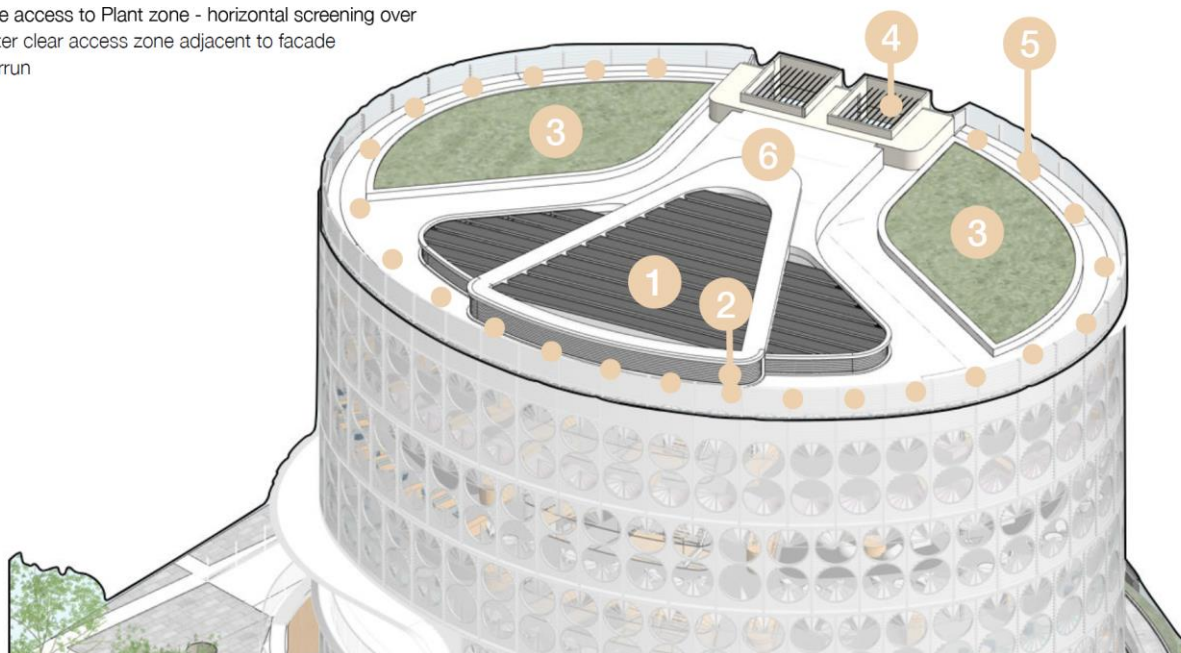


Figure 33 Library roof design

Source: FJMT

3.4.2 Civic building

The civic building consists of a mixture of high quality materials and finishes. Each component of this landmark building's materials and finishes is detailed in the following subsections.

Building entry

The arrival experience to the civic building is characterised by a double height void above the entrance, which is identified in **Figure 34**.



Figure 34 Civic building lobby entrance

Source: FJMT

Civic square podium

The proposed design of the civic building's podium and tower varies for sections of the development which have different orientations. The portion of the civic building podium that faces north, north east and north west to the civic square is to be composed of a curtain wall comprising steel fabricated panels of lightly tinted bronze performance glazing, combined with vertical brick blades that are intertwined with horizontal sandstone detailing. **Figure 35** illustrates the detailing of the façade fronting the civic square.

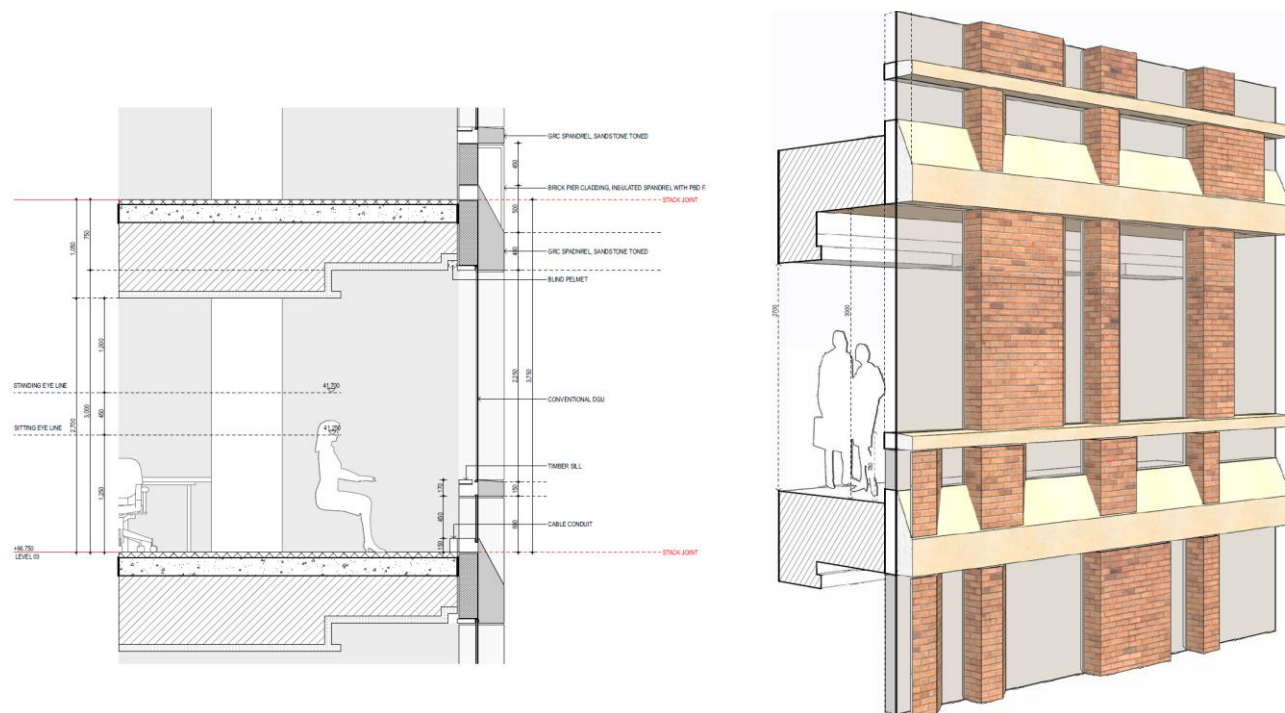


Figure 35 Podium design fronting the civic square

Source: FJMT

Terminus Street podium

Conversely, the Terminus Street podium façade facing south, south west and south east includes a curtain wall system with lightly bronze tinted panels that are 1.8m – 2.0m wide and 3.75m high, embedded in a sandstone-toned portal and bronze anodised frame (see **Figure 36**).

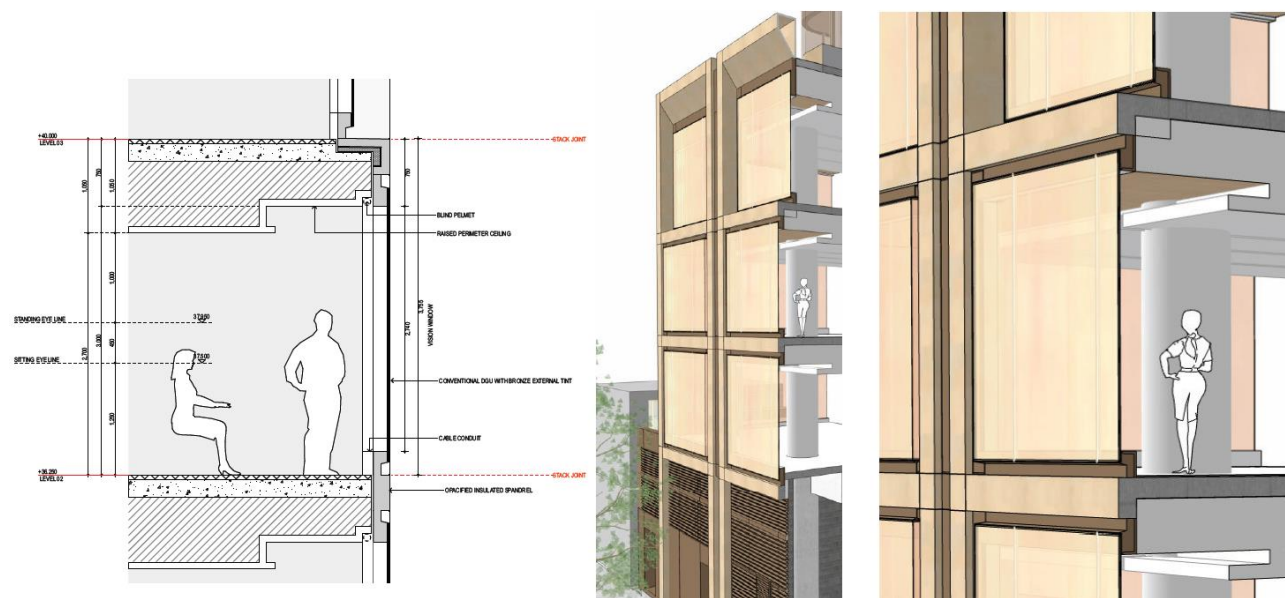


Figure 36 Terminus Street podium façade

Source: FJMT

Tower façade

The tower façade comprises a curtain wall system with 2.0m wide and 3.75m high lightly bronze tinted double-glazed straight panels with curved corner panels and anodised bronze framing (see **Figure 37** and **Figure 38**). The insulated spandrel zone integrated into the south-facing façade panelling has been minimised to 915mm to optimise daylight into the façade and external views. Conversely the north/west/east-facing façade includes a 1.55m insulated spandrel zone as it is subject to more onerous solar conditions.

A conventional façade system has been proposed throughout the tower to deliver a quiet, recessive tower form.

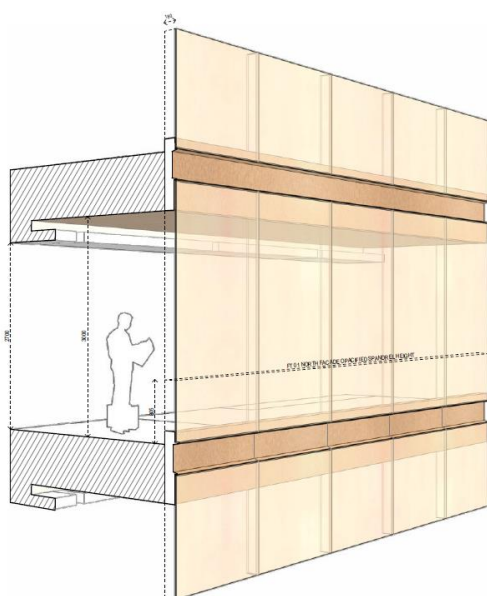


Figure 37 South-facing tower façade

Source: FJMT

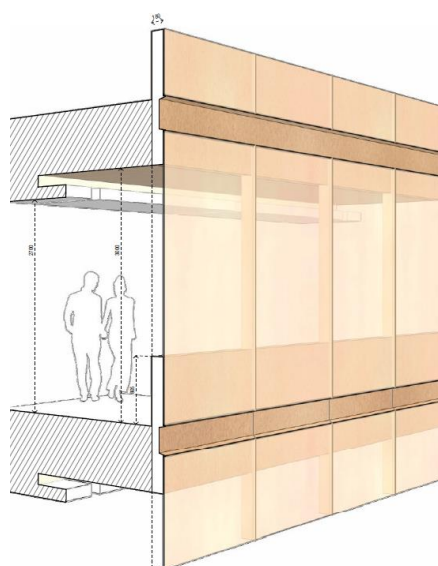


Figure 38 North/west/east-facing tower façade

Source: FJMT

3.5 Land use and floor space

3.5.1 Public Library

A level by level summary of the uses contained in the proposed public library building is provided in **Table 3**. The design of each level is illustrated in the Architectural Drawings at **Appendix A**, with a snapshot of the library layout and further detail on the configuration of the uses shown in **Figure 39**.

Table 3 Level by level description of the public library building

Level	Use
Basement Levels 4 and 5	Private car park (public administration / commercial)
Basement Level 3	Public car park (public administration / commercial)
Courtyard Level	Public library
Plaza Level	Public library
Entry Level	Public library
Levels 1, 2 and 3	Public library

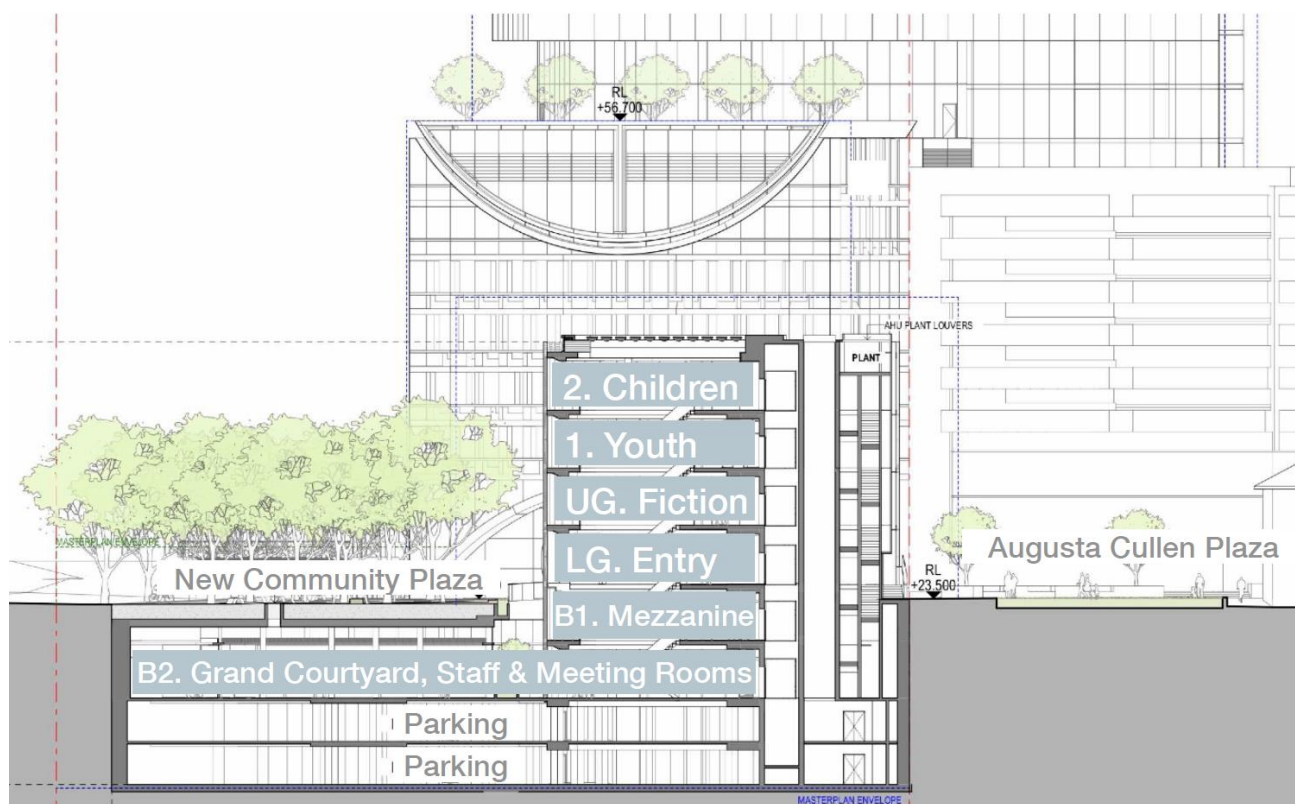


Figure 39 Public library level by level use

Source: FJMT

3.5.2 Mixed use civic building

A level by level summary of the proposed mixed use civic building is provided in

Table 4 Level by level description of the mixed use civic building. The design of each level is illustrated on the architectural drawings at **Appendix A**.

