



Planning &
Environment

**STATE SIGNIFICANT DEVELOPMENT
ASSESSMENT REPORT:**

***Chau Chak Wing Museum,
The University of Sydney***

SSD 7894



Environmental Assessment Report
Section 89H of the *Environmental Planning and
Assessment Act 1979*

February 2018

ABBREVIATIONS

Applicant	The University of Sydney, or anyone else entitled to act on this consent
AS	Australian Standard
CBD	Central Business District
CIV	Capital Investment Value
Consent	Development Consent
Council	City of Sydney
DA	Development Application
DCP	Development Control Plan
Department	Department of Planning and Environment
EIS	Environmental Impact Statement
EPA	Environment Protection Authority
EP&A Act	<i>Environmental Planning and Assessment Act 1979</i>
EP&A Regulation	<i>Environmental Planning and Assessment Regulation 2000</i>
EPI	Environmental Planning Instrument
ESD	Ecologically Sustainable Development
GANSW	Government Architect New South Wales
GFA	Gross floor area
HI	Health Infrastructure
ICNG	Interim Construction Noise Guideline
INP	Industrial Noise Policy
LEP	Sydney Local Environmental Plan 2012
LGA	Local Government Area
LOS	Level of Service
Minister	Minister for Planning
NCC	National Construction Code
OEH	Office of Environment and Heritage
RMS	Roads and Maritime Services
RtS	Response to Submissions
SEARs	Secretary's Environmental Assessment Requirements
Secretary	Secretary of the Department of Planning and Environment
SEPP	State Environmental Planning Policy
SRD SEPP	State Environmental Planning Policy (State and Regional Development) 2011
SSD	State Significant Development
STP	Sustainable Travel Plan
TfNSW	Transport for New South Wales

Cover Photograph: Illustrative perspective of the museum entrance (Source: EIS)

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EXECUTIVE SUMMARY

This report provides an assessment of a State significant development (SSD) application for a new museum at The University of Sydney's Camperdown Campus (SSD 7894). The Applicant is the University of Sydney (the Applicant) and the proposal is located within the Sydney local government area.

The proposal seeks approval for the construction of a new six level building (two storeys below ground) with 7,740 sqm of gross floor area comprising gallery space, education areas, research areas, collection storage space, workshop areas, offices, study rooms, a 130-seat auditorium, café, museum shop, terrace areas, loading dock and landscaping works.

The proposal has a capital investment value of approximately \$53.3 million and would generate 238 construction jobs. The museum will be run and maintained by existing university staff.

The development is SSD under clause 13(1)(d) and clause 15 of Schedule 1 of *State Environmental Planning Policy (State and Regional Development) 2011* as the proposed development is for the purposes of a cultural facility and educational establishment with a CIV in excess of \$30 million. Therefore, the Minister for Planning is the consent authority.

The proposal was publicly exhibited for 45 days from 7 June 2017 until 21 July 2017. The Department of Planning and Environment (the Department) received a total of six submissions from public authorities and six submissions from the public. No submission was received from the City of Sydney Council. The key issues raised in the submissions included design and heritage impacts.

The Applicant provided a Response to Submissions (RtS) on 18 December 2017. The Applicant's RtS contained additional information (including additional and revised technical reports) and responses to the matters relating to design, heritage, traffic and parking, loading dock management, contamination and noise impacts.

The Applicant provided additional information to supplement the RtS on 22 January 2018. The information included revised architectural plans with amendments to the landscaped area around the loading dock, and minor façade modifications.

The Department has considered the merits of the proposal in accordance with relevant matters under section 79C, the objects of the *Environmental Planning and Assessment Act 1979*, the principles of ecologically sustainable development, State Priorities, *A Plan for Growing Sydney*, the draft *Eastern City District Plan* and issues raised in all submissions as well as the Applicant's response to these issues.

The Department has assessed the merits of the proposal and identified the key issues associated with the project to be built form and heritage impacts. The Department's assessment concludes that the built form of the proposed development is acceptable and would not result in any significant adverse environment or amenity impacts and would be generally consistent with the scale and form of the existing development. Further, the development would preserve the heritage significance of adjoining buildings and the University of Sydney Conservation Area.

The Department considers that the proposal would provide significant public benefits through the provision of a cultural, educational and research facility in an accessible location. The proposal would also provide economic benefits, generating approximately 238 construction jobs. The Department concludes that the site is suitable for the development and the proposal is in the public interest, and therefore recommends that the application be approved subject to conditions.

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1. BACKGROUND

1.1 Introduction

This report provides an assessment of a State significant development (SSD) application for the Chau Chak Wing Museum at the University of Sydney's Camperdown Campus (SSD 7894) (refer to **Figure 1** – University campus outlined in red). The Applicant is The University of Sydney and the proposal is located within the Sydney local government area.

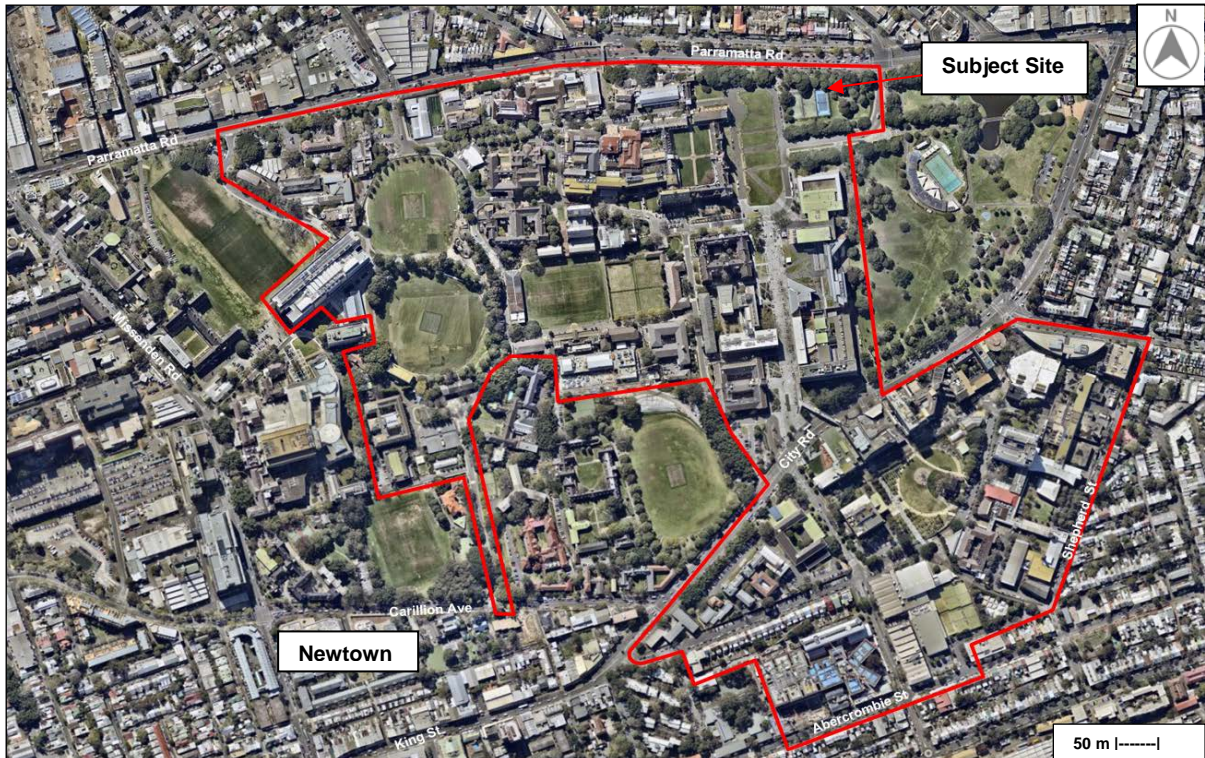


Figure 1: Site location (Source: nearmaps)

The proposal seeks approval for the construction of a six storey museum (two storeys below ground) on land formally occupied by disused tennis courts, in front of the historically significant Main Quadrangle and Great Hall (the 'Quadrangle'). The museum will be known as the Chau Chak Wing Museum and is intended to co-locate and consolidate the University's existing Macleay Museum, Nicholson Museum, University Art Gallery, and collections from other fragmented locations across the University within the one building.

1.2 The site and surroundings

The site is formally described as part Lot 1 DP 1171804 and is located adjacent to University Avenue (accessed via Parramatta Road), Camperdown in the City of Sydney local government area. The site is located approximately 2 km south west of the Sydney central business district.

The University campus in Camperdown and Darlington covers an area of approximately 49 ha and is divided by City Road. The University has been developed progressively since its inception in the early 1850's. The wider campus now contains over 230 buildings of varying architectural styles that house the University's 16 educational faculties.

The development site is located within the eastern portion of the University's Camperdown campus and was most recently occupied by the Fisher Tennis Courts and clubhouse building.

The site is physically bound by: Parramatta Road (north); University Avenue (east and south); and University Place (west). Existing features in proximity to the site include:

- Victoria Park and Victoria Park Pool (east)
- the University's Fisher Library (south)
- the University's Main Quadrangle and Great Hall (the 'Quadrangle') (west).

Figures 2 and 3 show the location of surrounding features in proximity to the site.