Table 4 Level by level description of the mixed use civic building

Level	Use
Basement Levels 4 and 5	Private car park (public administration / commercial), plant
Basement Level 3	Public car park, plant
Basement 2	Public car park, end of trip facilities, storage, bike storage
Basement 1	Public car park, end of trip facilities, bike storage, plant, back of house area, child care drop-off
Lower Ground	Public administration, car park, plant, child care drop-off
Upper Ground	Public administration, loading bay, plant, public domain, waste storage, substation
Levels 1-3	Public administration, terrace, plant
Levels 2 and 3	Public administration, plant
Level 4	Public administration, terrace, plant
Level 5	Public administration, plant
Level 6	Child care centre, plant
Level 7	Public administration, terrace, plant
Level 8	Commercial, plant
Levels 9 - 11	Commercial, plant
Roof Plant	Plant

3.5.3 Child care centre

The proposed development includes an above ground child care centre on level 6 of the civic building. The level six floor plate contains 1,478m² of GFA, all of which has been allocated as child care floor space. The child care centre has undergone preliminary design testing to ensure that sufficient floor space and support facilities have been included to cater for a total of 90 children from 0 to 5 years of age.

Of the 1,464m², the child care centre achieves 359.7m² of indoor unencumbered floor space and 636.8m² of outdoor (simulated) unencumbered floor space, both exceeding the minimum required space **Figure 40**.

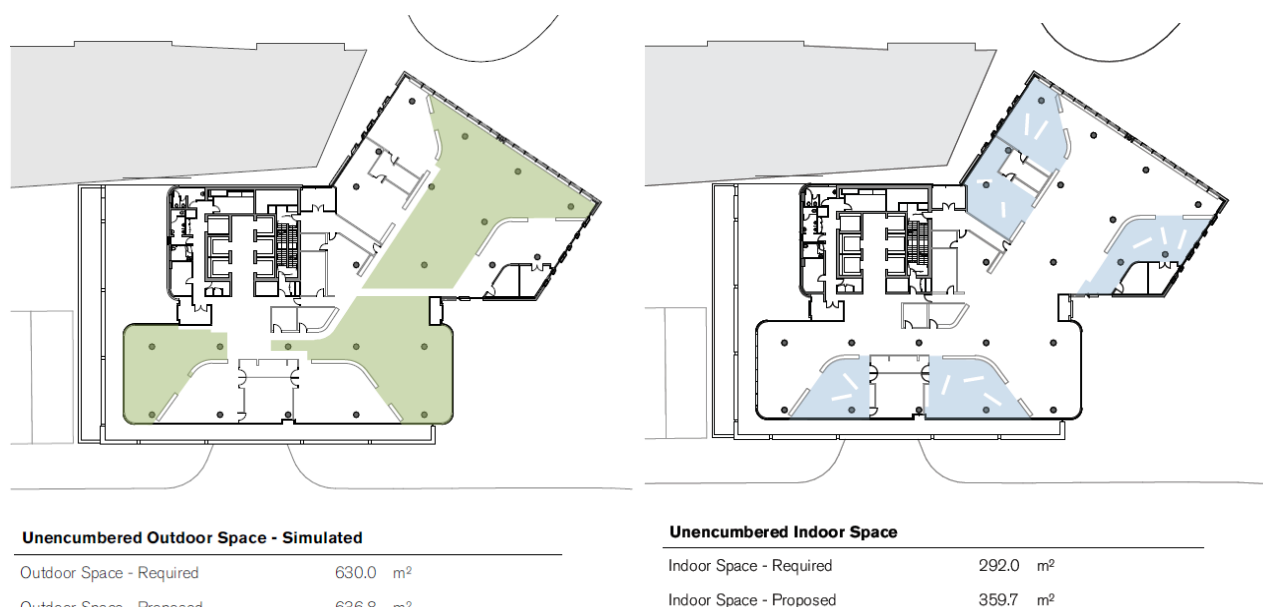


Figure 40 Child care centre test fit out plan

Source: FJMT

Above ground child care centres are becoming more common in mixed use precincts. Recent above ground child care centres with simulated outdoor play areas include:

- Westmead Innovation Quarter – Level 1, 100 children;
- Australian Technology Park Building 3 – Level 3, 90 children;
- 21 Harris Street Pyrmont – Level 1, 90 children;
- Darling Exchange Building, Level 3 and Level 4 – 90 Children; and
- Barangaroo Tower 1, Level 1.

The fit out illustrated in **Appendix D** is indicative only. Approval for the use and fit out of the space will be sought via a separate application once a child care operator has been appointed. Further discussion is provided within the Design Report in **Appendix D**.

3.6 Landscaping and public domain

A conceptual public domain and landscape scheme has been prepared by FJMT and is set out in the Landscape Drawings provided in **Appendix A**. The proposed landscaping and public domain constitutes a significant portion of the site, making an important contribution to the Liverpool City Centre. The landscape scheme has been carefully designed to provide a climate appropriate response, with varied experiences. It is noted that the proposed landscaping and public domain is indicative at this stage and will be further developed as part of the public domain plan that is to be prepared pursuant to conditions 4, 5 and 6 of the Concept DA approval (DA-585/2019). The proposed indicative landscape design is discussed further below.

Ground plane

The landscaping elements at the ground plane have been carefully designed to enhance legibility and ensure that the landscaping seamlessly integrates with the civic plaza. The landscape design proposes character zones at the ground plane that allow for the categorisation of the varying public domain and landscaping spaces, as illustrated in **Figure 41**.



Figure 41 Landscape character zones

Source: FJMT

Civic Grove

The 'Civic Grove' includes an abundance of tree planting in a grided layout, contributing to the intention of creating a clear and legible ground plane. The inclusion of significant tree plantings contributes to a human scale public domain space. The incorporation of planting, seats, trees and paved movement zones are included for traffic calming.

Indigenous Gathering Garden

The 'Indigenous Gathering Garden' is a crescent garden to the eastern edge of the library, providing a casual gathering and meeting point. It includes timber decking areas with integrated skylights. The street frontage to Scott Street will be softened by significant landscaping and promenade tree planting.

The Indigenous gathering garden includes the library sunken garden. The sunken garden provides a shaded outdoor space and offers outdoor experience with seamless connection to the interior spaces of the library building.

Civic Verandah

The 'Civic Verandah' includes hard paved surfaces and is a suitable location for flexible outdoor furniture and events.

Augusta Cullen Civic

Consistent tree planting has been incorporated throughout the design to create a memorable place, while also forming a legible connection from the civic plaza to the Augusta Cullen Plaza.

Terminus Pocket

The 'Terminus Pocket Park' is located at the intersection of Terminus Street and the civic building entry. This space is designed to be a connected shared plaza with Phase B/C of Liverpool Civic Place. It functions as a casual gathering space and meeting point. Significant landscaping is proposed along the Terminus Street frontage including an avenue of jacarandas to soften the interaction with Terminus Street.

Terraces

The proposed development includes terraces on levels 1, 4 and 7 of the civic building, with landscaping proposed for each of these terraced areas (as shown in **Figure 42** below). Each of these terraces are described below.

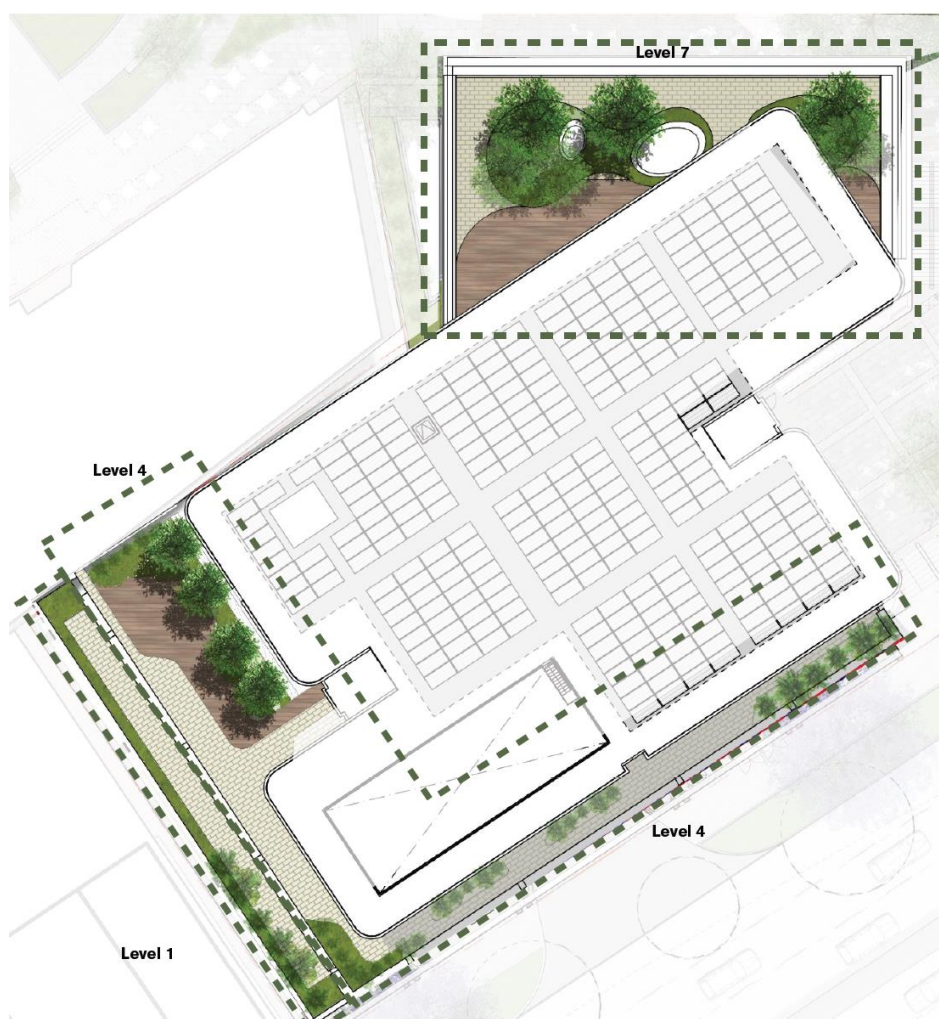


Figure 42 Landscaping on terraces

Source: FJMT

The level 1 terrace includes adequate space to accommodate small meetings and provides a pleasant outlook from interior spaces.

The level 4 terrace is more substantial, providing tenants with a roof garden comprising a variety of seating and standing areas. The southern corners of the terrace are buffered by shrubs and planter beds to reduce wind on the terrace. The level 4 terrace offers views to Georges River and Cumberland Plain.

The level 7 executive terrace contains tree planting for shade and is framed by raised sinuous planter boxes.

3.7 Transport, access and parking

3.7.1 Pedestrian access

Access to the civic building is gained from two separate entrances, including the main grand entry fronting the civic plaza and the from Terminus Street at the upper ground level. In addition, the proposed development has been configured in a way that maximises legibility and pedestrian permeability throughout the site, with clear connections and through site links apparent (see **Figure 43**).

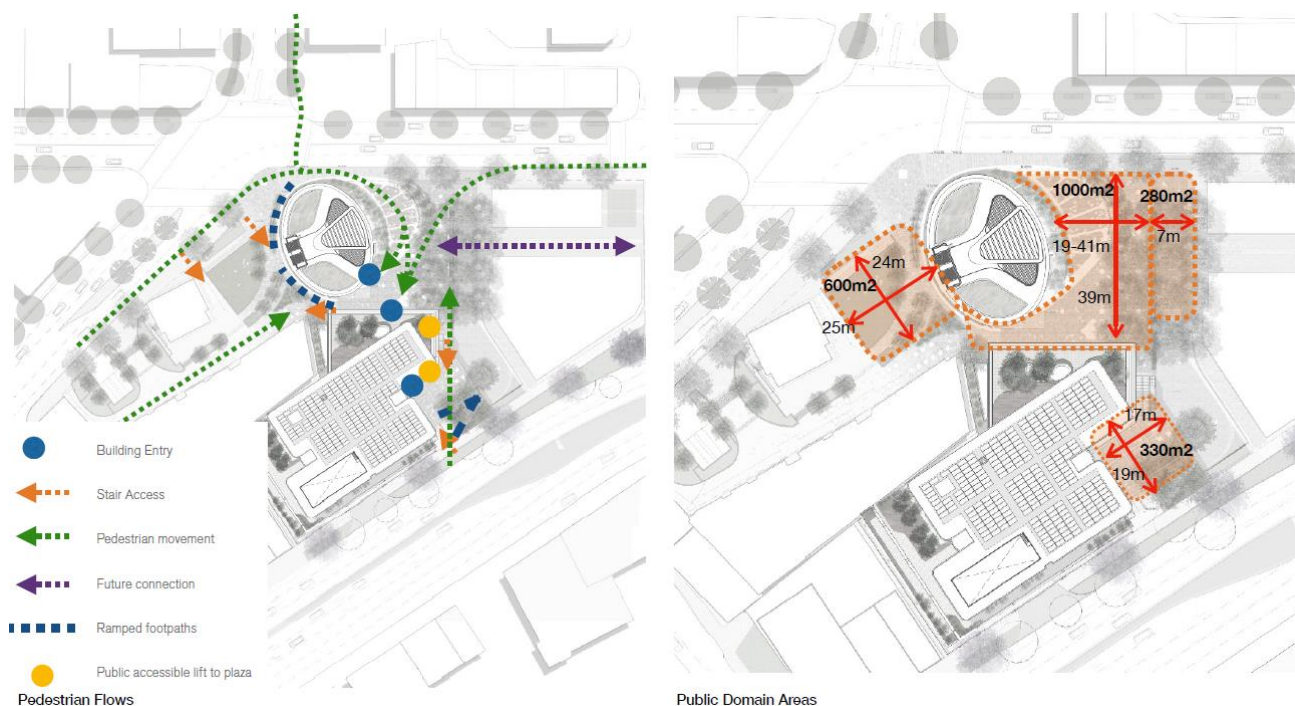


Figure 43 Proposed pedestrian routes and building entries

Source: FJMT

3.7.2 Vehicular access and parking

Vehicular access and egress to the proposed development is provided via Terminus Street for public vehicles (users of the proposed public car park), while all private vehicles (users of the public administration building and commercial tenancies) will gain access to the site via the shared zone off Scott Street. The development provides a total of 343 car spaces (including 9 accessible spaces) across five basement levels. The parking allocation is detailed in **Table 5**.

Table 5 Parking schedule

Type	Number of spaces
Public car spaces	153
Private car spaces (public administration and commercial)	190
Motorcycle	18
Bicycle	138
• Secure	• 108
• Visitor	• 30

3.7.3 Loading and servicing

A loading dock is proposed within the upper ground level (Terminus Street level) of the south-western building. This loading dock comprises a Council waste truck bay, a medium rigid vehicle bay and a courier bay (see **Figure 44**). The loading dock will be accessible via Terminus Street at the south west of the site. The loading dock has been designed so that service vehicles can enter and exit in a forward direction.

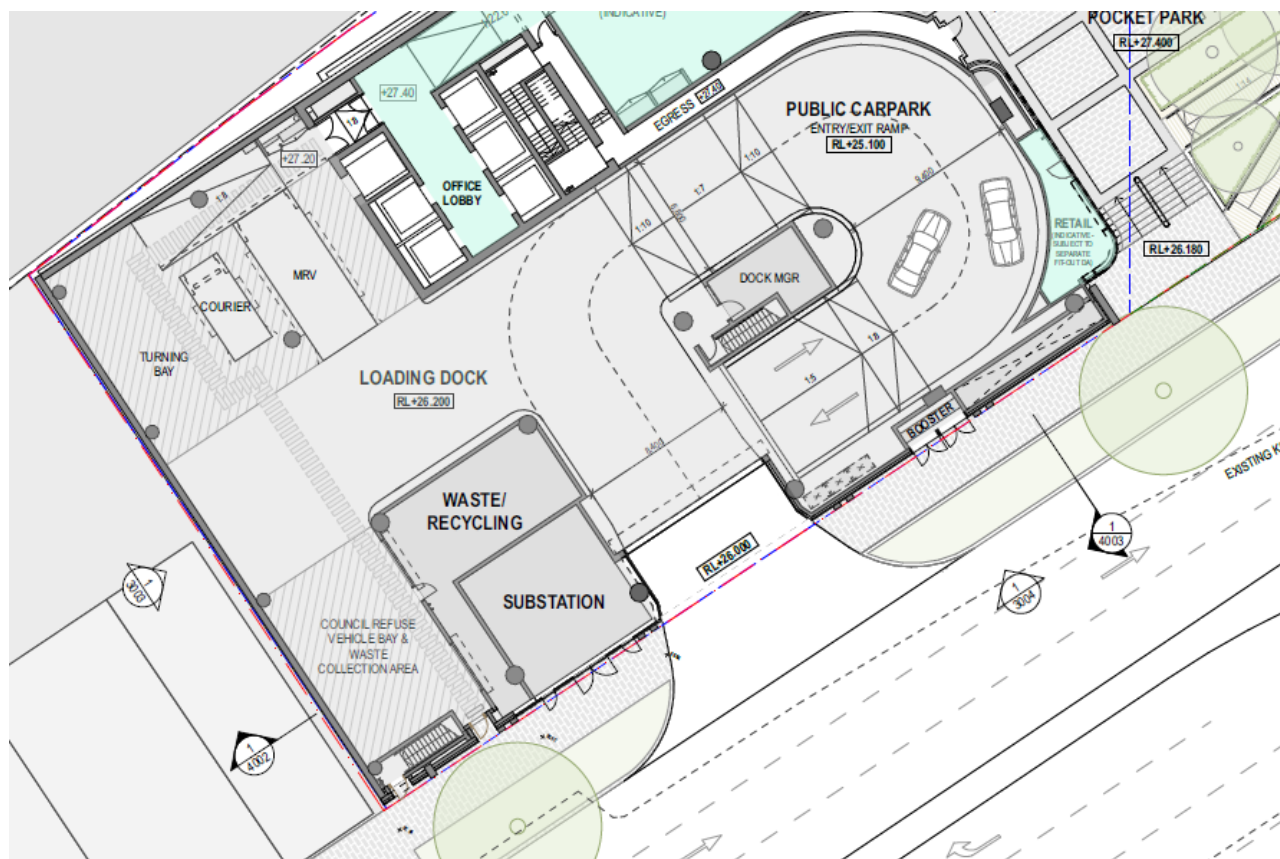


Figure 44 Loading dock and Terminus Street access arrangement

Source: FJMT

3.7.4 End of trip facilities

To maximise tenant wellbeing and building amenity, the proposed development includes three end of trip facilities (EOT), with two located at Basement Level 1 (including one accessible EOT facility) and one located on Basement Level 2. The proposed EOT facilities are summarised in **Table 6** below.

Table 6 End of trip facilities summary

Component	Number
Secure bicycle parking	108
Showers	14
Lockers	134

3.8 Public art

The public art delivered throughout the proposed development will be a product of the Liverpool Civic Place Art Strategy (Public Art Strategy). The Public Art Strategy is community focussed and will incorporate elements that encapsulate components of Liverpool's character, culture and environment. FJMT will collaborate with a curator that has strong ties to the region, expert knowledge of suitable artists and an enthusiasm to explore potential First Nations art.

The purpose of the Public Art Strategy is to ensure that the artwork incorporated into the development seamlessly integrates with the architectural and landscape qualities of the development. As such, the locations to display public art have been carefully selected, including:

1. Sunken Garden
2. Local craft library furniture
3. Main lobby ceiling
4. Terminus Street elevation

The public art locations are illustrated **Figure 45** below.

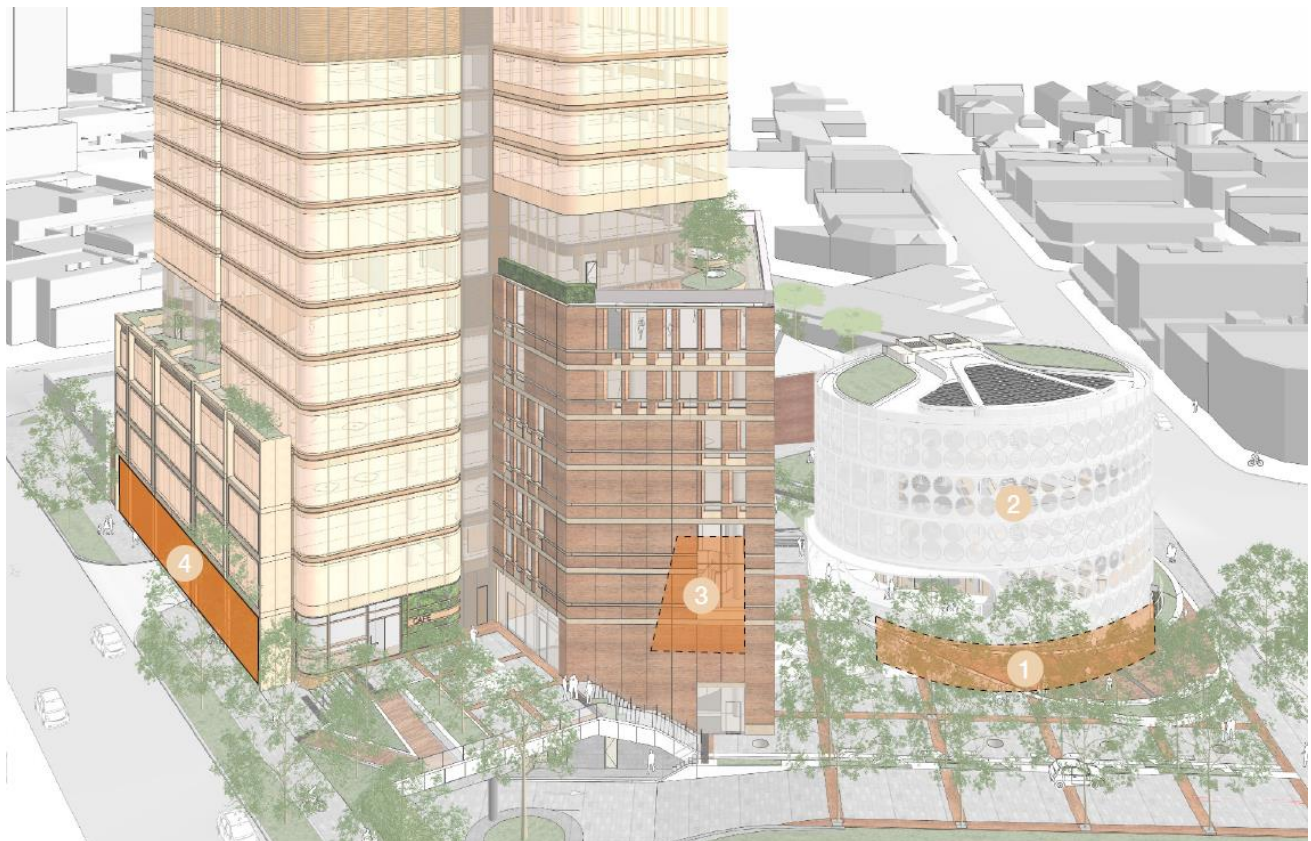


Figure 45 Proposed locations of public artwork

Source: FJMT

4.0 Planning assessment

This section considers the planning issues relevant to the proposed development and provides an assessment of the relevant matters prescribed in section 4.15(1) of the *Environmental Planning and Assessment Act 1979* (EP&A Act).

4.1 Strategies and environmental planning instruments

The DA's consistency and compliance with the relevant strategic plans, environmental planning instruments and policies is considered in **Table 7** below. Variations to, and non-compliances with the key standards and guidelines highlighted in the table are discussed in the following sections of this environmental assessment.

Table 7 Summary of consistency with strategies and environmental planning instruments

Plan	Comments
Strategic Plans and Instruments	
The Greater Sydney Region Plan 'A Metropolis of Three Cities'	<p>The Greater Sydney Region Plan is the current metropolitan strategy that establishes a vision for the future growth of Sydney to 2056. The proposal broadly supports the ten directions and objectives outlined in the Strategy in that it:</p> <ul style="list-style-type: none"> • supports the aim of Liverpool, as an established centre, being a critical location for commercial and retail businesses; • provides high quality commercial floor space and public domain; • co-locates employment generating uses with public transport; and • supports the economic sectors that contribute to investment and business.
Western City District Plan	<p>The vision for Greater Sydney envisages Sydney as a metropolis of three cities, including the Western Parkland City, the Central River City, and the Eastern Harbour City, comprising five more refined districts. Of these, the proposal is located within the Western City District. The proposal supports the objectives of the Western City District in that it:</p> <ul style="list-style-type: none"> • protects and develops the Liverpool CBD commercial core as a key component of the Western Metropolitan Cluster; • revitalises the southern end of the Liverpool CBD, with activated uses and public domain; • supports employment growth in proximity to existing transport infrastructure and builds on the centre's administrative and civic role; • provides a community facility in the form of library use that caters to the community's needs; and • enriches unique places and connections through facilitating a network of attractive, liveable centres and community hubs connected by convenient transport links.
Liverpool City Activation Strategy	<p>The Liverpool City Activation Strategy seeks to offer an innovative model for precinct activation that will ultimately encourage the development of a well-integrated and economically vibrant city centre, while also ensuring that a variety of social, cultural and environmental benefits can be generated. As part of its motive to activate the Liverpool CBD, it seeks to achieve an 18-hour economy. The proposed development will contribute to the achievement of an 18-hour economy as:</p> <ul style="list-style-type: none"> • it co-locates numerous services that will potentially contribute to public gathering and socialising within the uses offered on site; • it is located in the vicinity of Liverpool Railway Station, commercial offices, retail businesses, Liverpool Hospital and the University of Wollongong campus, with many of the workers, students and visitors potentially becoming key users of Phase A of the Liverpool Civic Place development and its public domain offering; and • The proposed development makes an outstanding contribution to the urban realm of Liverpool CBD, with a new library and public domain, which will enhance the sense of place and invite visitors to utilise the development during the day and after work hours.
Liverpool City Centre Retail Study	<p>The proposed development is consistent with the recommendations in this study, given the following reasons:</p> <ul style="list-style-type: none"> • a mixed-use tower development containing commercial services is provided along Terminus Street; • public car parking and service vehicle access for loading is provided along Terminus Street and is integrated with the design of the development;

Plan	Comments
	<ul style="list-style-type: none"> the north-western corner of the development includes the public library and surrounding public domain which activates the area, in accordance with guidelines for the Macquarie Street South Precinct; and the proposed development creates permeable spaces and through site links that allow connections to the Macquarie Street Spine precinct.
<i>State Environmental Planning Policy No.55 – Remediation of Land</i>	A consent authority must not consent to the carrying out of any development on land unless it has considered whether land is contaminated and if the land is contaminated, it is satisfied that the land is or can be made suitable for the proposed development. A Preliminary Site Investigation (PSI) prepared by Douglas Partners accompanied the Concept DA (DA-585/2019) and considered that the site is/can be made suitable for the proposed uses, consistent with the requirements of SEPP 55.
<i>State Environmental Planning Policy (Infrastructure) 2007</i>	The proposed development is deemed to be 'Traffic-generating' development under Clause 104 of the Infrastructure SEPP as it seeks approval for commercial premises greater than 10,000m ² in gross floor area. The application must therefore be referred to Roads and Maritime Services (RMS) for comment.
<i>State Environmental Planning Policy (Educational Establishments and Child Care Facilities) 2017</i>	Refer to Section 4.1.1 .
<i>State Environmental Planning Policy (State and Regional Development) 2011</i>	As the proposal is a class of development described in Schedule 7 of State Environmental Planning Policy (State and Regional Development) 2011, being a Council related development that has a capital investment value (CIV) over \$5 million and a CIV over \$30 million (see Appendix F), Part 4 of the State and Regional Development SEPP applies to the DA. Under Part 4 of the SEPP, the Council's consent function is exercised by the Sydney Western City Joint Regional Planning Panel.
<i>Greater Metropolitan Regional Environmental Plan No 2 – Georges River Catchment</i>	The GMREP No. 2 is a regional environmental plan which was established to guide developments and land use activities within the Georges River catchment areas. The GMREP No. 2 sets out a series of principles developed to protect the environmental sustainability and natural processes associated with the catchment areas from impacts arising from new developments. The Civil and Stormwater Engineering Report prepared by WSP (Appendix G) illustrates the typical arrangements that will be adopted across the site to ensure the development does not adversely impact upon the health, quality and sustainability of the river and its tributaries and ecosystems.
Liverpool Local Environmental Plan 2008	
<i>Clause 2.3 – Zone Objectives and Land Use Table</i>	<p>The site is zoned B4 Mixed Use under Liverpool LEP 2008. The proposed development includes a number of land uses including information and education facility, commercial, public administration and child care centre uses. All proposed uses are permissible with consent in the B4 Mixed Use zone.</p> <p>The proposed development is consistent with the objectives of the zone as it:</p> <ul style="list-style-type: none"> provides a mixture of compatible land uses in a highly serviced and CBD location; supports increased employment opportunities in proximity to existing and planned transport infrastructure; provides short term accommodation to support visitors in the Liverpool CBD; and facilitates a high standard of urban design, convenient urban living and exceptional public amenity.
<i>Clause 4.3 – Height of Buildings</i>	The proposed building height is RL 41.90 for the library building and RL 80.75 for the Council administration building. This accords with the heights of RL 42.85 and RL 84.25 that were approved for the library and Council administration building envelopes, respectively, under the Concept approval.
<i>Clause 4.4 – Floor Space Ratio</i>	The proposed development achieves a maximum FSR of 2.32:1 and is accordingly well below the maximum permissible FSR afforded under Clause 7.5A of 10:1.
<i>Clause 4.6 – Exemptions to development standards</i>	A request under Clause 4.6 to vary the development standards relating to building separation contained in Clause 7.4 of the LEP has been prepared (Appendix H). This variation is further explained in Section 4.4.4 .