Figure 2: Surrounding setting (Source: EIS)

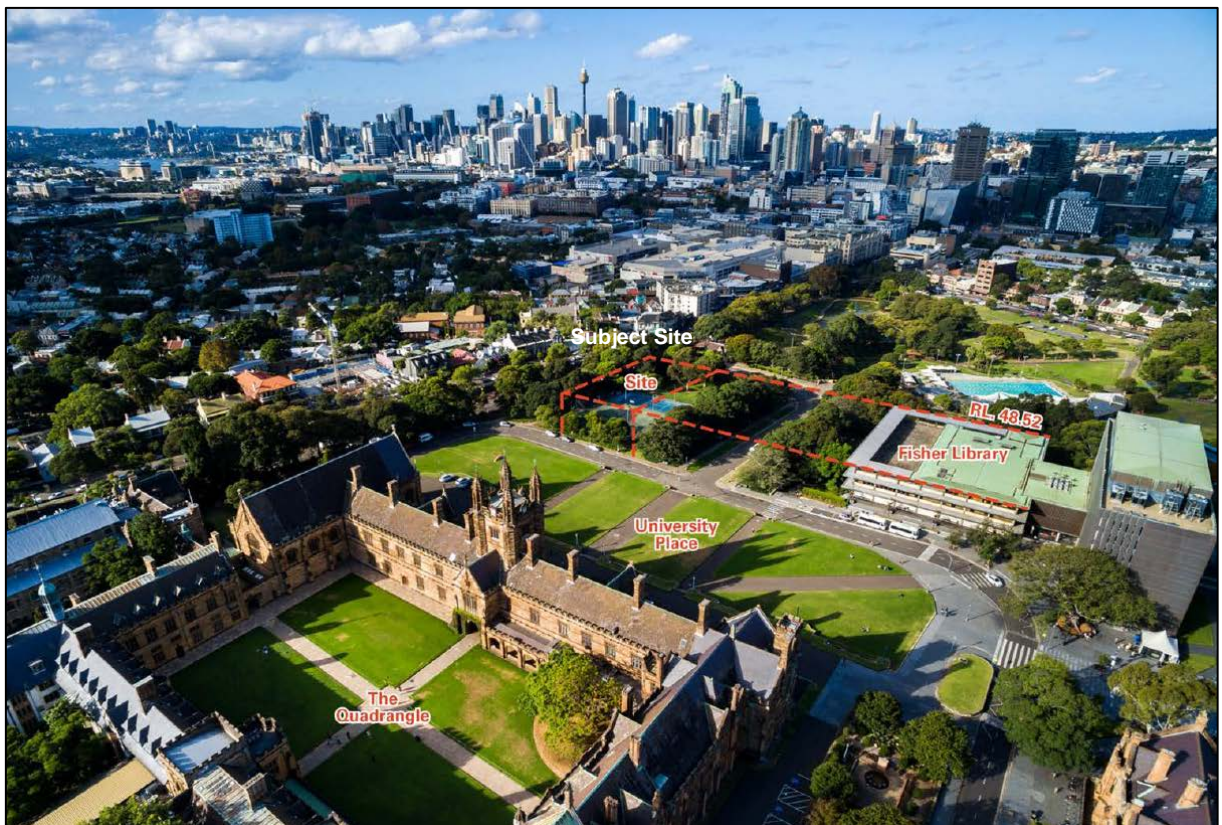


Figure 3: Aerial context looking north east (Source: EIS)

1.3 Previous approvals and other relevant applications

Campus Improvement Program Concept Proposal (SSD 6123)

On 16 February 2015, the then Minister for Planning approved a SSD application (SSD 6123) for the University's Campus Improvement Program (CIP) concept proposal. The CIP concept proposal approved new educational establishment building envelopes of varying height and scale within six identified precincts (see **Figure 4**). Any new built form within these precincts requires detailed development applications to be lodged with and assessed by the relevant consent authority. The approved CIP concept proposal allows for a maximum additional gross floor area (GFA) of 264,650 sqm and an increase of approximately 10,000 new students and 400 new staff.

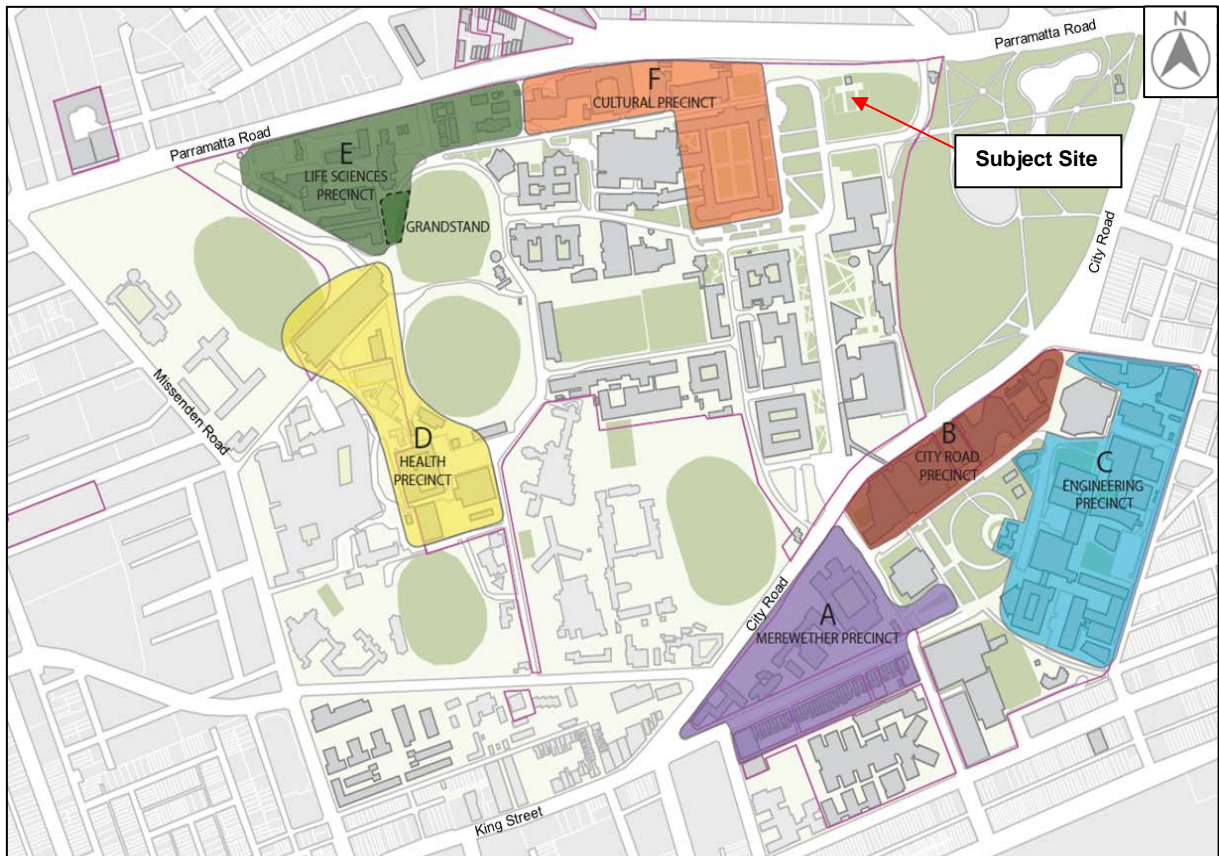


Figure 4: CIP precincts (Source: SSD 6123)

The subject proposal is a standalone proposal that sits outside the CIP precincts. This is facilitated by the CIP development consent, with condition A4 of the consent specifically stating:

“A4. This approval does not preclude additional development outside identified Campus Improvement Program precincts, subject to future approval (where relevant) and the demonstration of satisfactory environmental impacts.”

2. DESCRIPTION OF PROPOSAL

2.1 Description of proposal

Approval is sought for the construction of a four storey building (including plant level) and two levels of basement for use as the Chau Chak Wing Museum at the University of Sydney.

The museum is proposed to include:

- foyer/lobby accessed from university place (western end of site)
- gallery spaces
- museum shop
- collections education research and conservation facility
- collection storage and workshop spaces
- study rooms
- school education space
- an auditorium accommodating 130 seats
- café
- staff offices and associated facilities
- loading dock with access from University Avenue at the eastern end of the site
- plant areas.

Associated works include demolition, tree removal, landscaping, public domain works, signage and infrastructure upgrades.

The key components and features of the proposal are provided in **Table 1** and are shown in **Figures 5** and **6**.

Table 1: Key components of the SSD application

Aspect	Description
Summary	Construction and operation of the Chau Chak Wing Museum
Built form	Four-storey building (including plant level) and two basement levels with a maximum height of 18.3 m.
Gross floor area (GFA)	Total GFA of 7,740 sqm
Uses	Museum use with gallery spaces; museum shop and cafe; education, research and conservation facilities; study rooms; auditorium; staff offices and facilities.
Access	<ul style="list-style-type: none"> • Pedestrian access from University Place on the western side of the development site. • Vehicle drop off along University Place. • Loading dock access off University Avenue.
Car parking	No car parking is proposed
Bicycle Paring	<ul style="list-style-type: none"> • Eight bicycle parking spaces for visitors at the front entrance. • Four bicycle parking spaces within the loading dock for staff.
Public domain and landscaping	<ul style="list-style-type: none"> • Removal of 18 trees • Transplanting of 1 tree • Retention of 54 trees • Planting of 4 trees

Aspect	Description
Hours of operation	<p>Museum opening hours to general public:</p> <ul style="list-style-type: none"> • Saturday to Tuesday – 10 am to 9 pm • Wednesday to Friday – 10 am to 11 pm (outdoor areas to close at 10 pm) <p>Teaching Use:</p> <ul style="list-style-type: none"> • Monday to Sunday – 8 am to 9 pm <p>Office Hours (for staff):</p> <ul style="list-style-type: none"> • Monday to Friday – 7 am to 7 pm <p>Café:</p> <ul style="list-style-type: none"> • Saturday to Tuesday- 8 am to 9 pm • Wednesday to Friday – 8 am to 11 pm
Construction hours	<ul style="list-style-type: none"> • Monday to Friday: 7 am to 6 pm • Saturday: 7.30 am to 3.30 pm • No work on Sunday or public holidays
CIV	\$53,326,524.00
Jobs	238 construction jobs

The Applicant’s EIS indicates occasional functions such as art openings, book launches and corporate events are likely to be held at the museum. The functions will be limited to a maximum of 150 patrons across the building with a maximum of 75 patrons permitted in the outdoor area. The outdoor spaces will be closed at 10 pm and functions will conclude by 11 pm.

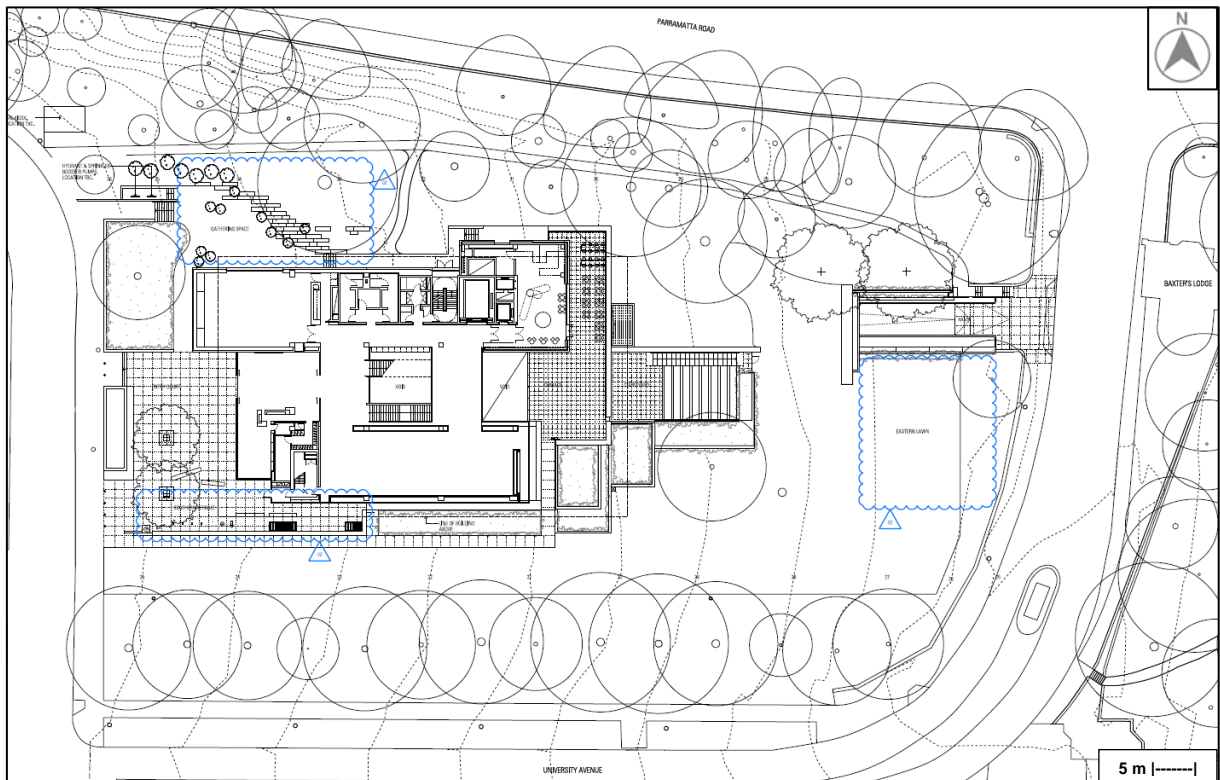


Figure 5: Site layout (Source: RtS Architectural Plans)



Figure 6: Entry Perspective (Source: EIS Perspectives)

2.2 Project Need and Justification

The purpose of the proposed development is to consolidate the Macleay Museum, Nicholson Museum and University Art Gallery which are currently spread across the Camperdown Campus. The Chau Chak Museum aims to provide a world class cultural destination with enhanced visitor facilities and fit for purpose exhibition spaces. The development would also provide improved education and research facilities for the university and visitors.

2.3 Strategic Context

NSW State and Premier's Priorities

In 2015, the NSW Premier announced 30 State Priorities, including 12 Premier's Priorities to foster the development, growth and enrichment of NSW.

The proposed development for the Chau Chak Wing Museum, which also includes education and research facilities, is consistent with the NSW State Priorities: to improve education results through the provision of new and improved teaching and education facilities, ensuring NSW residents have the best educational infrastructure; and improve services to increase cultural participation. Additionally, the proposed development would create 238 jobs during the construction phase.

A Plan for Growing Sydney

A Plan for Growing Sydney (the Plan) is the NSW Government's plan for the future of the Sydney Metropolitan Area over the next 20 years. The Plan provides key directions and actions to guide Sydney's productivity, environmental management and liveability – including the delivery of housing, employment, infrastructure and open space.

The proposed development is considered to be consistent with the Plan, in particular Direction 1.10 – *Plan for education and health services to meet Sydney's growing needs* and Direction 3.4 – *Promote Sydney's heritage, arts and culture*.

Draft Eastern City District Plan

The role of the Greater Sydney Commission (GSC) is to coordinate and align planning to shape the future of Metropolitan Sydney. The GSC has prepared draft District Plans to inform local council planning and influence the decisions of State agencies. The aims of the District Plans are to connect local planning with the longer-term metropolitan planning for Greater Sydney and to inform well-coordinated, integrated and effective planning decisions for future land uses, transport and infrastructure requirements.

The proposed development site is located in the Eastern City District and is consistent with the key priorities of the draft *Eastern City District Plan*, particularly in relation to:

- the continuing growth of the Camperdown-Ultimo health and education precinct
- fostering healthy, creative and culturally rich communities
- providing job opportunities during the construction phase.

NSW Long Term Transport Master Plan 2012

The *NSW Long Term Transport Master Plan 2012* outlines a planned and coordinated set of actions to address challenges faced by the NSW transport system to support the State's economic and social performance over the next 20 years.

The proposed development is considered consistent with the broader goals of the Plan as:

- the site is located within walking distance of a number of public transport services
- it provides for active transport travel options through the provision of bicycle parking spaces for visitors
- it does not include the provision of any on-site car parking spaces which will encourage the use of public transport.

3. STATUTORY CONTEXT

3.1. State Significant Development

The proposal is SSD under Section 89C of the EP&A Act as the development has a CIV in excess of \$30 million and is for the purpose of a cultural facility as defined under clause 13, Schedule 1 of State Environmental Planning Policy (State and Regional Development) 2011 (SRD SEPP) which is ancillary to an educational establishment, as defined under clause 15, Schedule 1. The Minister for Planning is therefore the consent authority for the proposal.

3.2. Consent Authority

In accordance with the Minister's delegation to determine SSD applications, signed on 11 October 2017, the Executive Director, Priority Projects Assessments may determine this application as:

- the City of Sydney Council has not made an objection
- there are less than 25 public submissions in the nature of objections
- a political disclosure statement has not been made.

3.3. Permissibility

The site is zoned SP2 Infrastructure (Educational Establishment) under the Sydney Local Environmental Plan 2012 (SLEP). The objectives of the zone are to provide for infrastructure and related uses. Educational establishments are permitted with consent.

3.4. Environmental Planning Instruments

Under Section 79C of the EP&A Act, the Secretary's assessment report is required to include a copy of, or reference to, the provisions of any Environmental Planning Instruments (EPIs) that substantially govern the project and that have been taken into account in the assessment of the project. The following EPIs apply to the site:

- State Environmental Planning Policy (State and Regional Development) 2011
- State Environmental Planning Policy (Infrastructure) 2007
- State Environmental Planning Policy No 55 – Remediation of Land
- State Environmental Planning Policy No 64 – Advertising and Signage
- Sydney Local Environmental Plan 2012.

The Department's consideration of these EPIs is discussed at **Appendix B**. In summary, The Department is satisfied the application is consistent with the requirements of the EPIs.

3.5. Objects of the EP&A Act

Decisions made under the EP&A Act must have regard to the objects as set out in section 5 of that Act. A response to the Objects of the EP&A Act is provided at **Table 2**.

Table 2: Objects of the EP&A Act relevant to the proposed development

Objects of section 5 of the EP&A Act	Response
(a) <i>to encourage:</i>	
(i) <i>the proper management, development and conservation of natural and artificial resources, including agricultural land, natural areas, forests, minerals, water, cities, towns and villages for the purpose of promoting the social and economic welfare of the community and a better environment,</i>	The proposal to develop land within the existing university campus, will maximise efficiency by consolidating the existing museum facilities from across the site into a central location. The consolidation will provide a cultural centre for the university and provide significant economic and social benefits.
(ii) <i>the promotion and co-ordination of the orderly and economic use and development of land,</i>	As discussed in Section 3.3 , the development would meet the objectives of the zone and provide improved education and cultural infrastructure. The development would also serve the community economically through the generation of construction jobs and infrastructure investment.
(iii) <i>the protection, provision and co-ordination of communication and utility services,</i>	The proposal would connect to and augment (as required) available communication and utility services in consultation with service providers.
(iv) <i>the provision of land for public purposes,</i>	The proposal would deliver cultural and educational facilities accessible to the public.
(v) <i>the provision and co-ordination of community services and facilities, and</i>	The proposal would deliver cultural and education facilities.
(vi) <i>the protection of the environment, including the protection and conservation of native animals and plants, including threatened species, populations and ecological communities, and their habitats, and</i>	The development would not result in the loss of any threatened or vulnerable species, populations, communities or significant habitats.
(vii) <i>ecologically sustainable development, and</i>	Section 3.6 of this report considers the proposed development against the principles of ESD.
(viii) <i>the provision and maintenance of affordable housing, and</i>	The proposal does not involve the provision / maintenance of affordable housing.
(b) <i>to promote the sharing of the responsibility for environmental planning between the different levels of government in the State, and</i>	The proposed development is SSD in accordance with the SRD SEPP. The Department has consulted with Council and other relevant Government agencies on the

Objects of section 5 of the EP&A Act	Response
	proposed development, including consultation on recommended conditions of consent.
(c) <i>to provide increased opportunity for public involvement and participation in environmental planning and assessment.</i>	Section 4.1 sets out details of the Department's public exhibition of the proposed development.

3.6. Ecologically Sustainable Development (ESD)

The EP&A Act adopts the definition of ESD found in the *Protection of the Environment Administration Act 1991*. Section 6(2) of that Act states that ESD requires the effective integration of economic and environmental considerations in decision-making processes and that ESD can be achieved through the implementation of:

- the precautionary principle
- inter-generational equity
- conservation of biological diversity and ecological integrity
- improved valuation, pricing and incentive mechanisms.

The development has been designed in accordance with the University of Sydney Sustainability Framework as described in the Applicant's EIS and Appendix 16.

ESD initiatives and sustainability measures are proposed to be incorporated into the design including:

- passive design principles and a high performance building envelope
- installation of energy and water efficient fixtures and fittings
- solar photovoltaic system to be located on the roof
- water recycling and reuse
- water sensitive urban design
- ongoing metering and monitoring of air quality and resource use

The development would not result in the loss of any threatened or vulnerable species, populations, communities or significant habitats, however, the redevelopment would result in the loss of 18 trees. New landscaping is proposed to offset this loss, and the existing significant fig trees are proposed for retention and protection.