Plan	Comments
<i>Clause 5.10 – Heritage Conservation</i>	Part of the site (Lot 201 DP 1224084, 306-310 Macquarie Street) contains a heritage item, being the Memorial School of Arts building (199). However, the site is not located within a heritage conservation area. The site is also proximate to a number of local heritage items as identified at Section 2.2.4 . Accordingly, a Heritage Impact Statement has been prepared by NBRS (Appendix I), which assesses the potential impacts of the proposal in the context of the surrounding heritage listed items. Further discussion is provided at Section 4.7 .
<i>Clause 7.1 – Objectives for development in Liverpool City Centre</i>	The proposed development is consistent with the objectives for development in the Liverpool City Centre as it will facilitate a future development which: <ul style="list-style-type: none"> • preserves the existing street layout, and enhances the CBD connectivity by providing a significant through site link; • modulates the envelope massing to ensure sunlight is maximised to the proposed public domain; • contributes a large expanse of public domain to the southern portion of the Liverpool CBD; • co-locates employment generating uses in proximity to the Liverpool Rail Station; • it preserves the existing street layout and provides a consistent building layout to those located north east of the site; and • does not diminish significant view lines to natural river foreshore and places of heritage significance.
<i>Clause 7.2 – Sun access in Liverpool city centre</i>	The proposal does not create additional overshadowing to any of the areas nominated under this clause.
<i>Clause 7.3 – Car parking in Liverpool city centre</i>	Clause 7.3 requires that: <ul style="list-style-type: none"> • at least one car parking space is provided for every 200m² of any new GFA that is on the ground floor level of the building; • at least one car parking space is provided for every 100m² of any new GFA that is to be used for the purposes of retail premises; • at least one car parking space is provided for every 150m² of any new GFA that is to be used for any other purpose. Based on the proposal's GFA and split of GFA at ground level and on all other levels, the proposal requires at least 142 car parking spaces. The proposed development includes 190 car parking spaces to service the private components of the development throughout the five basement levels and therefore complies with the car parking rates in the LEP.
<i>Clause 7.4 – Building separation in Liverpool city centre</i>	The proposed development varies the building separation requirements of Clause 7.4. Refer to Section 4.4.4 and the Clause 4.6 Variation Request at Appendix H .
<i>Clause 7.5 Design excellence in Liverpool city centre</i>	The proposed development achieves the highest standard of architectural, urban, landscape and environmental design and therefore design excellence. In addition, the proposed development will be reviewed by Council's Design Excellence Advisory Panel as part of the assessment of the DA. Refer to Section 4.1.2 .
<i>Clause 7.5A Additional provisions relating to certain land at Liverpool city centre</i>	The proposed development benefits from additional height and FSR available through the incentive provisions of Clause 7.5A. In accordance with the provisions of the clause, the proposed development: <ul style="list-style-type: none"> • The site is located in 'Area 8' on the FSR Map • Has a lot size exceeding 1500m² • Has at least two street frontages • At least 20% of the proposed GFA is used for the purposes of business premises, centre-based child care facilities, community facilities, educational establishments, entertainment facilities, food and drink premises, functions centres, information and education facilities, medical centres, public administration buildings or retail premises (emphasis bold) • a development control plan that provides for the matters specified in subclause (4) has been prepared for the land (fulfilled by the Concept DA)

Plan	Comments
	<ul style="list-style-type: none"> the site on which the building is located also includes recreation areas, recreation facilities (indoor), community facilities, information and education facilities, through site links or public car parks (emphasis bold)
<i>Clause 7.7 Acid Sulfate Soils</i>	The site is mapped as Class 5 under the Acid Sulfate Soils Map of the LEP and the Geotechnical and Environmental Investigation Report at Appendix J identifies the acid sulfate soil content. Accordingly, an Acid Sulfate Soils Management Plan is not required to be prepared.
<i>Clause 7.8 Flood Planning</i>	As set out within the Civil and Stormwater Engineering Report at Appendix G , the site is outside of the flooding zone and as such, there are no flood planning requirements imposed on the development.
<i>Clause 7.16 – Ground Floor development in zones B1, B2 and B4</i>	In accordance with Clause 7.16, the ground floor of the library and civic buildings will not be used for the purposes of residential accommodation. The proposed buildings contained within the development are also designed with at least one entrance and comprise multiple windows facing a street.
<i>Clause 7.17 – Airspace Operations</i>	The operation of a crane to facilitate the proposed development is a 'controlled activity'. Notwithstanding, the controlled activity has been granted approval (see Appendix K). Further discussion in this regard is provided in Section 4.10 .

4.1.1 State Environmental Planning Policy (Educational Establishments and Child Care Facilities) 2017

The Education and Child Care SEPP aims to ensure once a child care centre is approved and built it can meet the physical requirements for the subsequent service approval application. The Education and Child Care SEPP absorbs key requirements from the National Quality Framework for Early Childhood Education and Care Facilities into the NSW planning system and will supersede local planning controls that are inconsistent with the National regulations. The Education and Child Care SEPP contains:

- a requirement to take Part 2, Part 3 and Part 4 of the Child Care Planning Guideline into consideration when assessing development applications; and
- the establishment of grounds on which a development application for a centre based child care centre cannot be refused by the consent authority.

Part 2 contains seven Design Quality Principles that establish the broad design context guide for all new proposals. Part 3 covers Matters for Consideration that support the Design Quality Principles and must be considered by the consent authority when assessing a DA. Essentially if a proposal is consistent with the Matters for Consideration, the proposal will satisfy the Design Quality Principles. Part 4 contains the guidance on how to apply the National regulations to development proposals.

Appendix L provides an assessment against Part 2, Part 3 and Part 4 of the Child Care Guideline and **Appendix M** includes the National Quality Framework Assessment Checklist to demonstrate that the development is designed to achieve the requirements of Part 4.3 Physical Environment of the Education and Care Services National Regulations. For absolute clarity, FJMT has provided a Design Statement verifying that the proposal has been designed in accordance with the Child Care Planning Guideline (refer to **Appendix D**).

4.1.2 Design excellence

Clause 7.5 of the Liverpool Local Environmental Plan 2008 (Liverpool LEP 2008) requires that the consent authority consider whether a proposed development exhibits design excellence. The applicant is committed to working with Council's Design Excellence Advisory Panel throughout the DA process on the Liverpool Civic Place project to ensure all buildings and public domain elements exhibit design excellence.

Table 8 below provides an itemised assessment of the proposed development against the design excellence provisions contained in clause 7.5 of the Liverpool LEP 2008. In conclusion, it is considered that the proposal exhibits design excellence in accordance with Clause 7.5 of the Liverpool LEP 2008, given it addresses all the requirements of the Clause, and given it is consistent with the advice of the DEP.

Table 8 Compliance with the Liverpool LEP 2008 Design Excellence Provisions

Controls	Comments
<i>In considering whether development exhibits design excellence, the consent authority must have regard to the following matters:</i>	
<i>Whether a high standard of architectural design, materials and detailing appropriate to the building type and location will be achieved</i>	The proposal's architectural design, materials and detailing are of a high standard, and are appropriate. The architectural design and materials reflects the landmark status of the overall Civic Place project and the role it will play for the Liverpool CBD. This is further discussed in Section 4.4 .
<i>Whether the form and external appearance of the proposed development will improve the quality and amenity of the public domain</i>	<p>The form and external appearance of the library building and civic building has been carefully considered by FJMT, having regard to the built form objectives for Phase A of the overall project, involving the delivery primarily of civic buildings. The various design elements and features set out in Section 3.0 ensure a world class civic precinct is delivered.</p> <p>This civic project, which is to be integrated with future 'Phase B' development to the east and the existing Augusta Cullen Plaza to the west, has been designed from the 'ground up', putting at the forefront, the experience of pedestrians and the general public at the ground plane of the future Civic Place, which will arguably be Liverpool's most important future civic space. The project will significantly improve the public domain experience, permeability of the site, and streetscape of Scott Street, Macquarie Street, George Lane and Terminus Street.</p> <p>The proposed development utilises high quality materials and delivers an abundance of landscaped area that will enhance the quality and amenity of the public domain. The public domain contained within the proposed development is further detailed in Section 3.6.</p>
<i>Whether the proposed development detrimentally impacts on view corridors</i>	No significant view corridors from surrounding buildings or public places have been identified that would be impacted by the proposal. The proposed development facilitates a high quality urban environment and does not unreasonably impede on views from the public domain to highly utilised parks or public parks in the vicinity of the site.
<i>Whether the proposed development detrimentally overshadows Bigge Park, Liverpool Pioneers' Memorial Park, Apex Park, St Luke's Church Grounds and Macquarie Street Mall (between Elizabeth Street and Memorial Avenue)</i>	The proposed development will not overshadow any of these sites as illustrated in the overshadowing diagrams prepared by FJMT at Appendix D and discussed in Section 4.5.2 .
<i>Any relevant requirements of applicable development control plans</i>	Clause 7.5A(3) requires the preparation of a site-specific DCP. This is satisfied by virtue of the approved Concept DA, pursuant to Section 4.23 of the EP&A Act. Furthermore, the applicable provisions contained within the Liverpool DCP 2008 are addressed in the DCP Compliance Table included at Appendix N .
How the proposed development addresses the following matters:	
(a) <i>the suitability of the site for development</i>	This is addressed in Section 4.19 .
(b) <i>existing and proposed uses and use mix</i>	<p>The existing uses are set out in Section 2.2.1. The proposed development contains a mixture of civic uses, including an information and education facility (public library), public administration building use (future Council offices), and commercial and child care uses. These uses are to be serviced by car parking situated beneath in the five level basement car park (including a public car park). These uses are considered appropriate in the CBD context of the site, which is in close proximity to Liverpool Station.</p> <p>The proposal has been designed to accommodate viable commercial floor plates in the podium and tower whilst balancing the built form objectives for the development and Precinct.</p>
(c) <i>heritage issues and streetscape constraints</i>	The proposal has been designed to ensure the heritage significance of nearby heritage items is protected, in particular the heritage significance of the Memorial Arts Building. The Heritage Impact Statement included at Appendix I determines that the proposal is appropriate from a heritage and streetscape perspective. Further discussion in this regard is provided in Section 4.7 .

Controls	Comments
(d) <i>the location of any tower proposed, having regard to the need to achieve an acceptable relationship with other towers (existing or proposed) on the same site or on neighbouring sites in terms of separation, setbacks, amenity and urban form</i>	<p>The location and extent of the proposed mixed use civic building tower is consistent with the location and extent of the tower envisaged as part of the approved Concept Proposal. The key drivers for the location of the tower was ensuring it provided an important civic backdrop to the precinct and 'anchor' to the precinct, ensuring its location allowed ample and usable public domain space fronting Scott Street, and ensuring its related appropriately to the existing residential building at 300 Macquarie Street.</p> <p>The civic building is characterised by its unique geometric form and architecture. The northern wing of the podium is oriented north, and accommodates key Council functions and presents as a main civic address from the public domain. The tower is orientated north-west, respecting the prominence of the podium and relating to existing development to the north-west.</p> <p>As demonstrated through the approved Concept Proposal, the tower will be setback at least 12 metres from future tower development on the Phase B/C sites to the east, which is considered appropriate given the maximum permissible height achievable within the approved building envelopes.</p> <p>Refer to Section 4.4 for further discussion.</p>
(e) <i>bulk, massing and modulation of buildings</i>	<p>The massing strategy for the site was determined as part of the approved Concept Proposal, which permits a podium and tower form for the civic building generally in the manner proposed with this DA, and a public library building form which is also consistent with the detailed design proposed.</p> <p>The massing of the proposal and modulation of the buildings is exemplary, varied, and responds to the unique geometry of the site, allowing the precinct to become a 'southern gateway' to Liverpool's CBD. Its taller forms will assist in wayfinding to the civic precinct from a range of vantage points.</p> <p>The massing of the library building in particular has provided the opportunity for increased public domain space compared to that envisaged with the approved Concept DA. The bulk, massing and modulation of the proposed buildings is generally consistent with the Concept DA, which was determined as appropriate, as demonstrated in Section 4.3.1.</p>
(f) <i>street frontage heights</i>	<p>At a range of 6-8 storeys, the street frontage heights of the proposed buildings have been designed to reinforce a pedestrian scale commensurate with this important civic precinct, and which provide a sense of openness to the future public domain. The street frontage height of the civic building and library in particular will reinforce generally the existing building height of 300 Macquarie Street.</p> <p>Street frontage heights proposed for the development are largely consistent with those approved in the Concept DA. Further discussion is provided in Section 4.3.1.</p>
(g) <i>environmental impacts such as sustainable design, overshadowing, wind and reflectivity</i>	<p>As discussed further in this section, the proposed development has been designed to minimise environmental impacts within the locality. Overshadowing, solar access, visual impacts, noise, and wind have all been carefully considered and the proposal is found to have negligible impacts. Sustainable design has been at the forefront of the building's design, as evident in the best practice Green Star and NABERs targets to be adopted.</p>
(h) <i>the achievement of the principles of ecologically sustainable development</i>	<p>Ecologically sustainable development (ESD) principles are achieved through the development, as demonstrated in the ESD Report included in Appendix O. Further discussion relating to the attainment of ESD principles in the design of the development is provided in Section 4.11.</p>
(i) <i>pedestrian, cycle, vehicular and service access, circulation and requirements</i>	<p>Pedestrian: Whilst this DA relates to Phase A only of the overall Liverpool Civic Place project, the development has been designed as a truly integrated project, with the pedestrian experience in the public domain from east to west connecting the future precinct to the existing Augusta Cullen Plaza. The proposal prioritises pedestrian movements east to west and north south, providing significant through site link opportunities from Terminus Street to Scott Street, whilst blending in access to the civic, commercial and retail areas of the wider precinct. The design of the proposal emphasises civic-scaled entrances which provide a sense of arrival for pedestrians, with meaningful connections to the public domain.</p>

Controls	Comments
	<p>Cycle: The proposal's shared accessway from Scott Street and basement entries from the shared road and Terminus Street provide ample opportunity for, and encourage, cycling, to and from the precinct. Comprehensive end of trip facilities located in the basement, as well as precinct bicycle parking, will further encourage sustainable transport use.</p> <p>Vehicle and service access: Careful consideration has been given to the design coordination of vehicle and service access, not just for this proposal, but for future proposals on the Phase B and C sites. A split in parking entries (Terminus Street and the shared access way through the site) provides a balanced response, prioritising pedestrian amenity in the primary public domain areas to the north of the site, whilst locating away service vehicle access away from important civic building entries.</p>
(j) <i>the impact on, and any proposed improvements to, the public domain</i>	As discussed in Section 4.4 , a significant focus of the overall precinct redevelopment has been the desire to achieve world class interfaces at ground level between the buildings and the public domain, with the goal of creating a civic 'heart' for the Liverpool CBD. The designs of the proposed buildings' interfaces are centred on maximising the potential for public domain activation, by maximising the openness and connections to the surrounding public domain.

4.2 Development control plans

The Liverpool Development Control Plan 2008 (Liverpool DCP 2008) is the relevant DCP for the site. The proposed development is consistent with the objectives of the Liverpool DCP 2008 for the following reasons:

- the proposed development accords with the Concept DA approval for the site that was made pursuant to Section 4.23 of the EP&A Act, which results in the site being subject to more detailed development provisions;
- the proposed development includes a landscaped through site link, which will enhance the natural environment contained within the Liverpool City Centre;
- the proposed development will provide a significant and transformative benefit to the amenity and urban and environmental design of the City of Liverpool;
- it respects the environmental heritage of Liverpool, with the orientation of the proposed buildings set back considerably from the nearest heritage items; and
- the proposed development facilitates environmentally sustainable development outcomes.

Under Section 4.15(3A) of the EP&A Act, a consent authority is required to apply DCP provisions flexibly and allow reasonable alternative solutions that achieve the objects of those standards. A detailed review of the DA's consistency with the Liverpool DCP 2008 is provided in **Appendix N**. The assessment demonstrates that the proposal achieves a high level of compliance with the relevant development controls. Where compliance with numeric controls cannot be achieved, it is demonstrated that the alternative solutions proposed are reasonable and will achieve the relevant Council objectives.

4.3 Consistency with the approved Concept DA

As described in **Section 1.1.1**, DA-585/2019 is a Concept DA that applies to the site. The proposed development directly relates to the Concept DA applying to the site and is the first detailed DA lodged in respect of that consent. A comparison of the key dimensions approved for the relevant building envelopes in the Concept DA and the dimensions sought as part of the subject DA is provided in

Table 9 Consistency of the proposed development with the Concept DA.