The Department has considered the project in relation to the ESD principles. The Precautionary and Inter-generational Equity Principles have been applied in the decision making process by a thorough assessment of the environmental impacts of the project. Overall, the proposal is consistent with ESD principles and the Department is satisfied the proposed sustainability initiatives would encourage ESD, in accordance with the objects of the EP&A Act.

3.7. Secretary's Environmental Assessment Requirements

On 6 September 2016, the Department notified the Applicant of the Secretary's Environmental Assessment Requirements (SEARs) for the SSD application. The Department is satisfied that the EIS adequately addresses compliance with the SEARs to enable the assessment and determination of the application.

4. CONSULTATION AND SUBMISSIONS

4.1 Exhibition

In accordance with section 89F of the EP&A Act and clause 83 of the *Environmental Planning and Assessment Regulation 2000* (EP&A Regulation), the Department publicly exhibited the application from 7 June 2017 until 21 July 2017 (45 days). The application was exhibited: on the Department's website; at the Department's Sydney Information Centre; and at the City of Sydney's Customer Service Centre.

The Department placed a public exhibition notice in the *Sydney Morning Herald and Daily Telegraph* on 7 June 2017 and the *Inner West Courier* on 6 June 2017. Adjoining landholders and relevant State and local government authorities were notified in writing.

The Department received a total of six submissions from public authorities and six submissions from the public. No submission was received from the City of Sydney Council. A summary of the issues raised in the submissions is provided in **Table 3** below and copies of the submissions may be viewed at **Appendix A**.

The Department has considered the comments raised in the public authority submissions during the assessment of the application (**Section 5**) and/or by way of recommended conditions in the recommended instrument of consent at **Appendix C**.

4.1.1 Public Authority Submissions

Table 3: Summary of public authority submissions to the EIS exhibition

Heritage Council of NSW (Heritage Council)
<p>The Heritage Council provided the following comments:</p> <p><i>'...the impact of the loading dock, located at the main entry to the University is unacceptable. It is not designed as a counterpoint for the gate house (Baxter's Lodge). The design does not sit comfortably within the site. The design of the loading dock is not well resolved and the utilitarian design has an unacceptable impact on the heritage values of the site.</i></p> <p><i>It is requested that the Applicant be required to consult with the Heritage Council and amend the proposal accordingly to resolve these issues prior to any further approval being granted.'</i></p>
Environment Protection Authority (EPA)
<p>The EPA provided the following comments:</p> <ul style="list-style-type: none"> • the Detailed Site Investigation is to be revised to verify the area of the development site, and include additional sampling data which meets the relevant quality objectives • prior to excavation work, an assessment be undertaken to assign an appropriate waste classification to the material including test pit samples to identify asbestos • the Applicant is to develop an unexpected finds protocol including a plan of action should site contamination, including building asbestos containing materials, be discovered on site • the Applicant must satisfy the requirements of the Protection of the Environment Operations (Waste) Regulations 2014 and be required to consult with SafeWork NSW • the Applicant must ensure all excavated material is assessed, classified and managed in accordance with the <i>Waste Classification Guidelines Part 1: Classifying Waste</i> (Departments of Environment Climate Change and Water, December 2009) • demolition, site preparation, bulk earthworks, and construction works should be undertaken during standard construction hours in accordance with the Interim Construction Noise Guideline and be required to schedule intra-day respite periods for particularly annoying noise generating construction activities • the Applicant is to confirm if impact piling is proposed, and if so, provide a revised noise impact assessment • the Applicant be required to undertake a safety risk assessment to determine whether it is practicable to use audible movement alarms of a type that would minimise noise impact without compromising safety.

The EPA also recommended a number of standard conditions of consent, regarding erosion and sediment control, waste control and management, and noise management and compliance monitoring.
Office of Environment and Heritage (OEH)
OEH agreed with the findings of the submitted Biodiversity Assessment Report and Arboricultural Impact Assessment.
OEH acknowledged that the Grey Headed Flying Fox (<i>Pteropus poliocephalus</i>) is present on site, however as most of the feed trees including the figs will be retained, this species is unlikely to be significantly impacted.
To ensure the trees for retention are protected, OEH recommends a condition of consent requiring implementation of tree protection measures as provided in the Arboricultural Impact Assessment.
OEH also noted that potential roosting habitat for the Eastern Freetail-bat (<i>Mormopterus norfolkensis</i>) is present on the site however no evidence of roosting bats was found. OEH recommends that tree hollows be checked by a qualified ecologist or wildlife carer prior to removal, and that any bats found be relocated.
It is noted that OEH also advised that assessment of Aboriginal cultural heritage could not be made, and that the absence of comment is not to be taken as support or otherwise.
Transport for NSW (TfNSW)
TfNSW provided the following comments: <ul style="list-style-type: none"> • a loading dock management plan should be prepared to ensure that the operation of the loading dock would not cause queuing of vehicles on Parramatta Road, and would not impact on bus services • bicycle parking should be installed in accordance with Australian Standards • a Construction Pedestrian and Traffic Management Plan (CPTMP) be prepared in consultation with TfNSW and RMS.
Roads and Maritime Services (RMS)
RMS reviewed the application and raised no objections.
Sydney Water
Sydney Water recommended standard conditions of consent regarding utilities arrangements.

4.1.2 Public Submissions

The Department received six submissions from members of the public all in objection to the proposed development. The main issues raised in submissions were:

- impact of the building on the existing heritage buildings, particularly the Quadrangle and the significant landscape character
- visual impacts on the Quadrangle's axis which is of significant cultural importance
- the built form and scale of the proposed development
- infrastructure and traffic impacts
- impacts on the Macleay Building that will no longer house the Macleay Natural History Collection which will therefore impact on its heritage significance
- loss of public land.

4.2 Response to Submissions and Supplementary Information

Following the exhibition of the application the Department placed copies of all submissions received on its website and requested the Applicant provide a response to the issues raised in these submissions.

On 18 December 2017, the Applicant provided a Response to Submissions (RtS) (**Appendix A**). The RtS details and assesses the amendments to the design of the facility proposed following the consideration of the submissions received.

The RtS contained additional information (including additional and revised technical reports) and responses to the matters relating to design, heritage, traffic and parking, loading dock management, contamination and noise impacts.

The RtS also included further correspondence from the Heritage Council advising that the proposed museum is now supported.

The Applicant's RtS indicated design amendments were made, however amended architectural plans were not provided.

The RtS was made publicly available on the Department's website. No further correspondence was received.

The Applicant provided additional information to supplement the RtS on 22 January 2018. The supplementary RtS included consideration of the proposed signage against State Environmental Planning Policy No.64 – Advertising and Signage, clarification of pedestrian access and bicycle parking requirements, further responses to concerns raised in relation to building design and amended architectural drawings.

The amended drawings include minor design changes including the following:

- provision of a 'gathering space' on the northern side of the building
- provision of an outdoor terrace on the southern side of the entry court
- extension of terracing from the eastern courtyard accessed from lower level 1
- deletion of terracing on the southern side of the loading dock replaced with a graded lawn area
- deletion of windows from the northern, southern and eastern elevations
- amendments to the internal layout of lower level 2
- small reduction to the overall building parapet height from RL 48.50 to RL 48.35.

5. ASSESSMENT

5.1. Section 79C(1) matters for consideration

Table 4 identifies the matters for consideration under section 79C that apply to SSD, in accordance with section 89H of the EP&A Act. The EIS has been prepared by the Applicant to consider these matters and also those required to be considered in the SEARs, section 78(8A) of the EP&A Act and Schedule 2 of the EP&A Regulation.

Table 4: Section 79C(1) Matters for Consideration

Section 79C(1) Evaluation	Consideration
(a)(i) any environmental planning instrument	Satisfactorily complies. The Department's consideration of the relevant EPIs is provided in Appendix B of this report.
(a)(ii) any proposed instrument	Not applicable.
(a)(iii) any DCP	Under clause 11 of the SRD SEPP, DCPs do not apply to SSD.
(a)(iiia) any planning agreement	Not applicable
(a)(iv) the regulations <i>Refer Division 8 of the EP&A Regulation</i>	The application satisfactorily meets the relevant requirements of the EP&A Regulation, including the procedures relating to applications (Part 6 of the EP&A Regulation), public participation procedures for SSD and Schedule 2 of the EP&A Regulation relating to EIS.
(a)(v) any coastal zone management plan	Not applicable.
(b) the likely impacts of that development	Appropriately mitigated or conditioned - refer to Section 5 of this report.

Section 79C(1) Evaluation	Consideration
(c) the suitability of the site for the development	The site is suitable for the development as discussed in Sections 3 and 5 of this report.
(d) any submissions	Consideration has been given to the submissions received during the exhibition period. See Sections 4 and 5 of this report.
(e) the public interest	Refer to Section 5 of this report.
Biodiversity values impact assessment not required if: (a) On biodiversity certified land (b) Biobanking Statement exists	Not applicable.

5.2. Key assessment issues

The Department has considered the EIS, the issues raised in submissions and the Applicant's RtS in its assessment of the proposal. The Department considers the key issues associated with the proposal are:

- built form and urban design
- heritage impacts.

These key issues is discussed in the following sections of this report. Other issues were taken into consideration during the assessment of the application and are discussed at **Section 5.2.3**.

5.2.1. Built form and urban design

The proposed development comprises a four storey building (including roof top plant level) and two basement levels with 7,740 sqm of GFA. The Chau Chak Wing Museum has been designed to accommodate the collections of the Macleay Museum, Nicholson Museum and University Art Gallery, which are currently located across the campus, along with research, conservation and education facilities, within one building.

The 'front' or western elevation of the building presents as three storeys (including plant) when viewed from University Place with a maximum height of 14.35 m. Due to the fall of the land, the eastern elevation presents as four storeys, with a maximum height of 18.35 m (refer to **Figures 7 and 8**).

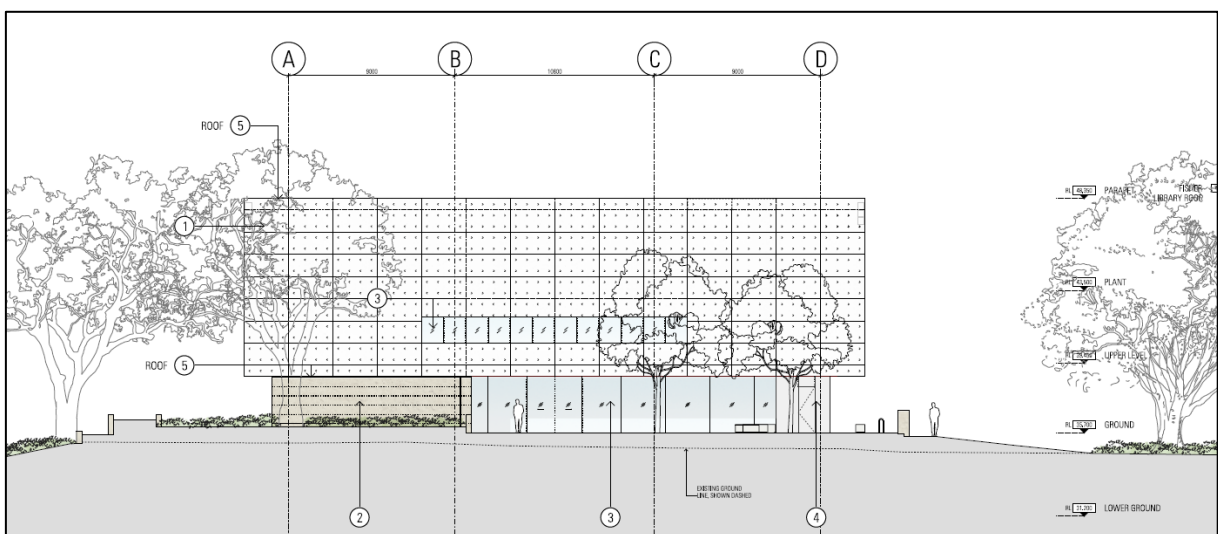


Figure 7: West elevation (Source: Supplementary RtS)

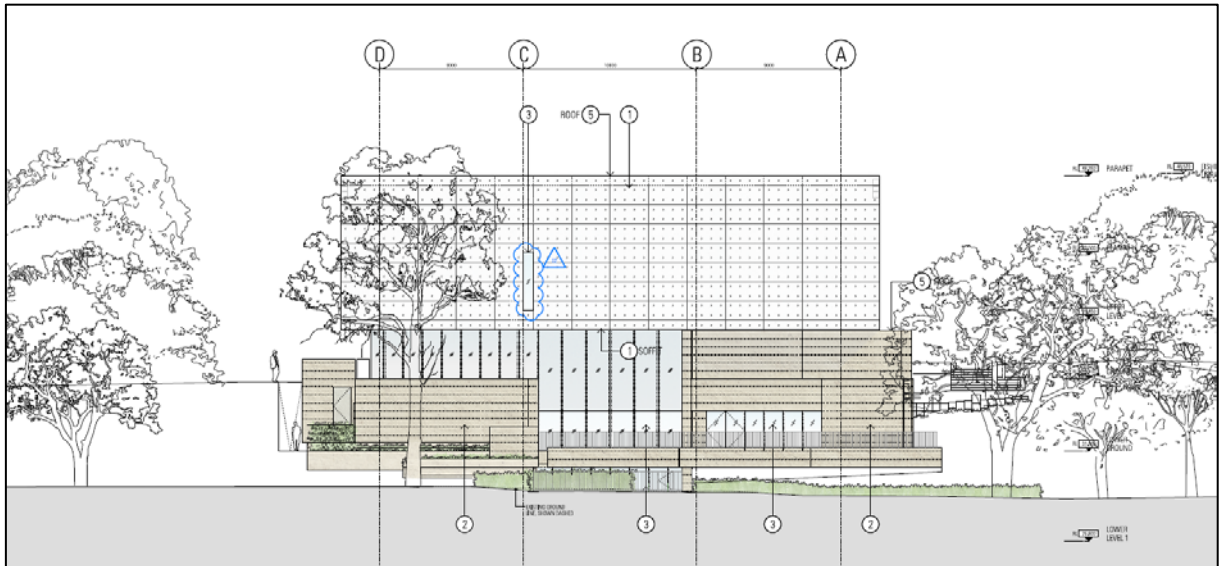


Figure 8: East elevation (Source: Supplementary RtS)

The site is not subject to a height control under SLEP 2012. Instead the height of the building and its footprint was informed by the avenues of fig trees that run along the northern and southern edges of the site. At its highest point, the development remains below the tree line, allowing the fig avenues to remain defined and reinforcing the central axis from the Quadrangle to Victoria Park that runs along the southern edge of the site.

In determining the appropriateness of the bulk and scale of the development, the relationship of the development to the Fisher Library and the heritage listed Quadrangle is also of relevance, particularly as, together, the three buildings will frame University Place (refer to Figure 9).

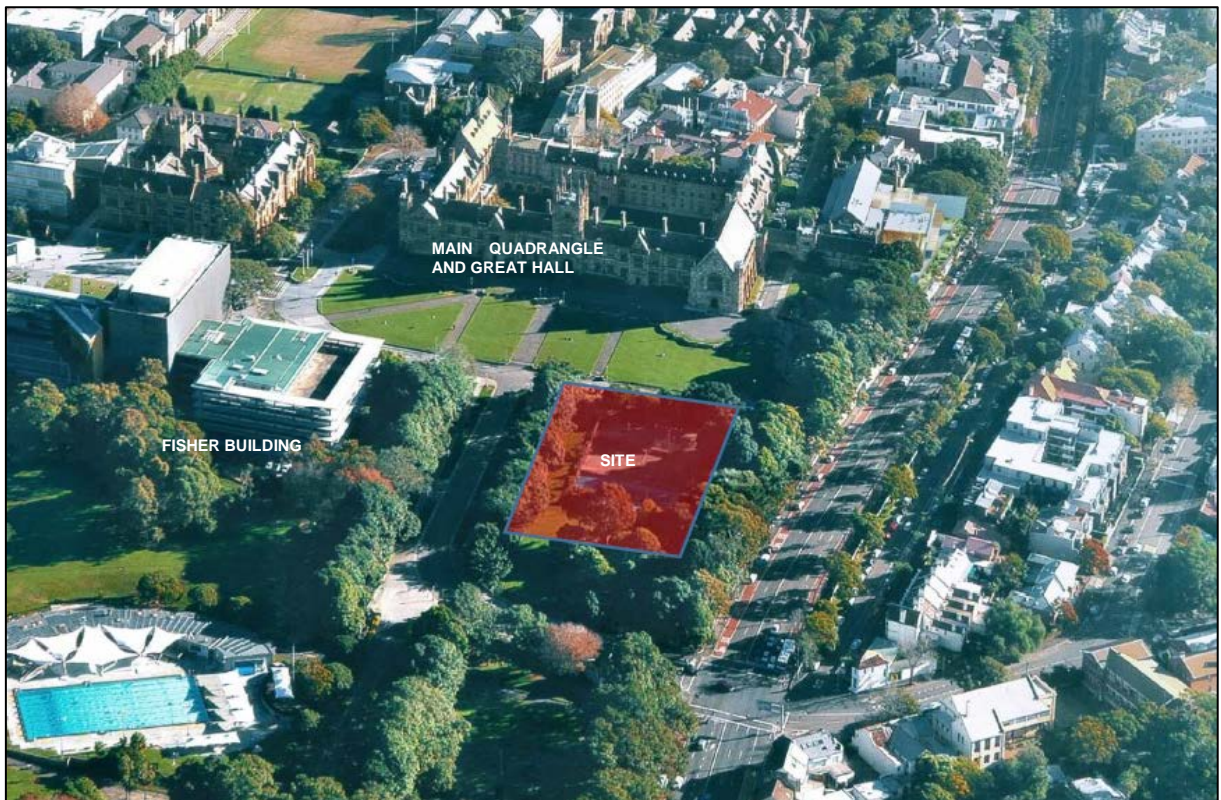


Figure 9: West facing aerial view of the site (Source: EIS)

The Department notes that the proposed museum has been designed to reference the height of the Fisher Library to the south, which has a roof level of RL 48.52, 0.17 m higher than the proposed development. The Quadrangle to the west is topographically elevated from the site of both the Chau Chak Wing Museum and the Fisher Library, and is also a taller structure with roof levels ranging from RL 52.379 to RL 64.742. As a consequence, the height of the proposed building allows the Quadrangle to remain visually dominant and maintains the established hierarchy of buildings within this space.

The site topography slopes steeply from west to east, falling approximately 10 m from University Place to University Avenue. The proposed building maximises use of this slope, stepping the building down the site to provide various outdoor spaces including terraces and courtyards to activate the eastern elevation of the museum and provide a connection with Victoria Park. The Government Architect NSW (GANSW) has reviewed the proposal and provided the following analysis:

“The proposed building successfully negotiates the sloping topography of the site providing many delightful spaces in the transition from the west to the east, with forecourt, amphitheatre and terrace spaces providing a successful public domain.”

The Department, in consultation with the GANSW, requested that the Applicant consider including additional spaces to provide a more interactive public domain along the northern and southern elevations of the building. The Applicant amended the plans to include a ‘gathering space’ along the northern elevation and made some minor changes to landscaping along the southern edge of the forecourt area and also the eastern lawn to encourage public use. The Applicant advised that openings within the southern elevation were not possible due to strict climate control requirements to protect the museum collections. The GANSW and the Department acknowledges the amendments, and although of the opinion that the project would be improved by a better public domain approach, particularly along the southern elevation, the response of the development to the public domain is supported overall.

The proposed loading dock has also maximised the use of the topography. The loading dock has been designed to have a concealed, recessed entrance from the eastern end of University Avenue, which will then be covered in sloping lawns to minimise its visual impact when viewed from the Parramatta Road entrance. Initially concerns were raised by the Heritage Council in relation to the location and design of the loading dock, however these concerns have since been withdrawn following minor amendments to the landscaped area surrounding the loading dock entrance. The Department is satisfied that the integrated design of the loading dock into the slope successfully manages visual conflict with the heritage listed Baxter’s Lodge, which also located at the Parramatta Road entrance.