Table 9 Consistency of the proposed development with the Concept DA

Control	Concept DA approval	Phase A proposal	Difference
Landscaped area	4,100m ² – for entire Liverpool Civic Place Site (44%).	3,939m ² (includes trafficable terraces and library green roof, sidewalks and verges to Terminus and Scott St)	(further landscaped area anticipated with Phase B/C)
Car parking	413 spaces (indicative – subject to change with detailed design applications.	343	70 less spaces
North-western building (library)			
Land uses	Information and education facility (public library)	Information and education facility (public library)	Nil
Building height	RL 44.45	RL 41.90	2.55m less
GFA	5,059m ²	5,000m ²	59m ² less
Setbacks and separation			
• North	• 0m setback to Scott Street	• 0m setback to Scott Street	Nil
• South	• 4m separation from the south-western envelope	• 4.5m separation from the south-western envelope	+0.5m
• East	• 26m separation from the eastern envelope	• 30m separation from the Phase B/C of the Liverpool Civic Place site	+4m
• West	• Approximately 23m separation from the School of Arts Building	• Approximately 23m separation from the School of Arts Building	Nil
South-western building envelope (public administration building and commercial premises)			
Land uses	Public administration building, commercial and/or childcare uses	Public administration building, commercial and/or childcare uses	Nil
GFA	17,014m ²	16,689m ²	325m ² less
Maximum height			
• Podium	• RL 56.7	• RL 56.7	Nil
• Tower	• RL 84.25	• RL 80.75	- 3.5m
Podium setbacks and separation			
• North	• 37.2m front setback to Scott Street • 4m separation from north-western envelope	• 37.7m front setback to Scott Street • 4m separation from north-western envelope	+0.5m Nil
• South	• 0m setback to Terminus Street	• 0m rear setback to Terminus Street	Nil
• East	• 12m separation from the eastern envelope	• 12m separation from Phase B/C of Liverpool Civic Place	Nil
• West	• 0.8m – 4m separation to adjacent site	• 2.6m - 5.5m separation to adjacent site	+1.8 & 1.5
Tower setbacks and separation			
• North	• Approximately 41.8m setback to Scott and 49.2m setback to Macquarie Street	• Approximately 41.8m setback to Scott and 49.2m setback to Macquarie Street	Nil
• South	• 2.5m setback from Terminus Street • 12m separation from eastern envelope	• 2.5m setback from Terminus Street	Nil

Control	Concept DA approval	Phase A proposal	Difference
<ul style="list-style-type: none"> East 	<ul style="list-style-type: none"> 6m-12m separation from adjacent site 	<ul style="list-style-type: none"> 12m separation from Phase B/C of the Liverpool Civic Place site 	Nil
<ul style="list-style-type: none"> West 		<ul style="list-style-type: none"> 6m-12m separation 	Nil

4.3.1 Building envelope comparison

A detailed comparison of the proposal's relationship with the Concept DA building envelopes is provided within the Design Report in **Appendix D**, as well as **Figure 46** and **Figure 47** below. It is evident from this illustration that the proposed detailed designs have emerged within the approved planning envelopes. Notwithstanding this, the detailed building design has advanced, to incorporate building articulation and expression that presents an optimal design solution for the site. Specifically:

- The public library building has been reduced by 2.5m in height relative to the approved building envelope, however it retains a nil setback to Scott Street. This enables reduced bulk, however still enables the building to read as a civic anchor for the street corner and a defining landmark for the southern end of the Liverpool City Centre.
- The public library building has been reduced marginally in width from the west and 4m from the east, providing a more refined building design that enables additional public domain at the ground plane.
- The separation between the public library and the civic building has been increased marginally. Through the development assessment of the Concept DA, it has been determined that this separation is appropriate to create breathing room and ample circulation between the two buildings.
- The rear elevation of the building at 300 Macquarie Street presents a blank party wall, as such it is visually appropriate to conceal this from the public domain.
- The civic building tower envelope has been reduced to provide a more elegant form, with mass removed from the north eastern and south western portions of the tower. The split shifted tower form will effectively reduce visual bulk, increase building separation, and improve internal workspace view and daylight amenity.

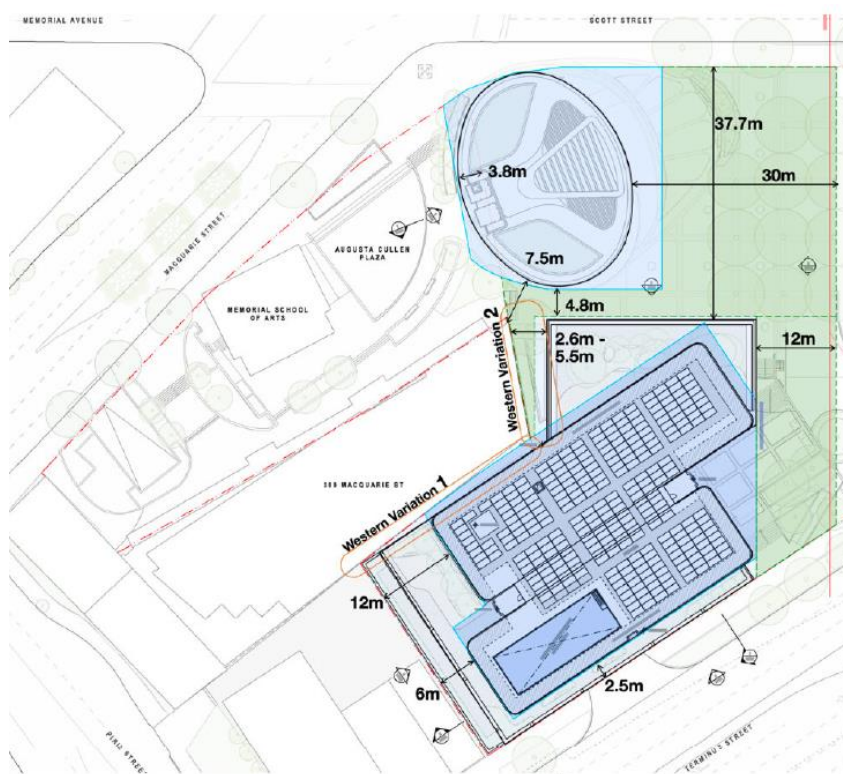


Figure 46 Envelope comparison plan (Concept DA building envelopes identified in light blue colour)

Source: FJMT



Figure 47 Envelope comparison elevation (Concept DA building envelope identified in light blue colour)

Source: FJMT

4.4 Built form and urban design

The Concept DA established the vision and planning framework to assess the detailed design of the future development on the Liverpool Civic Place site. Specifically, the proposal has been designed with regard to the design principles established by FJMT at Concept Proposal stage, and further refined by Architectus, Council and the Design Excellence Panel through the assessment of the Concept DA. These principles provide for a well-considered and respectful approach to rejuvenating a site of critical strategic importance to the Liverpool CBD. The proposal has addressed and built upon these principles through the detailed design.

The following subsections set out the key principles established through the Concept DA stage with the proposal's response to each relevant principle, and provide a detailed assessment of the built form and urban design of the public library building, civic building and the public domain.

Overall, the proposed development delivers a built form that is responsive to the context and characteristics of the precinct, the character of the surrounding area, and the location of the precinct at the edge of Liverpool's CBD grid. The design and layout of the proposed civic buildings and public domain is a complex response to a uniquely shaped and located site and its specific constraints, the features of the site and the surrounding area, and the future character of this precinct that is undergoing significant change. In addition, the proposal's design has been informed by the commercial office market's expectations regarding floor plate sizes and configurations. The internal arrangements have been designed with future tenant requirements in mind and in part has influenced the building's external presentation to its context.

4.4.1 Public library

Through the Concept DA, it was established that the north western building envelope, now the public library, would be a unique, landmark building that would act as a civic icon for the site. The main design principles underpinning the future design were:

- establish a nil setback to Scott Street, however, its location, form and volume are distinct and separated from the other volumes to reinforce a distinctly civic quality and return to a street pattern of freestanding buildings which were once located on this site.
- provide a distinct built form marker when viewed from Macquarie Street and Scott Street.

The design of the library achieves these principles. Its unique design, siting and geometry are distinct frame the character of the precinct as 'civic' and pedestrian oriented. The library building's scale and materiality work together to provide an entry point to the precinct which is sympathetic to its existing surrounding character and which is reflective of its desired future character, relative to the principles set out at the concept stage. **Figure 48** and **Figure 49** demonstrates the library building's 'fit' within its context, and its role in offsetting the scale of the buildings behind it.



Figure 48 View of proposal looking south down Macquarie Street

Source: FJMT

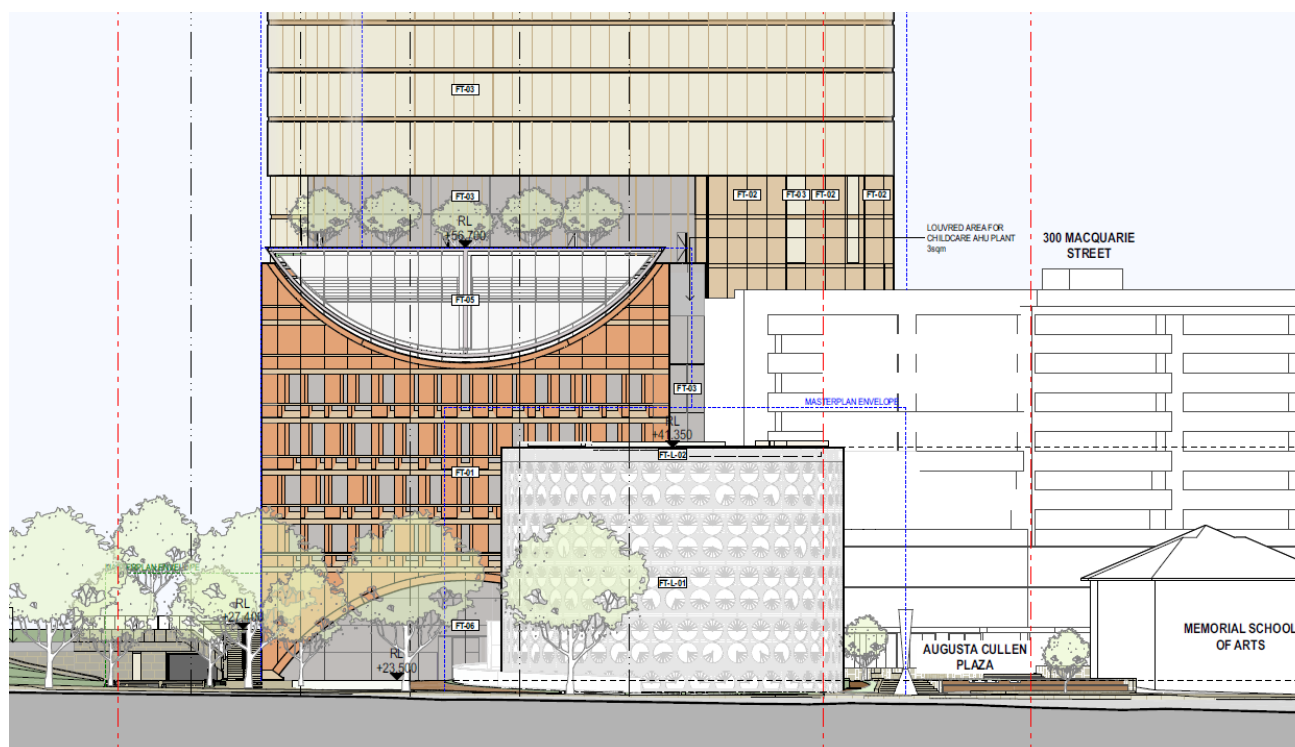


Figure 49 North elevation of proposal

Source: FJMT

In addition to the above, the design of the library building comprises a careful selection of materials and finishes which contribute to its role as a new focal point in the revitalised urban landscape of the Liverpool CBD. The façade of the building uniquely includes large circular frames with full glazed windows that enable a clear outlook onto the public domain and into the library building, thereby seamlessly connecting exterior and interior public space. These circular frames and their function of making the public domain and library visible is displayed in **Figure 50** and **Figure 51**.

The library building includes a solid façade which provides a practical design solution to conceal the location of the fire stairs. This provides an aesthetically pleasing design that effectively breaks down the length of the building through façade articulation, creating a visually appealing design outcome. Additionally, the proposed design of the library façade includes privacy treatments to the façade on level 2 and 3 to prevent overlooking into the existing mixed-use development at 300 Macquarie Street.

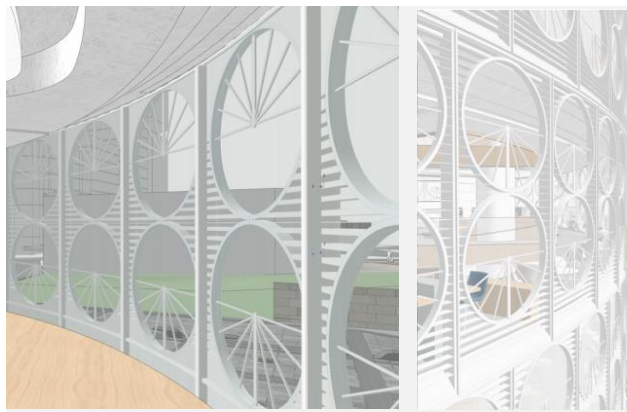


Figure 50 Circular frames from the inside and outside

Source: FJMT

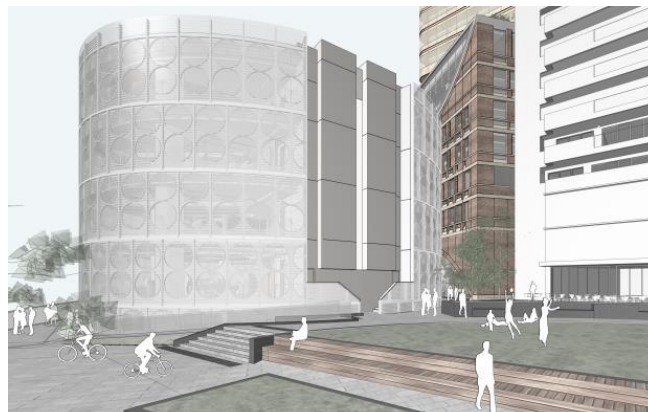


Figure 51 Circular frames allow visibility to and from the public domain

Source: FJMT

4.4.2 Mixed use civic building

Through the Concept DA, the vision of the mixed use building was to create a civic building which would provide a new focal point in the urban landscape of a revitalised and growing Liverpool CBD, which is highly visible and identifiable from a distance. The building was intended to form a transition in scale from lower lying commercial areas reflecting its social and civic significance, offer design excellence to convey the Liverpool community's value, and most importantly, create a visible gateway precinct at the southern end of Liverpool's CBD which will be highly visible from arterial roads (across the Georges River), from the train station and from Liverpool's 'high streets'. Some design strategies to achieve this were:

- a conscious street wall height and tower setback to create the gradation of scale from the School of Arts building, and to create a relationship to the datum of the existing building at 300 Macquarie Street. This design move is in keeping with the new Scott Street datum with height and status to reflect its important southern gateway intent.
- Locating the tower having regard to the importance of scale transition from low (Macquarie Street) to high (Terminus Street), ensuring it is a secondary backdrop to the Civic precinct rather than in the foreground.

The design of the civic building achieves these principles. Its scale, mixed orientation and varied design elements and articulation 'place' it as a prominent, unique and contextual civic marker in the Liverpool Civic Place project. When viewed from Scott Street, its varied orientation responds elegantly to the both the orientation of the public domain (at podium level) and the orientation and unique geometry of the site (at tower level), as illustrated in **Figure 52**. When viewed from Terminus Street, the building responds to its alignment, and its stepped form provides relief from its scale and a street frontage height which provides a pedestrian scale and relationship to existing and future development along the streetscape.



Figure 52 View of proposal from Scott Street

Source: FJMT



Figure 53 View of proposal from Terminus Street

Source: FJMT

Design details

The arrival experience to the civic building is characterised by a double height void above the entrance, which creates a grand lobby that is highly recognisable and civic in nature, allowing ease of access for workers, tenants and visitors. Furthermore, a key aspect of the civic building design is the Terminus-to-plaza permeability and transparency, providing visual connectivity and permeability from the main grand entry via the plaza and the second entry off Terminus Street. This is achieved as the building has been designed at ground level with transparent glazing and without internal visual obstructions (see **Figure 54**). This allows for clear views through the ground plane of the development from Terminus Street and the plaza, contributing to its activation.



Figure 54 Grand civic entrance, visual connectivity and permeability of main entrance

Source: FJMT

The proposed design of the civic building's podium and tower varies for sections of the development with differing orientations. The portion of the civic building podium oriented to the civic square in the north, north east and north west is composed of a curtain wall comprising steel fabricated panels of lightly tinted bronze performance glazing, combined with vertical brick blades that are intertwined with horizontal sandstone detailing. This provides north-facing solar shade, while instilling this portion of the façade with depth and a fitting character that harmoniously integrates with the local heritage character, particularly in the form of the brickwork utilised for the immediately adjacent Memorial School of Arts building. The similarity in materiality and seamless integration of the civic square podium with the Memorial School of Arts building is exemplified in **Figure 55**.



Figure 55 Integration of the civic square podium with the Memorial School of Arts building

Source: FJMT

The massing and modulation of the Terminus Street podium façade accords with the Terminus Street street wall setting, including the opposite Telstra Exchange. The upper level of this façade is recessed to reduce the appearance of bulk and street wall height in transition from taller sites to the east and lower sites to the west, while also enriching the architectural design with a unique character epitomising the role of the civic building as a key urban marker.



Figure 56 Terminus Street frontage materiality

Source: FJMT

4.4.3 Public domain

Central to the design and functionality of the Liverpool Civic Place precinct is the large expanse of public domain, a significant component of which is located within the Phase A site. The public domain effectively anchors the precinct, and constitutes a multifaceted and multi-directional through-site link, providing future east-west connectivity between the Phase B/C site through Phase A, and through to Augusta Cullen Plaza, as well as connectivity between Scott Street / Macquarie Street and Terminus Street.

The Liverpool Civic Place is an integrated landscape and architectural response that is inspired by the natural environment, which merges sustainable ESD initiatives within a vibrant and historic and cultural growing urban context. The proposed public domain and landscape approach is to create a landscape as an integral part of the built form, connected with the CBD through a community plaza that facilitates events, work day activities and social interaction both cultural and Council functions.

The main design principles underpinning the design of the public domain are to:

- provide an increase in canopy cover offering shaded microclimates for recreational amenity and habitat
- provide equitable space for cultural backgrounds
- provide strong, inviting and engaging public places
- promote active and passive pursuits
- establish a distinctive community identity and create a strong sense of place
- showcase innovative environmentally sustainable design
- promote health and wellbeing
- support both day time and night time economies
- offer high amenity landscape and streetscape linkages
- provide a safe, inclusive and sustainable place
- harness emerging technologies and innovative art forms.

These objectives are achieved through various techniques, including:

- The new civic park created to the west offers relief from the retail and commercial streetscapes of the CBD and provides relief to a busy frontage along Terminus Street.
- The design and scale of the public domain stitched together by civic and community spaces will ensure these important buildings will be seamlessly connected to each other at the pedestrian level.
- High quality landscaped elements and materials will extend and improve existing public domain with seating, planting and venues for small and large groups, and is an exemplar of good public realm.

A detailed landscape scheme has been prepared by FJMT and is illustrated in the Landscape Plans in **Appendix A** and the Design Report in **Appendix D**. The landscape scheme has been designed to integrate with the future open space network and enhance the proposed built form.

Public Domain Plan – Concept DA Condition 4(a)

It is noted that Condition 4a) of the Concept DA requires that, prior to the determination of any Detailed DA subject to the Concept Approval, that a detailed Public Domain and Landscape Plan must be prepared by a suitably qualified AILA Registered Landscape Architect or Urban Designer, in accordance with the requirements of this condition. Detailed proposals for the public domain areas within the precinct (such as public domain concept proposed with this DA) must demonstrate consistency with the final public domain plan as endorsed.

4.4.4 Building separation

Clause 7.4 of the Liverpool LEP 2008 requires that the separation distance from neighbouring buildings and between separate towers, or other separate raised parts, of the same building is at least:

- 12m for parts of buildings between 25m and 45m above ground level (finished) on land in Zone B3 Commercial Core or B4 Mixed Use, and
- 28m for parts of buildings 45m or more above ground level (finished) on land in Zone B3 Commercial Core or B4 Mixed Use.

The building separation development standards within clause 7.4 have been embedded in the Liverpool LEP 2008 for over a decade. In the time since, the strategic vision for Liverpool has evolved which is supported by key strategic plans prepared by the NSW State Government, including the Greater Sydney Region Plan 'A Metropolis of Three Cities' and the Western City District Plan. Specifically, the NSW State Government has identified Liverpool as a Metropolitan Centre within the Western Parkland City (the third city in the 'Three Cities' vision) identifying that:

The established centres of Liverpool, Greater Penrith and Campbelltown-Macarthur will be critical locations for commercial and retail businesses and health, education and other services as the city grows.

Given the location of the site within the Liverpool Metropolitan Centre and the strategic objectives for Liverpool as set out in the Greater Sydney Region Plan and the Western City District Plan, the current statutory building separation controls are not considered to be conducive to growing a strong and competitive CBD, and one which takes advantage of limited CBD zoned land to deliver jobs and employment generating floor space.

As illustrated in **Figure 57** below, there are two proposed variations to the building separation development standards set out in Clause 7.4, these relating to the proposed mixed use civic building and its proximity to the existing mixed use building at 300 Macquarie Street, immediately adjacent to the site. The variations are:

- a nil-2.6m separation is proposed from the proposed mixed use civic building to the rear of the existing mixed-use building at 300 Macquarie Street, in contravention of Clause 7.4(2)(d), which requires a minimum separation distance of 12m for parts of buildings between 25m and 45m in height. The contravention occurs as the proposed building is greater than 12 metres in height (RL 56.7 for the podium and RL 80.75 for the tower) and 300 Macquarie Street is greater than 25 metres in height but less than 45 metres in height.
- a varied building separation of between 2.6m – 5.5m is proposed between the northern section of the podium of the south-western building and the existing building at 300 Macquarie Street, in contravention of Clause 7.4(2)(d), which requires a minimum separation distance of 12m for parts of buildings between 25m and 45m height. The contravention occurs as the podium is proposed at a height between 25m and 45m in height (RL 55.5m) and 300 Macquarie Street is greater than 25 metres in height but less than 45 metres in height.

Accordingly, a request under Clause 4.6 of the LEP to vary the building separation development standards is provided in **Appendix H**, and the justification contained within is outlined below.



Figure 57 Building setbacks and separations

Source: FJMT

The Clause 4.6 variation request details that the objective of the building separation development standards is achieved notwithstanding non-compliance with the standards. Specifically, the single objective of the development standard contained in Clause 7.4 of the Liverpool LEP 2008 is:

‘to ensure minimum sufficient separation of buildings for reasons of visual appearance, privacy and solar access’.

The objective places an emphasis on visual appearance, privacy and solar access. The Clause 4.6 variation request in **Appendix H** provides a detailed assessment of the proposed variations having regard to these three measures, and in summary it finds that:

- In relation to visual appearance:
 - The rear elevation of the building at 300 Macquarie Street presents a blank party wall, as such it is visually appropriate to conceal this from the public domain.
 - The podium of the proposed mixed use civic building has been informed by the datum of the existing mixed use building at 300 Macquarie Street.
- In relation to privacy:
 - Apartments and tenancies within the building at 300 Macquarie Street are oriented to the north west and the building contains no rooftop uses, as such the variations will not generate any privacy impact to this building.
 - Privacy is discussed further in **Section 4.5.3**.
- In relation to solar access:
 - The proposed buildings have been sited and designed cast to ensure the new public domain area to the east of the library is provided with substantial solar access throughout the day.

- The majority of the central through-site link receives direct sunlight between 11am and 1pm in midwinter. Whilst some overshadowing will occur, this is appropriate within an urbanised and growing metropolitan centre.
- The reduced separation to the 300 Macquarie Street building is at the southern interface, as such there is no impact on solar access to this building.
- Solar access is discussed further in **Section 4.5.2**.

Concept DA Approval (DA-585/2019)

In approving the Concept Proposal (DA-585/2019) for the site, the Sydney Western City Planning Panel approved variations to the same building separation development standards in the same locations, proposed with this variation request, but of a greater magnitude. The panel in its determination and statement of reasons noted the following in relation to its support for the Clause 4.6 Variation request:

Application to vary a development standard

There are two areas of non-compliance with Clause 7.4(2)(d) and Clause 7.4(2)(e) of the Liverpool LEP 2008 concerning building separation arising from the proposed concept:

- (i) *First, a nil separation is provided from the proposed south-western building envelope to the existing mixed-use building at 300 Macquarie Street up to nine storeys high. That non-compliance arises in the context of 300 Macquarie Street presenting a blank rear wall its western boundary, with all apartments and tenancies of that building oriented to the north west. Issues of visual appearance, privacy and solar access which are the objectives of the standards are therefore unlikely to be compromised through that non-compliance.*
- (ii) *Second, adjacent to the central thoroughfare between Scott Street and Terminus Street, separation between the proposed south-western tower envelope and the eastern tower envelope is 12m above 45m in height, whereas the minimum separation required at this height by Clause 7.4(2)(e) strictly applied is 28m. The proposed variation to this development standard ranges from around 7m (25%) to 16m (57%).*

Again however, the panel is satisfied that the aims of achieving a superior outcome in terms of visual appearance, privacy and solar access can be achieved without strict compliance provided that the final DA design responds to the pinch point between the two built forms with strong articulation and a creative approach to the final facades. That process has been begun with the rotation of the above podium tower on the western side of the thoroughfare. The issue of wind velocity between the two building elements will require further attention at detailed DA stage and potentially will require modelling of the final proposals to ensure a satisfactory result. Shadow modelling has been supplied to demonstrate that adequate compliance can be achieved in future detailed designs.

The Panel was particularly persuaded by the information included with the concept proposal to the effect that the envelopes for which approval is sought have been “deliberately designed as a ‘loose fit’ with sufficient excess volume to allow for design excellence to be achieved through the detailed building design and articulation”. The Panel will look to see that commitment carried through to the final design, and anticipates that it will be a strong theme in future consultation with Council’s Design Excellence Advisory Panel.

It is on that basis that following careful consideration of the design against the written request from the applicant, made under cl 4.6 (3) of the Liverpool Local Environmental Plan 2008 (LEP), that the Panel is satisfied that the proposal has demonstrated that:

- a) *compliance with Clause 7.4(2)(d) and Clause 7.4(2)(e) of the Liverpool LEP 2008 is unreasonable or unnecessary in the circumstances; and*
- b) *there are sufficient environmental planning grounds to justify contravening the development standards.*

The panel is satisfied that:

- a) *the applicant’s written request adequately addresses the matters required to be addressed under cl 4.6 (3) of the LEP; and*

- b) the development is in the public interest because it is consistent with the objectives of Clause 7.4(2)(d) and Clause 7.4(2)(e) of the LEP and the objectives for development in the B4 Mixed Use zone; and
- c) the concurrence of the Secretary to the variation has been assumed.

On the basis that the consent authority has recently determined that variations greater than those proposed with this request (in the same locations) satisfy the requirement of Clause 4.6 of the Liverpool LEP 2008, it is considered that there are sufficient environmental planning grounds to support the proposed variations. The variations the subject of this request are of a lesser magnitude given the proposed buildings do not occupy the full extent of the approved building envelopes.

Figure 58 below illustrates the variations approved by the Panel on 31 August 2020.

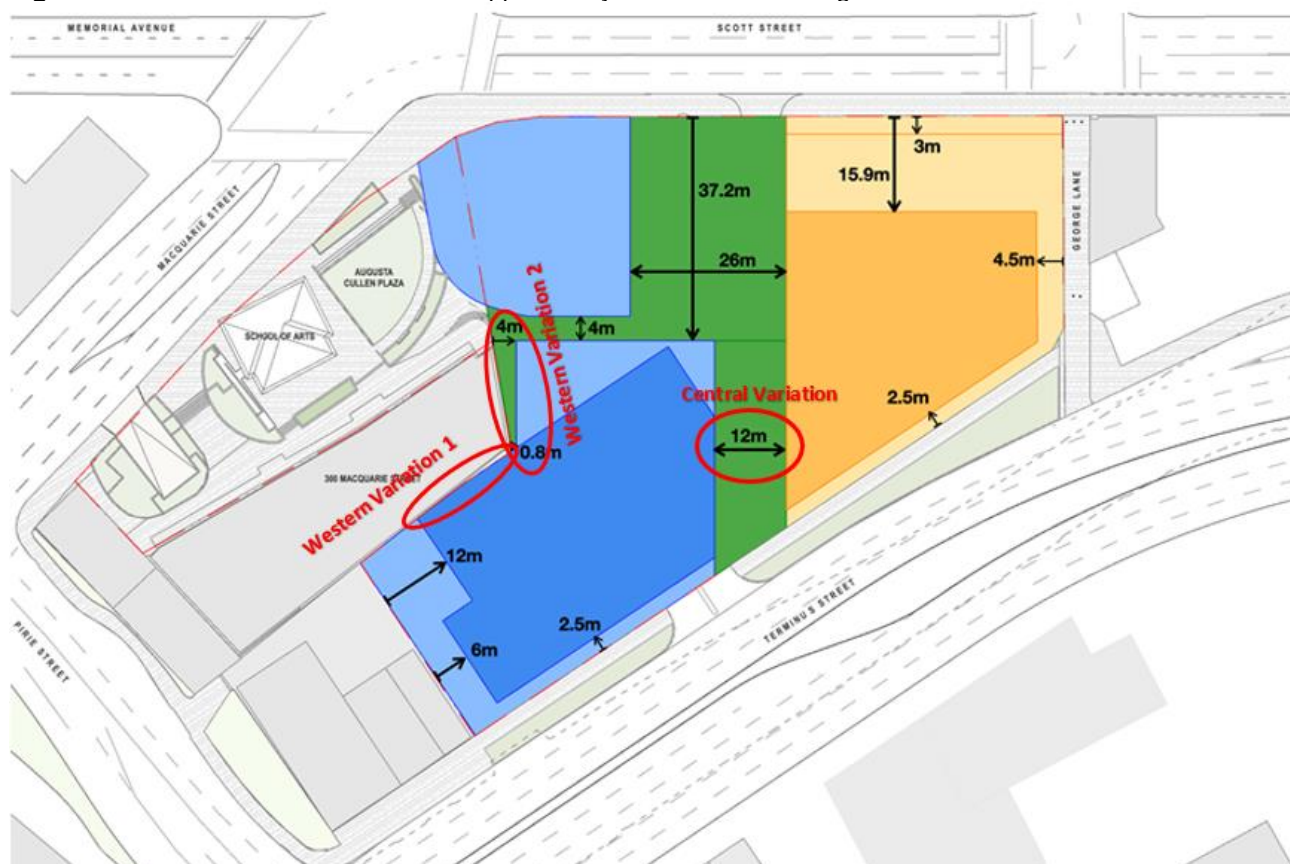


Figure 58 Approved building separation variations under Concept DA approval (DA-585/2019)

Note: This Clause 4.6 variation request relates to western variations 1 and 2 only.

Source: FJMT

4.5 Impact on adjoining properties

The scale of the proposed development does not result in any unreasonable impacts on surrounding properties in terms of overshadowing, views and privacy. This is further discussed below with supporting analysis in the Design Report (**Appendix D**).

4.5.1 Opportunity sites' development potential

Future redevelopment scenarios within the street block were investigated as part of the Concept DA. Specifically, there are two other potential 'opportunity sites' within the street block, however site amalgamation is required to achieve the development uplift available pursuant to clause 7.5A of the Liverpool LEP 2008 on these sites (above the mapped 3:1 FSR and 28m height controls). The two potential opportunity sites, their indicative development potential and how the Concept Proposal respected this development potential was investigated as part of the Concept DA.

Pursuant to detailed modelling and rigorous development assessment, the Concept Proposal was determined to afford sufficient redevelopment opportunities on the adjacent sites, should they be amalgamated and redeveloped. In this regard, as the proposed detailed designs do not occupy the full extent of the approved Concept DA envelopes, the detailed development proposal the subject of this development application will also enable the redevelopment of these sites in accordance with their strategic potential should the opportunity eventuate.