The development adopts a simple built form comprising a light grey concrete cube over lower levels of a smaller footprint finished in sandstone toned concrete cladding. In relation to the design and materials proposed, the GANSW provided the following comments:

“...as a significant and complementary building an appropriate ‘robust’ form is presented due in part to the ‘clean’ form of the upper floors. The detail that is attributed to the irregularity and ‘maker’s marks’ of off form concrete will not be visible from the viewpoint of the Great Hall and Quadrangle entrance. The siting, form and scale of the building all make reference to the fact that it forms part of a set of buildings that frame University Place, the white concrete of the Chau Chak Wing Museum Proposal is intentionally distinctive and thus less complementary in this setting. The architects are requested to further consider a response to the neighbouring buildings and landscape.”

The Department is satisfied that the contemporary ‘cube’ like structure is appropriate in its context. Although the bulk and massing of the building is significant in scale, the simplicity of

the proposed building provides a juxtaposition to the architectural detail of the Quadrangle allowing its dominance and visual importance to be retained. The clean lines and minimalist design of the proposed museum is also complimentary to the Fisher Library to the south, and when viewed from the Quadrangle, would not appear obtrusive.

In response to the concerns raised by the GANSW in relation to the proposed materials, the Applicant has advised that the colours and materials have been “*selected to complement the setting and establish relationships between neighbouring buildings*”. The Applicant has advised that the light grey off form concrete has been chosen as it is neutral, and would remain recessive in the landscape. Further, the light grey references the Fisher Library to the south. The sandstone toned concrete cladding to be used on the ground floor levels has been chosen to relate to the sandstone of the Quadrangle and the bronze cladding present on the Fisher Library.

The Department in consultation with the GANSW has considered the justification provided by the Applicant, and whilst it is considered that improved material choices would result in a better outcome, on balance, the proposed design is acceptable.

The Department considers that the proposed building is comparable with the built form on the campus and the height and massing is appropriate within the context of the site. Accordingly, the Department concludes that the proposed built form and design of the proposal is acceptable for the site.

5.2.2. Heritage impacts

The University of Sydney Camperdown campus is identified as a heritage conservation area under SLEP and contains 28 individually listed heritage items. Items nearest the site include: Victoria Park (including Gardener’s Lodge and its interior, entry gates and piers, park layout, paths and plantings – Item I39); Main Building and Quadrangle Group (Item I84); Baxters Lodge (including interior and gates – Item I86); Science Road Bridge (including roll of honour and interior – Item I85); Botany Building (including interior – Item I80); Site Landscaping, perimeter fencing and gates (Item I72); and the Macleay Museum Building (including interior – Item I79). As identified in the submitted Statement of Heritage Impact (SoHI), a number of additional items are identified on the University’s Section 170 Heritage and Conservation Register including the Fisher Library to the south.

Built Heritage

As outlined in the SoHI, the items most likely to be affected by the proposed development are as follows:

- Main Building and Quadrangle Group (including the Great Hall)
- Fisher Library
- Baxter’s Lodge
- Perimeter fencing along Parramatta Road
- Victoria Park.

The University’s Ground Conservation Management Plan (GCMP) is currently under consideration by the Heritage Council as part of recommendation for listing of the University of Sydney on the State Heritage Register. The GCMP ranks the heritage significance of each building across the site (refer to **Figure 10**).

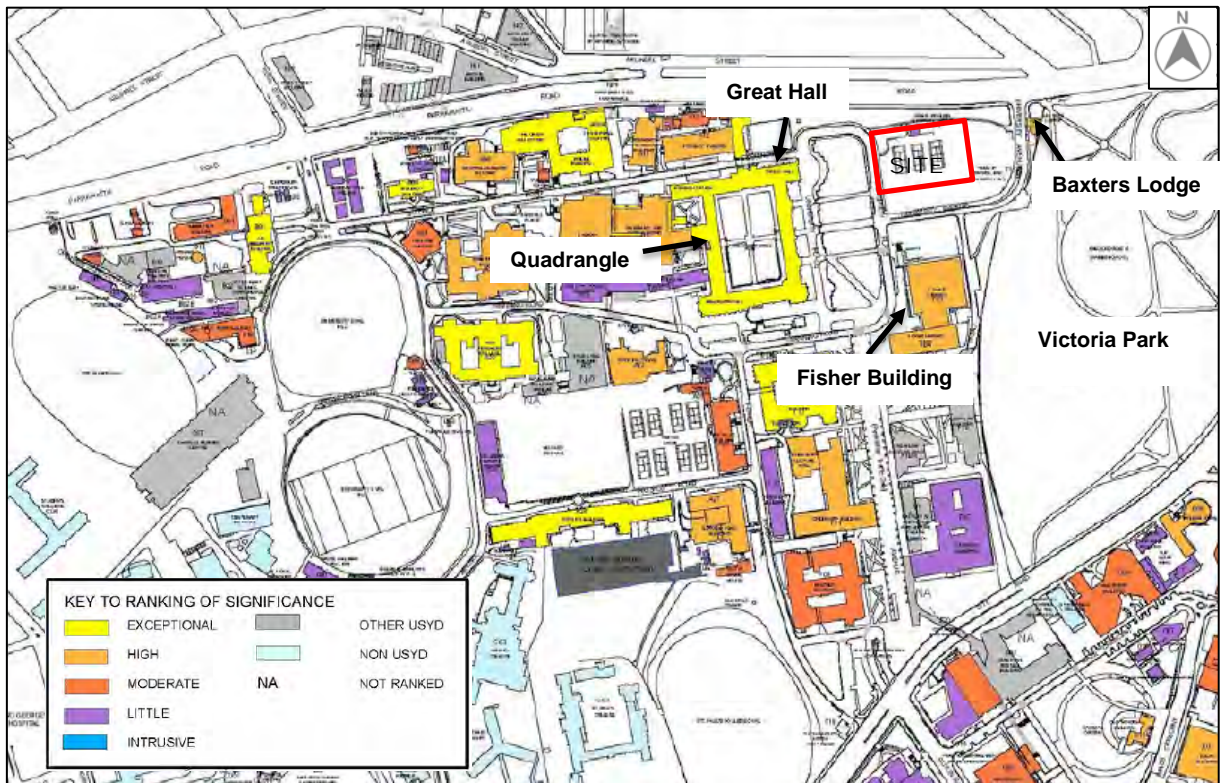


Figure 10: Significance ranking of buildings (Source: GCMP)

Of the affected buildings/areas, the GCMP ranks the Main Building and Quadrangle Group (including the Great Hall) as exceptionally significant, with all remaining potentially affected items being of high significance. It is noted that the now demolished tennis courts and clubhouse were of little significance.

The SoHI provides an assessment of the impacts of the development on the heritage significance of these items and in each case found the impacts to be acceptable. A summary of this assessment is provided in **Table 5**:

Table 5: Assessment of heritage impacts in SoHI

Item	Significance	SoHI Justification
Main Building and Quadrangle Group (including the Great Hall)	Exceptional	<ul style="list-style-type: none"> 70 m separation provided by University Place. Setting of building amongst significant trees. Utilisation of slope. Details, materials and finishes create an understated contrast to the detailed Quadrangle complex.
Fisher Library	High	<ul style="list-style-type: none"> Height and massing of development mirrors Fisher Library. Spatial distance provided by University Avenue and stands of trees provides physical and visual separation.
Baxter's Lodge	High	<ul style="list-style-type: none"> Separation provided by landscaping and University Avenue between the proposed building and Baxter's Lodge and gates. Simplicity of building design and choice of material contrasts with detail of Baxter's Lodge. Loading dock is integrated into the slope and landscaped foreground.
Perimeter fencing along Parramatta Road	High	<ul style="list-style-type: none"> No impact as it is unaffected by the development.

Victoria Park.	High	<ul style="list-style-type: none"> • Primary view to the university is along the line of the original Main Drive (now University Avenue), which is to be retained. • Physical and visual separation provided by University Avenue and landscaping.
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Following exhibition of the EIS, public submissions were received raising concerns regarding heritage impacts. In particular, concerns were raised in relation to the built form of the proposed development and its relationship with the Main Building and Quadrangle.

The public submissions also raised concerns that the proposal would detract from the heritage significance of the Macleay Museum as the Macleay museum collections would be relocated to the Chau Chak Wing Museum. The Applicant has not provided any information in relation to the future use of the Macleay Museum, however the GCMP identifies the Macleay Museum Collections to be moveable fabric. The Department does not believe the relocation of these collections would be of significant detrimental heritage impact, and that the appropriateness of the future use of the building is not subject of this application.

The Heritage Council has also reviewed the application on a number of occasions prior to, and throughout the application process. Initially, a number of concerns were raised by the Heritage Council including issues relating to the dominance of the building in the setting, visual connection to the city skyline and from Baxter's Lodge and the Great Hall, appropriateness of the development on the site, and impact of the loading dock on Baxter's Lodge.

At the November 2017 meeting, the Heritage Council visited the site and viewed a presentation from the Applicant. It is noted that minor changes to the area surrounding the loading dock to improve its integration into the landscape and reduce its impact on Baxter's Lodge were made prior to this meeting. At the December 2017 meeting, the Heritage Council resolved to support the proposed Chau Chak Wing Museum.

As discussed earlier in this report, the Department considers the built form of the development to be appropriate in this heritage context as it is complementary to the Fisher Library building in terms of height, bulk and scale, and the minimalist cube design allows the Quadrangle to remain visually prominent. The siting of the proposed museum provides sufficient separation from the individual items to respect their immediate curtilage and minimise any detrimental heritage impacts.

Landscape Heritage

The GCMP also grades significance of landscape character. As can be seen in **Figure 11** below, in terms of landscape character, the site of the Chau Chak Wing museum is identified as exceptional.

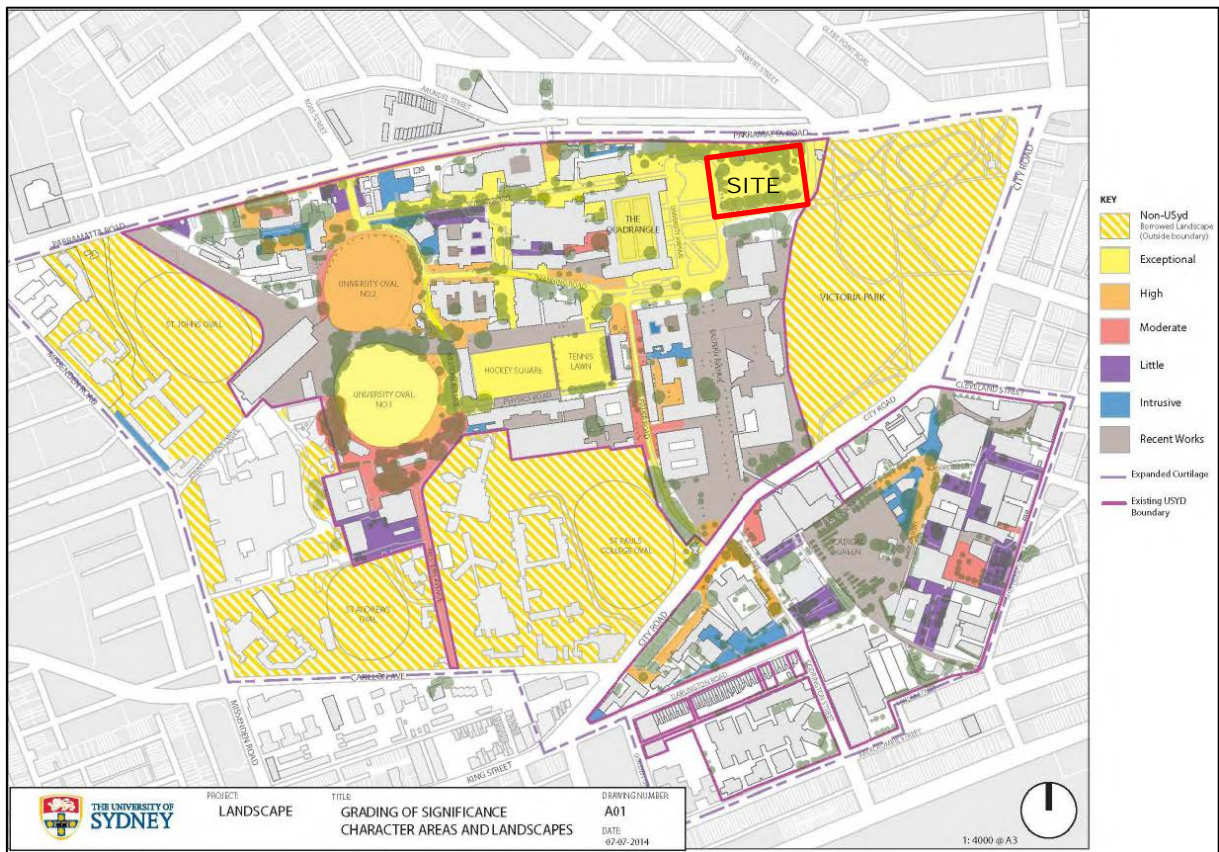


Figure 11: Landscape significance (Source: GCMP)

Following a review of the proposal prior to lodgement, the Heritage Council requested the preparation of a landscape assessment to review the significance of the site. Consequently, a Landscape Assessment prepared by Craig Burton, dated October 2016 downgraded the significance from exceptional to moderate stating:

“The tennis courts and clubhouse building are of some significance but not exceptional as suggested in the University of Sydney Grounds Conservation Management Plan grading of significance as a Landscape Character Area... makes no reference to the tennis facility as a built element in the centre of the former open space.”

Although the heritage significance of the site as a landscape character area was downgraded by the Landscape Assessment report, both the GCMP and the Landscape Assessment identify the two stands of figs that define the Parramatta Road and University Avenue boundaries of the site to be of exceptional significance. These same trees are identified in the City of Sydney’s Significant Trees Register.

Whilst the removal of 18 trees is proposed, 54 trees in the area of the development will be retained. The trees identified for retention primarily form the clusters that line the northern and southern boundaries of the site that are of high significance.

The SoHI concludes that the development will require the loss of some landscaped area of moderate heritage significance, however the siting of the development preserves the majority of trees that define the landscape, particularly those along Parramatta Road and University Avenue, which are of the highest significance.

The public submissions objected to the loss of trees and landscaped open space which are considered to be of cultural significance and raised concerns that the trees along the southern

edge adjoining University Avenue will be overshadowed by the museum, and therefore will not survive.

As mentioned earlier the Heritage Council is now in support of the development and no longer raise concerns in relation to landscape character.

The Department notes the reduction in significant landscaped open space, however 54 trees are to be retained including the rows of figs along Parramatta Road and University Avenue. The Applicant's 'Arboricultural Impact Assessment' has considered the impacts of the proposal on the tree protection zone (TPZ) of the trees within the development site. The assessment indicates that the proposed building will not affect the TPZ of the southern row of trees along University Avenue. Further, the Department is satisfied that the separation between the building and this stand of trees and also the building height, would not result in an overshadowing impact that would compromise their health. The trees are considered to define the boundaries of the development and also preserve the established landscape character across this part of the site. The museum has been designed to interact with the remaining landscaped open space with the main forecourt opening towards University Place and the associated lawns to the west; and to the east, terraces and courtyard areas overlook the sloping lawns towards Victoria Park providing a strong visual connection. In this regard, the Department is satisfied the development would not have a detrimental effect on the heritage significance of the University of Sydney landscape.

Significant View Lines

The GCMP also identifies significant planning and visual axes as shown in **Figure 12** below.

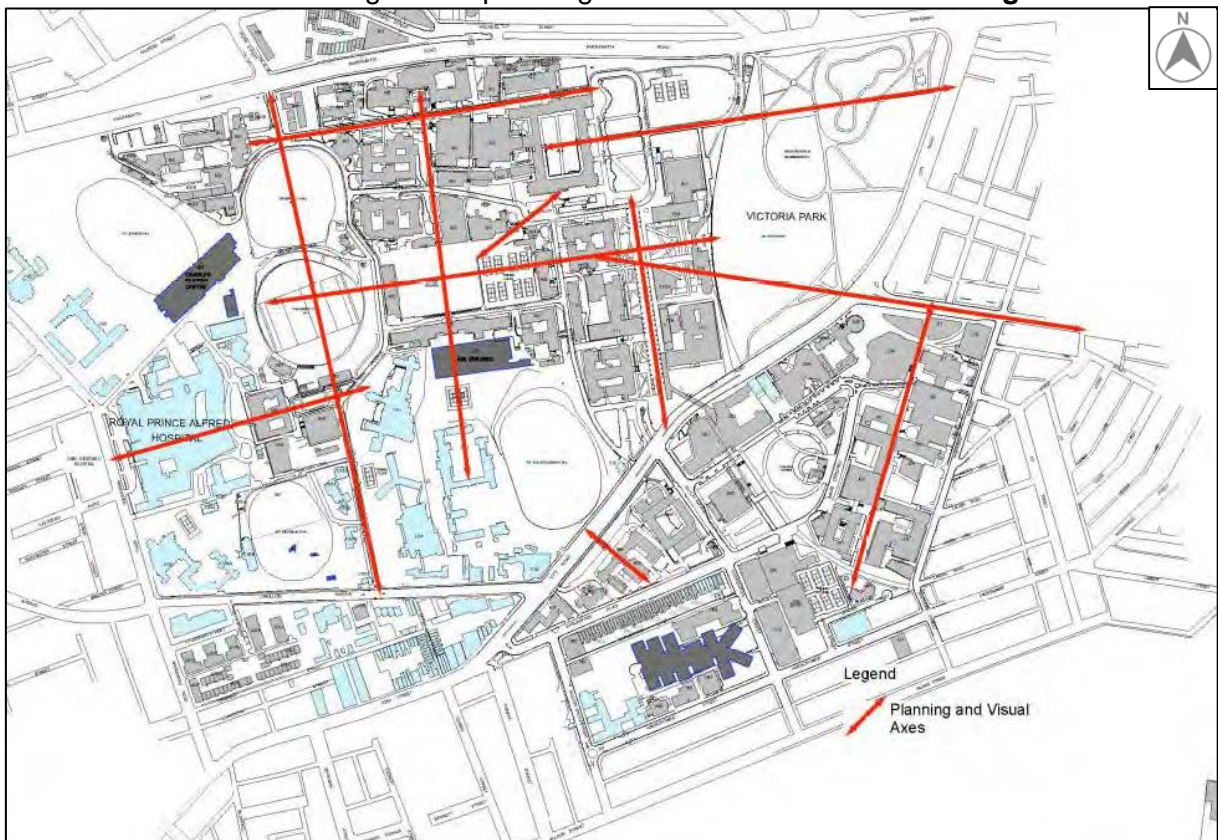


Figure 12: Planning and visual axes (Source: GCMP)

The GCMP identifies the visual axes from the Main Building and Quadrangle, to the east along University Avenue and across Victoria Park to be of significance. In accordance with Policy 18 of the GCMP, this view should be retained and if possible enhanced.

The public submissions raised significant concern with the obstruction of city views from the Main Building and Quadrangle and university lawns.

In relation to heritage, the GANSW made the following comments:

“Primary concerns are the effect a new building may have on views to and views from the Quadrangle buildings, Great Hall and the Fisher Library.

Views from the Main entry to the Quadrangle and from the Great Hall entry towards the city are severely impacted however the retention of the primary view corridor down University Avenue is commended. Figure 19 in the EIS Executive Summary (p.52) shows the city skyline almost completely obscured. The effect of this is exaggerated by the clean form of the proposed building, thus focusing attention and view.

The building will further enclose and provide a stronger definition for University Place and thus is supported.”

Further, it is noted that the presentation prepared by the Applicant for the Heritage Council included an extensive analysis on views to and from the site, and that the Heritage Council are now in support of the proposal.

The Department acknowledges that the proposal will result in a loss of CBD views from parts of University Place and the Quadrangle. However, it is considered the alignment of the proposed museum with the Fisher Library building and the maintenance of the significant stand of trees along University Avenue, will result in a symmetry that will frame and strengthen the identified important view axes between the Quadrangle, Victoria Park and the southern end of the CBD. In this regard, the partial loss of CBD views from specific angles is, on balance, acceptable.