Figure 59 Potential opportunity site redevelopment within the street block (Concept DA context)

Source: FJMT

4.5.2 Overshadowing

FJMT has prepared a shadow analysis of the proposal which is provided in **Appendix D**. This analysis illustrates the shadow cast by the proposal on the winter solstice at hourly intervals between 9am and 3pm, therefore demonstrating the worst-case scenario. The shadow analysis also overlays the shadow cast by the approved Concept DA envelopes for comparison.

The shadow diagrams demonstrate that the proposal will be acceptable from an overshadowing perspective as:

- The shadow diagrams approved as part of the approved Concept DA were based on the maximum approved planning envelope. As detailed in **Section 4.3.1**, the detailed building designs the subject of this DA do not occupy the full extent of the approved Concept DA envelopes. As such, the proposed shadow impact is less than what was considered acceptable through the assessment and determination of the Concept DA.
- The site is not affected by the Liverpool City Centre Sun Access provisions set out in Clause 7.3 of the Liverpool LEP 2008. Further to this, the proposal will not result in any overshadowing to Bigge Park, Liverpool Pioneers' Memorial Park, Apex Park, St Luke's Church Grounds and Macquarie Street Mall (between Elizabeth Street and Memorial Avenue).
- The shadow cast by the proposed development during the winter solstice will reach south of Pirie Street but not impact upon residential blocks, allowing over 3 hours sunlight between 9am and 3pm.
- The maximum building height is placed at the southern end of the site to minimise overshadowing of proposed public space. Shadows are predominantly cast over Terminus Street and the commercial zone to the south.

Considering the site's CBD context and the absence of additional overshadowing to significant public places, the proposed concept is considered appropriate from an overshadowing perspective.

4.5.3 Privacy and views

Privacy

At Concept DA stage, careful consideration was given to create appropriate building separations between future buildings within the Liverpool Civic Place precinct surrounding existing (and potential future) buildings within the block. The focus was to avoid direct view lines into and between surrounding buildings. With regard to internal privacy, the central separation between the proposed mixed use civic building and the approved concept envelope to the immediate east effectively separates non-residential uses. By virtue of the proposed uses, the privacy impacts internal to the site are considered negligible.

Currently the nearest sensitive residential use is located at 300 Macquarie Street. As detailed in the Clause 4.6 variation request, the rear elevation of the building at 300 Macquarie Street presents a blank party wall. Apartments and tenancies within this building are oriented to the north west and the building contains no rooftop uses, as such the Concept Proposal will have no impact on the privacy to this building.

Consideration has been given to potential impacts resulting from the proposed library building and its proximity to the north-easternmost apartments of the building at 300 Macquarie Street at Concept DA stage, where it was noted that the detailed design would propose design features to the library façade to ameliorate this potential impact.

The proposal has considered the need to locate heavily used areas within the library away from the existing multi-use building adjacent. The façade treatment on the upper two levels also requires screening to prevent overlooking. As shown in **Figure 60** below, the proposed features to ameliorate this impact include:

- Solid facade to fire stair.
- Typical library facade (glazed facade with integrated shading and adjustable blinds)
- Privacy treatment to facade on level 2 and 3 in area denoted.
- To match surrounding facade but with fixed (closed) radial blinds.

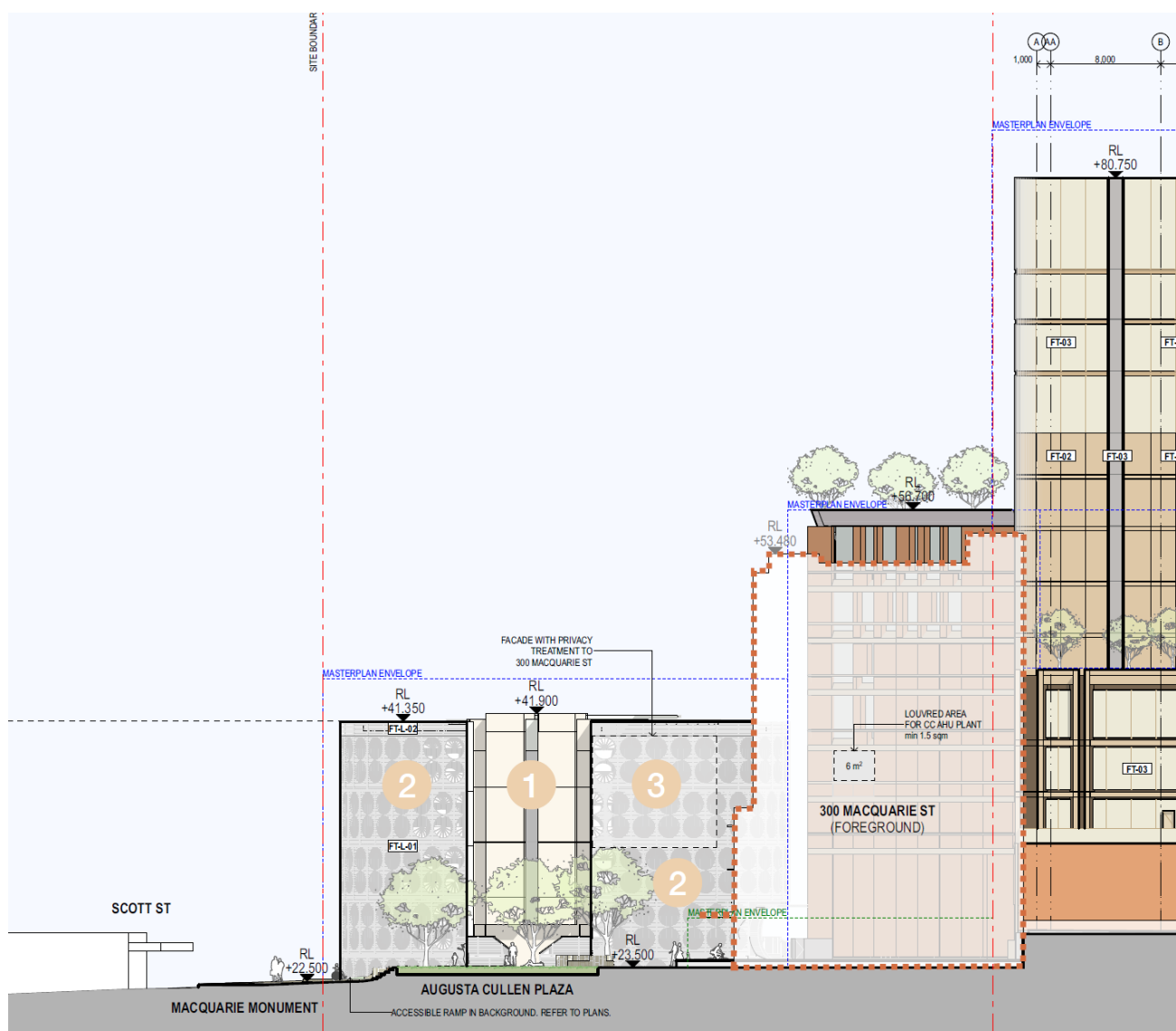


Figure 60 Western elevation of proposal

Source: FJMT

Views

No significant view corridors from surrounding buildings or public places have been identified that would be impacted by the proposal. The proposed development facilitates a high quality urban environment and does not unreasonably impede on views from the public domain to highly utilised parks or public parks in the vicinity of the site.

Whilst the site currently contains a low scale development, it is not reasonable nor the intent of the applicable planning controls for opportunity sites within this site to remain at this scale in order to allow views across the site. It is considered that the proposed development will generate an overall positive visual impact on the locality, providing a vibrant mixed-use precinct, of high urban design quality, thereby contributing to the Liverpool urban transformation. Furthermore, the proposal is a significant visual improvement on the current site situation which includes ageing buildings with minimal public domain.

4.6 Transport and accessibility

A Traffic Impact Assessment has been prepared by PTC and is provided in **Appendix P**. The assessment involves an assessment of the operational traffic generation including cumulative impacts. A summary of the assessment and proposed mitigation measures are provided below.

4.6.1 Existing traffic conditions

Key intersections within the surrounding road network comprise:

- Scott Street / George Street;
- Scott Street / Macquarie Street / Memorial Avenue;
- Macquarie Street / Pirie Street;
- Terminus Street / Pirie Street; and
- Terminus Street / Scott Street.

These intersections were selected based on their proximity to the site and as they form the intended route of vehicle travel to and from the site. The operational performance of the key surrounding intersections under the existing traffic flows, geometry and traffic signal phasing circumstances has been assessed using SIDRA modelling and **Table 10** Results summary of intersection performance (existing) below summarises the results of the modelling.

Table 10 Results summary of intersection performance (existing)

Intersection	Period (peak)	Level of Service	Degree of Saturation	Average Delay (sec)	95% Que Length (m)
Scott Street / George Street	AM	B - Acceptable delays & spare capacity	0.241	27.7	48.0
	PM		0.342	24.3	78.3
Macquarie Street/ Memorial Avenue/ Scott Street	AM	B - Acceptable delays & spare capacity	0.350	23.5	75.4
	PM		0.677	19.7	49.6
Macquarie Street / Pirie Street	AM	B - Acceptable delays & spare capacity	0.375	19.7	78.7
	PM		0.547	25.0	114.2
Terminus Street / Newbridge Road/ Speed Street	AM	B - Acceptable delays & spare capacity	0.827	18.5	298.8
	PM	D - Operating near capacity	0.934	45.4	460.0
Terminus Street / Pirie Street	AM	C - Satisfactory, but accident study required	0.870	29.9	171.4
	PM	B - Acceptable delays & spare capacity	0.451	25.2	91.7
Terminus Street/ Scott Street	AM	A - Good operation	0.106	2.7	2.8
	PM	A - Good operation	0.095	2.2	1.4

Source: PTC

The results of the SIDRA assessment indicate that these intersections generally operate to a satisfactory level of service at present, with lower levels of performance experienced at the Terminus Street / Newbridge Road / Speed Street intersection during the afternoon peaks.

4.6.2 Traffic generation and intersection performance

The proposed development's traffic generation has been assessed having regard to the RMS Guide to Traffic Generating Developments Updated Traffic Surveys (2013). In addition, PTC has drawn on the Warren Serviceway Car Park as a comparable car park for the purposes of forecasting the traffic generation associated with the proposal.

PTC has determined that this car park is currently operated by the Council and accommodates various users in dedicated areas with separate access control, including a nested area for Council staff, police station staff and employees of the adjacent businesses in the City Centre, and a casual parking area for public parking.

A similar range of user groups are expected to utilise the Liverpool Civic Place Car Park. As such, the Warren Serviceway Car Park is considered an appropriate site to determine the trip generation rates for its close proximity and similar function to the subject site.

The RMS Guide to Traffic Generating Development v2.2 (2002) and the subsequent technical direction TDT2013/04a (2013) sets out the vehicle trip generation rates for particular land uses. When the RMS undertook its Traffic Generation and Parking Generation Survey study in 2010 for updating the Guide to Traffic Generating Development v2.2 (2002), the suggested vehicle trip generation rates were derived from ten sites within both Sydney Urban area and regional areas, which largely have unconstrained parking provisions. Therefore, for the purpose of determining a more suitable trip generation rate, the data collected from the Warren Serviceway Car Park has been integrated into this analysis.

Based on PTC's calculations, the future generation of the proposed development in addition to the future Phase B and C development during the morning and evening peak periods is summarised in **Table 11** below.

Table 11 Traffic generation

Land use	Parking spaces	Trip Rate AM	Trip Rate PM	Trip Generation AM	Trip Generation PM	Access
Public administration	142	0.56	0.48	79	68	Scott St
Fleet parking	46	0.56	0.48	26	22	Terminus St
Public parking	156	0.61	0.33	95	51	Terminus St
Library	Included in public administration and public parking.					
DA sub total	344	-	-	200	141	-
Phase B and C*	128	0.56	0.48	72	61	Scott St
Total	472	-	-	272	203	-

*Not part of this DA
Source: PTC

The Phase A project involves a similar level of traffic compared with the concept approval, being an increase of 5 and 13 vehicles during the morning and evening peaks respectively, which is not considered to have any material impact on the road network given the daily variations that occur.

In terms of intersection performance, the SIDRA results indicate that the Scott Street and Terminus Street accesses will operate with acceptable delay and queuing in both AM and PM peaks. The George Street and Scott Street intersection will operate in similar level of delay and queuing as the existing conditions. It is noted that the average delay and queuing for the eastern leg of the Macquarie Street / Memorial Avenue / Scott Street intersection will increase during the post-development scenario. The average delay and queuing distance will be approximately 26 seconds and 65m respectively during the PM peak which may impact the proposed access driveway along Scott Street with remained acceptable Level of Service.

4.6.3 Access

The proposed five level shared basement car park comprises two vehicular entry and exit points, with the public car park entry and service vehicle entry being via the south of the Terminus Street frontage. This is proposed in order to maintain consistent traffic activity on Terminus Street, relative to the existing public car park, while limiting traffic on the Scott Street entrance, which is proposed as a shared zone. The public car parking area will include ten spaces for child care centre drop-off. Access to the public car park will be controlled by an access control system (boom gates or similar), linked to a payment system that will limit its use by Council employees as payment will be required on exit. The parking system will allow no more than 202 vehicles to access the public car park at once.

Access to the site via Scott Street will only accommodate private vehicles and includes one travel lane in each direction for vehicle arrival and departure. This will provide access to the council car park and the future Phase B/C's parking and servicing areas. Right turn movements to exit via the Scott Street access way will be prohibited due to the heavy vehicle traffic turning right from George Street during peak periods.

4.6.4 Parking

The Liverpool LEP 2008 provides parking provision controls for the Liverpool City Centre in Clause 7.3. Based on the floor space and uses proposed in the development, a minimum of 142 spaces are required. Moreover, the Liverpool DCP 2008 requires that no less than 2% of the car parking demand is to be allocated to disabled car parking spaces. The proposed development is compliant with these rates as it includes the provision of 190 car parking spaces for the private components of the development, including seven accessible car parking spaces.

Part 4 of Liverpool DCP 2008 establishes the minimum rate for motorcycle and bicycle parking. These require that one motorcycle space is provided per 20 cars and one bicycle space is provided per 200m². Accordingly, the proposal includes 18 motorcycle parking spaces and 138 bicycle parking spaces (108 EOT spaces and 30 visitor spaces), which complies with the relevant Liverpool DCP 2008 rates.

4.6.5 Loading and servicing

A loading dock with a capacity of one medium rigid vehicle, one Council waste truck and one courier/van space, is located on the upper ground level of the development, accessed via Terminus Street. Sufficient room is provided to allow service vehicles the manoeuvre their way into and out of the loading dock in a forward direction, as illustrated in the swept path diagrams included in the traffic report.

4.7 Heritage

A Heritage Impact Statement (HIS) has been prepared by NBRIS and is provided at **Appendix I**. The HIS includes a description of the history of the site, the established significance of the locality and important heritage items and an assessment of the potential heritage impact of the proposal on surrounding items of heritage significance. The site itself is not considered a heritage item, however multiple heritage items surround the site including:

- I189 – Plan of Town of Liverpool (Early Town Centre Street Layout – Hoddle 1827);
- I91 – Commercial Building (formerly Rural Bank and State Bank);
- I92 – Boer War Memorial, including memorial to Private A.E Smith;
- I93 – Macquarie Monument;
- I94 – Row of 3 palm trees;
- I99 – Memorial School of Arts
- I109 – Liverpool Fire Station.

The HIS concludes that the proposed architectural design and landscaping across the site will provide a positive heritage outcome by further enhancing the setting of the items, specifically the Memorial School of Arts and the Macquarie Monument. It should also be noted that the historic Hoddle street grid will be retained and possibly be viewed from the upper levels of the tower development. Overall, the report concludes that the proposed development will not adversely affect the identified heritage significance within the vicinity of the site.

4.8 Wind

A Wind Impact Assessment has been prepared by Windtech and is provided in **Appendix Q**. This assessment has studied the existing wind conditions in the locality and the potential effects of the proposed buildings through a wind tunnel study, which assessed wind speeds at selected critical outdoor trafficable areas within and around the subject development. The wind speeds measured during testing were combined with a statistical model of the regional wind climate to provide the equivalent full-scale wind speeds at the site. The measured wind speeds were compared against appropriate criteria for pedestrian comfort and safety. The following scenarios were investigated as part of this study:

- Existing Case: the existing development with the existing surrounding buildings.
- Proposed Case: the proposed development with the existing surrounding buildings.
- Future Case: the proposed development with the future surrounding buildings, including Phase B and C of the Liverpool Civic Place development (approved building envelopes).

The results of the wind analysis have confirmed that it is not expected that the wind conditions at the site will pose any safety risks to pedestrians in the area, and that wind conditions for the majority of trafficable outdoor locations within and around the development will be suitable for their intended uses. Some areas on terraces are recommended to include mitigation measures to improve conditions, as follows:

- Ground Level
 - Retention of the proposed densely foliating trees on both the eastern and western side of the site;
 - Inclusion of additional densely foliating trees along Terminus Street and the western side of the Library.
- Level 1
 - Retention of the 1.2-1.5m planting on the western terrace.
- Level 4
 - Inclusion of a mitigation strategy such as screening or vegetation at the south-western corner of the terrace, which can be further developed at a more detailed design stage; and
 - Retention of the proposed 1.5-2.5m high densely foliating evergreen trees and the undergrowth on level 4.
- Level 7
 - Inclusion of mitigation strategies such as screening or vegetation along the western and eastern perimeters of the terrace, which can be further developed at a more detailed design stage; and
 - Retention of the proposed densely foliating evergreen trees and undergrowth on the terrace.

4.9 Noise and vibration

A Noise Impact Assessment has been prepared for the proposed development by Wood and Grieve Engineers (**Appendix R**). The report has provided criteria, in-principle treatment and design requirements which aim to achieve statutory criteria. In terms of noise and vibration, the report provided criteria for the following acoustic considerations:

- Internal noise levels in accordance with AS/NZS 2107:2016 and the NSW Development near Rail Corridors and Busy Roads – Interim Guidelines;
- Noise emissions from the development to noise-sensitive receivers in accordance with the NSW NPI and the AAAC Guideline for Childcare Acoustic Assessment;
- Traffic noise generation for additional vehicle movements on public roads;
- Construction noise; and
- Construction vibration for human comfort and structural damage.

Having regard to the noise and vibration assessment, the report concluded that the development is compliant with the relevant noise and vibration controls for the proposed land use types, as it is expected to comply with all applicable regulations with regards to noise and vibration. Should the proposed development exceed the maximum levels presented in this report, additional noise mitigation measures will be required and will be implemented during the detailed design stage.

4.10 Aeronautical impact

An Aeronautical Impact Assessment prepared by Avlaw Consulting was submitted with the original Concept DA. This assessment examined the proposed development against necessary safety clearances mandated in legislation that must be provided between an aircraft and an obstacle such as a building or crane. The following key findings are derived from the assessment:

- the maximum height of the proposed development of RL 80.75 is below the Obstacle Limitation Surface (OLS), which is 124 – 129m AHD.

- the PAN OPS surface for Bankstown Airport is distanced 55.15m from the maximum building height of the proposed development; and
- with respect to helicopter operations, Avlaw has determined that the airspace protected under National Airport Safeguarding Framework – Guideline H for strategically important helicopter landing sites does not limit the height of the proposed development as approaches and departures are clear of the site.

The report concluded that the temporary construction cranes and the overall building height inclusive of plant room and ancillary features all remain below the PANS-OPS of 135.9m AHD and aviation approval should be granted. Accordingly, the operation of the crane, which is considered a 'controlled activity' has been granted approval through a Crane Operation Approval which accompanies the DA at **Appendix K**.

4.11 Ecologically sustainable design

The incorporation of Ecologically Sustainable Development (ESD) principles into the proposal has been ongoing during the preliminary design of the building and will continue through the detailed design. An Ecologically Sustainable Development Report has been prepared by Stantec and is provided at **Appendix O**. The report addresses the ESD principles and outlines the sustainable development initiatives that will be incorporated into the future development, including:

- Thermal performance designed to meet stringent NCC 2019 Section J requirements;
- Civic Building is designed to achieve:
 - 5 Star NABERS Energy Base Building
 - 3.5 Star NABERS Water Whole Building ratings
 - 5 Star Green Star Design & As Built v1.3 certification
- Integration of Green Star and NABERS principles to the design of the public library.

Specifically, these targets will be sought through the following key initiatives:

- Use of passive design elements, as far practically possible, to naturally provide comfort and minimise energy consumption.
- Creation of healthy environments including reduction in the use of harmful volatile organic compounds in glues, sealants and paints.
- Bespoke design solutions that provide for long term climate adaptation and resilience.
- Minimising consumption of natural resources, including water and raw materials.
- Minimising environmental impacts during construction, including embodied energy and the ecological cost of materials.
- Minimising environmental impacts during operation, including energy consumption and waste creation.
- Promotion of urban ecology through biophilic design elements, the use of green roofs and extensive landscaping.
- Provision of access to sustainable, integrated and convenient travel options.

4.12 Utilities

A Utility Services Report has been prepared by WSP and is provided at **Appendix S**. The site is well serviced by existing infrastructure, however WSP has confirmed the following infrastructure and service upgrades or connections are required to accommodate the density of the proposed development:

- Electrical Services: There are two existing HV feeders interconnected to the existing power infrastructure network. WSP has noted that it would be the intention to bring the HV feeder into the new 3MVA chamber substation from Terminus Street. The final arrangement is subject to the Endeavour Energy Design Information Pack (DIP) and network study/assessment.

- **Communications Services:** WSP has identified the availability of existing Communications Asset along Terminus Street. The existing services are considered adequate to service the proposed development and can be connected to by tenants as necessary.
- **Gas:** The gas infrastructure available in the Liverpool area and surrounding the site are considered low pressure (7kpa). Jemena do not ensure 7kpa will always be available and could range between 7kpa and 3kpa. WSP identify that the gas infrastructure may need to be amplified prior to delivery of the proposal.
- **Sydney Water:** In terms of potable water, WSP has identified that there is an existing SWC trunk watermain available to service the development. WSP has identified that there is a DN225 VC gravity sewer line located in Scott Street that appears to be a suitable connection point for the project. However, as per Sydney Water conditions of the Concept DA consent, flows from the development exceed the capacity of the existing wastewater main, therefore the current wastewater network is unable to service the proposed development. The second main is required to service the development and enable connections.

All services infrastructure connection requirements will be confirmed with the relevant authorities prior to construction certificate, with the exception of telecommunications services which tenants will confirm with their carrier of choice once the development is complete.

4.13 Stormwater management and flooding

A Stormwater and Civil Engineering Report has been prepared by WSP and is included at **Appendix G**, along with associated Civil Engineering Drawings at **Appendix T**. The report addresses the proposed stormwater drainage system, connection to existing stormwater infrastructure, stormwater quality treatment and flooding.

4.13.1 Stormwater

The stormwater and drainage measures for the site have been prepared in accordance with the Liverpool DCP 2008, Council's Development Design Specification, Section D5 Stormwater Drainage Design, dated January 2003 and Council's Development Design Specification, Section D2 Pavement Design, dated October 2003.

The proposed stormwater system involves two combination treatment tanks installed to service each building. The roof catchments of both buildings will be discharged into the proposed tanks. The proposed development has been designed to ensure that the post development stormwater runoff from the total development area does not exceed the pre-development run off.

4.13.2 Water quality

The development has undergone MUSIC modelling for the stormwater treatment devices and estimates their respective performance against the performance targets of the project. To maintain water quality during the construction of the project, erosion and sediment control measures will be installed. An Erosion and Sediment Control Plan is included at **Appendix T**.

4.13.3 Flooding

The report concludes that since the site is not in the flooding zone, there are no flood planning requirements for the proposed development.

4.14 Geotechnical

A Geotechnical Investigation has been carried out by Golder Associates and is included at **Appendix J**. The report presents the findings of the likely geotechnical, soil and groundwater characteristics of the site. This would determine if there are any potential ground related risks to support the design of the five level common basement and foundations for the development.

Golder Associates has identified that the base of the basement, which reaches a depth of RL 6.75, will be approximately 11.95m to 12.85m below the current static groundwater level. Consequently, groundwater will flow into the excavation from the bulk rock and more importantly from the fractured rock. As such, Golder has proposed

a number of detailed design parameters based on an understanding of a typical retention system and foundation. These parameters have been considered in the detailed design of the development.

4.15 Structural adequacy

A Structural Statement has been prepared by RBG, assessing the structural adequacy of the proposed buildings and impacts on nearby structures (refer to **Appendix Y**). Accordingly, RBG conclude that the proposed works are structurally feasible.

4.16 Social impact

Ethos Urban has prepared a Social Impact Assessment (SIA) (**Appendix V**) in accordance with Council's Social Impact Assessment Policy to assess social impacts associated with the proposed development, given that the proposal contains a public library. Overall, the SIA notes that the overall long-term benefit of the proposed development is considered to be positive, with negative impacts of the proposal ranging from low to moderate, with no identifiable significant negative impacts that cannot be mitigated.

Key challenges associated with the proposal include:

- Temporary amenity impacts emanating from the construction phase of the development, including noise and vibrations, traffic and parking, views and air quality – all of which will be managed through a Construction Management Plan.
- Permanent loss of existing businesses on site, which will need to find alternative locations.

The SIA affirms that the proposed development will culminate in a range of positive social impacts including the following:

- Improved access to library services in Liverpool CBD, through the delivery of a high quality 5,000m² public library with activated floor space, co-located with commercial and child care uses, as well as public space. In turn, the proposed development has potential to catalyse social interactions and improve community connections.
- Improved access to child care services in the vicinity of employment uses, public transport, library services and surrounding social infrastructure, in the form of a 90 place child care. The delivery of child care services in this CBD location can support participation of parents in the local workforce and support flexible working for parents, with the flow on effect of supporting effective function of the Liverpool CBD.
- Improvements to the way of live and daily routines for residents, students, workers and visitors to Liverpool CBD, associated with the delivery of a high quality contemporary library and child care service. This will make such social infrastructure and services readily accessible to the Liverpool community.
- Potential improvements to social cohesion stemming from the delivery of increased spaces for people to meet and gather within the Liverpool CBD. The site is located in close proximity to Liverpool Station, surrounding commercial offices, retail businesses, Liverpool Hospital and the University of Wollongong campus. As such, workers, students and visitors from these facilities may be attracted to the proposed development as a space for gathering, socialising and connecting with each other.
- Increased activation of the site through Phase A of Liverpool Civic Place which will make an outstanding contribution to the urban real of the Liverpool CBD and thereby resulting in positive impacts to the sense of place.

In the balance of the resultant impacts, the proposed development will result in an strong positive benefit to the site, its immediate surrounds and the overall Liverpool CBD.

4.17 Waste management

4.17.1 Operational waste management

An Operational Waste Management Plan (OWMP) has been prepared by Elephants Foot Recycling Solutions (EFRS) and is provided in **Appendix X**. This OWMP has been prepared to comply with the Liverpool Development Control Plan 2008 and the relevant Australian Standards.

This OWMP identifies that the estimated volume of waste fill will comprise 18502L/week of generated waste and 35262L/week of recycling. In order to appropriately group and accommodate these waste volumes, EFRS recommend the provision of 6x 1100L general waste bins, 8x 1100L recycled cardboard and paper bins, and 4x 1100L commingled recyclable bins. Further, bin collection is recommended 3 times a week and will be conducted by a private contractor.

Otherwise, the report provides that general waste across the site will be managed by strata management and building contractors, as well as individual retail and commercial tenants who are responsible for managing back of house storage and correctly separating waste and recycling.

4.18 Building Code of Australia

The following reports confirm that the proposed development is capable of achieving compliance with the requirements of the Building Code of Australia (BCA) and other relevant codes and standards:

- BCA Report prepared by McKenzie Group (see **Appendix E**);
- Access Report prepared by Morris Goding Accessibility Consulting (see **Appendix W**); and
- Fire Engineering Statement prepared by Stantec (see **Appendix U**).

Detailed construction drawings are to be provided at Construction Certificate Application phase demonstrating compliance.

4.19 Site suitability

Having regard to the characteristics of the site and its location, the proposed development is considered suitable for the site as it:

- will contribute to the urban renewal of a key site within Liverpool's City Centre;
- will contribute to the ongoing development of a diverse mixed use precinct;
- provides high quality public open space to foster a good lifestyle for new workers within the precinct;
- is capable of being developed in a manner that will minimise impacts to the natural, historical and environmental qualities of the setting; and
- will not result in any adverse environmental impacts and any impact can be appropriately managed and mitigated.

The site is considered suitable for the proposed development in that:

- the site is currently underutilised and is in need of urban renewal and improved connections and integration with the surrounding locality; and
- it is well serviced by frequent existing public transport.

4.20 Public interest

In addition to delivering a world class mixed use development, the project is also a major urban renewal undertaking that will deliver significant public benefit as it will:

- contribute to the ongoing redevelopment of the Liverpool City Centre to strengthen it so that it becomes a key component of the Western Metropolitan Cluster;
- enhance connectivity around and through the precinct and optimise the quality of the public domain;
- provide a development outcome that does not detract from and respects the surrounding heritage elements including the historic early town centre street layout and the adjacent Memorial School of Arts building;
- demonstrate excellence in design and environmental sustainability;
- facilitate high levels of public transport usage for workers and visitors of the precinct;
- maximise the direct and indirect economic benefits to NSW from the project;
- deliver a rejuvenated site within the Liverpool CBD that preserves and embraces the adjoining rich heritage;
- create a more vibrant and activated precinct that provides a range of day to day services and offerings for employees, visitors and the local community; and
- create new jobs during the construction and operation phases of the development.

5.0 Conclusion

The proposed development is consistent with the Concept Proposal approval under DA-585/2019 and otherwise aligns with the relevant environmental planning instruments, and does not give rise to any adverse environmental impacts in respect to overshadowing, privacy, traffic, heritage, contamination, stormwater, waste, noise, ESD, construction impacts, access and fire safety impacts. Where variations from the building separation development standards provided by the Liverpool LEP 2008 are requested, these variations are well supported by Clause 4.6 requests with appropriate and logical planning arguments that will contribute to the betterment of this mixed-use development.

The proposed development that is the subject of this development application has planning merit in the following respects:

- it is permissible with consent, aligns with the approved Concept Proposal for the site and meets the objectives of the statutory planning controls for the site;
- it will not result in unreasonable or unmanageable environmental impacts;
- it will revitalise a significantly underutilised site within the Liverpool LGA;
- it contains large employment generating uses in proximity to existing transport infrastructure, consistent with transit-oriented development principles;
- it generates a significant public benefit through the provision of a large public plaza with a strong visual connection to the site's adjacent heritage context, while also providing vital connections north-south through the site in a key location within the Liverpool City Centre;
- it generates market appropriate floor plates to encourage tenants to locate within the Liverpool City Centre;
- design excellence has been achieved through a high quality architectural design accompanied by a well-considered selection of materials and a highly resolved built form which responds to the opportunities and constraints of the site;
- it will contribute to the on-going redevelopment of the Liverpool City Centre to protect and develop it as a key component of the Western Metropolitan Cluster;
- it provides high-quality spaces and public services including the landscaped public plaza, as well as the child care centre, public administration and commercial office space available to tenants; and
- the proposed development is suitable for the site and is in the public interest.

In light of the merits of the proposed development and in the absence of any significant environmental impacts, it is without hesitation that we respectfully recommend this application for development consent.