Conclusion

In light of the comments received from the Heritage Council in support of the development, and as detailed in the above assessment, the Department is satisfied that the development would preserve the heritage significance of the individually significant buildings and places across the campus and the overall character of the University of Sydney (Camperdown) conservation area as a whole.

5.2.3. Other issues

The Department’s consideration of other issues is provided in **Table 6**.

Table 6: Department’s assessment of other issues

Issue	Consideration	Recommendation
Noise Impacts	<ul style="list-style-type: none"> The EIS included a construction and operational noise assessment prepared by Arup. The nearest sensitive receiver location is located on the opposite side of Parramatta Road at 13 Arundel Street. Locations within the grounds of the University have not been considered sensitive receivers due to the proposed use and its proximity to other buildings around the campus. Both attended and unattended noise monitoring were undertaken to quantify the existing acoustic environment at the site and at the nearest sensitive receiver location. Attended background monitoring was undertaken at six locations around the site and one long-term unattended logger was installed at the most 	<p>The Department has recommended conditions of consent requiring the Applicant:</p> <ul style="list-style-type: none"> undertake construction works between 7 am and 6 pm, Mondays to Fridays inclusive; and between 7.30 am and 3.30 pm, Saturdays with no works occurring on Sundays or Public Holidays. undertake noisy works between specific times

	<p>sensitive receiver (13 Arundel Street) from 22 February 2017 to 9 March 2017.</p> <ul style="list-style-type: none"> • <u>Construction</u> <ul style="list-style-type: none"> ○ The <i>Interim Construction Noise Guideline</i> (DECCW, 2009) (ICNG) outlines the process of establishing noise management levels (NMLs) to minimise construction noise impacts on sensitive receivers. ○ The NML (Noise Affected) during standard construction hours at the nearest sensitive receivers, based on background noise levels, is 65 dB $L_{Aeq(15min)}$ (Rating Background Level (RBL) (55) + 10dB = 65 dB $L_{Aeq(15min)}$). ○ Within the Applicant's EIS, construction hours were proposed as follows: <ul style="list-style-type: none"> ▪ 7 am to 6 pm Monday to Friday ▪ 7:30 am to 5 pm Saturday ▪ No construction works on Sunday or NSW Public Holidays. ○ The Applicant provided a construction staging plan and considered the sound power levels anticipated for each stage. ○ Noise generated by construction activities at the nearest sensitive receiver are predicted to exceed the Noise Affected NML by 3-4dB, however would be below the Highly Affected level (75 dB $L_{Aeq(15min)}$). ○ Given the distance to surrounding buildings, construction vibration is not expected to be significant for the proposed works. ○ To address noise impacts, the Applicant proposes to: <ul style="list-style-type: none"> ▪ adhere to proposed construction hours, and where not possible, adhere to practices outlined in the ICNG for works outside of standard hours ▪ locate stationary plant (air-compressors, generators, etc) as far away as possible from the nearest sensitive receiver ▪ utilise the natural screening of the topography where possible ▪ use site sheds and other temporary structures/screens to restrict noise exposure where possible ▪ install operational noise barriers as early as possible to provide screening from construction activities ▪ choose low noise construction equipment and methods ▪ modify construction equipment/methods where practicable (e.g. program activities to occur concurrently where a noisy activity will mask a less noisy activity, or, at different times where more than one noisy activity will significantly increase the noise). 	<p>in accordance with the ICNG</p> <ul style="list-style-type: none"> • restrict arrival times of construction vehicles to construction hours • prohibit impact piling at the site • restrict use of the outdoor terrace from 10 pm • undertake noise validation monitoring • operate plant and equipment in accordance with the limits recommended by EPA.
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	<ul style="list-style-type: none"> ○ In its submission, the EPA made the following recommendations: <ul style="list-style-type: none"> ▪ construction-related works likely to be audible be undertaken during standard construction hours within the ICNG ▪ intra-day respite periods be implemented for works identified in the ICNG as particularly annoying and intrusive ▪ construction vehicles should not arrive outside of the approved construction hours. ○ Upon receipt of the comments from the EPA, the Applicant revised the requested construction hours to align with Council's standard construction hours on Saturdays and confirmed there would be no impact piling and requested respite periods be developed as part of a construction noise and vibration management plan. ○ The Department supported the mitigation measures of the Applicant as well as the comments of the EPA. ○ The Department acknowledges that a development within an established urban environment will likely result in some noise impacts and as such, has recommended conditions to ensure noise is minimised where practicable. Additionally, a condition has been recommended requiring the Applicant to undertake construction works in accordance with ICNG's standard construction hours on Monday to Friday and Council's construction hours on Saturday's (Monday to Friday 7 am to 6 pm and Saturday 7:30 am to 3:30 pm). Additionally, time periods for noisy works have been stipulated and scheduling of respite periods in accordance with the ICNG required. ● <u>Operation</u> <ul style="list-style-type: none"> ○ Typical hours of operation of the proposed development would be from 8 am to 9 pm, with events and functions ending at 11 pm and outdoor areas closing at 10 pm during these events and functions. ○ The Applicant considers that the use of the outdoor areas would potentially result in noise impacts at the nearest sensitive receiver/s, particularly during functions. ○ To mitigate this impact, the Applicant has committed to closing outdoor areas at 10 pm and utilising sound system limiters on installed sound systems. ○ The EPA considered there would not only be potential operational noise impacts upon sensitive receivers resulting from use out outdoor areas but also from mechanical plant and equipment required to maintain climate control. As such, the EPA recommended 	
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	<p>outdoor areas not be used before 8 am nor after 10 pm; events do not generate noise that exhibits tonal, low frequency or other annoying characteristics; and recommended that plant and equipment does not exceed:</p> <ul style="list-style-type: none"> ▪ 53 dBA $L_{Aeq(15min)}$ daytime and evening ▪ 45 dBA $L_{Aeq(15min)}$ night-time period <ul style="list-style-type: none"> ○ Within the RtS, the Applicant provided some additional quantitative assessment, where available, of anticipated operational noise and committed to implementing the recommendations of the EPA. ○ The Department acknowledged the additional information provided, however noted that this was not sufficiently detailed of the operational impacts upon sensitive receivers. ○ As such, the Department recommended the Applicant undertake short-term noise monitoring once operational to provide a quantitative review and verification of operational noise at nearby receiver locations and verify whether operational noise levels meet the EPA recommended levels. ○ Additionally, the Department recommended that operational noise of plant and equipment be restricted to: <ul style="list-style-type: none"> ▪ 53 dBA $L_{Aeq(15min)}$ daytime and evening ▪ 45 dBA $L_{Aeq(15min)}$ night-time period. <p>The Department concludes that noise impacts of the proposed development will be appropriately managed through the implementation of the commitments made by the Applicant and the recommended conditions of consent.</p>	
<p>Construction Traffic</p>	<p>The Applicant anticipates up to seven construction vehicles per hour would service the site during construction hours.</p> <p>Vehicles are proposed to enter and exit the site from Parramatta Road. Construction vehicle activity is also anticipated to occur outside of peak hours.</p> <p>Council and RMS did not raise any concerns with regard to construction traffic movements. TfNSW advised that a Construction Traffic Management Plan should be developed in consultation with the Sydney Coordination Office to ensure that construction traffic impacts are minimised and appropriately managed, including any cumulative construction impacts.</p>	<p>The Department has recommended conditions of consent requiring the Applicant to prepare and implement a construction traffic and pedestrian management plan, in consultation with RMS, TfNSW (Sydney Coordination Office) and Council to address matters raised by TfNSW.</p>
<p>Operational Traffic</p>	<p>The proposal is expected to result in a 30 per cent increase in visitor patronage from the consolidation of the University's museums and expanded facilities. The additional traffic that would be generated is not expected to have any adverse traffic impacts with only a peak of nine additional cars in the busiest hour as:</p> <ul style="list-style-type: none"> • no additional parking is to be provided encouraging the use of existing public transport • a significant portion of the visitors would be students 	<p>The Department considers no conditions or amendments are necessary.</p>

	<ul style="list-style-type: none"> • only a small percentage of non-student visitors would use private vehicle travel based on a low private vehicle journey to work rate for the area (24 per cent) • the dispersed nature of arrival and departures with peak visitor arrivals occurring at 11 am • no new staff. <p>Functions will be limited to 150 patrons and they will be encouraged to use public transport services to access the site. It is not considered that functions of this size would result in any unreasonable increase in traffic movements.</p> <p>The Department is satisfied that the proposal would not result in significant traffic impacts.</p>	
<p>Service Vehicle Access / Loading Dock</p>	<p>The site would be accessed from University Avenue and Parramatta Road.</p> <p>TfNSW raised concern regarding the operations of the loading dock and queuing onto Parramatta Road potentially impacting bus services. TfNSW recommended a loading dock management plan be prepared. Vehicle access and facilities for servicing the museum was also raised as an issue in the public submissions.</p> <p>The Applicant has provided a loading dock management plan to address matters raised by TfNSW and the proposal includes a designated loading area, which would provide adequate infrastructure to support the museum.</p> <p>The Department considers that the site can be adequately serviced and the loading dock management plan demonstrates that the use of the loading dock would not result in queuing onto Parramatta Road and allow for a truck to queue within the site.</p>	<p>The Department has included a condition requiring trucks to enter and exit the loading dock in a forward direction.</p>
<p>Car Parking</p>	<p>The proposal does not include any additional car parking.</p> <p>The proposal is expected to generate an additional nine private vehicles from visitors during peak operational hours. As the proposal is a consolidation of existing museum facilities and existing staff, no new demand for car parking would be generated by staff.</p> <p>Patrons attending museum functions will be encouraged to use public transport services to minimise car parking impacts.</p> <p>The Department considers that there are adequate visitor parking spaces across to the campus to cater for visitors and not providing car parking, which would be consistent with State and Council strategies to promote a reduction in private vehicle travel, can be supported given the accessibility of the site by public transport and constrained parking environment around the site.</p>	<p>The Department considers no conditions or amendments are necessary.</p>

<p>Tree removal/ fauna habitat</p>	<p>The proposal includes the removal of 18 trees and the retention of 54 trees in the area of the development, including the rows of significant figs. The proposal also includes the planting of four new trees. The existing vegetation on the site is identified as potential habitat for two bat species.</p> <p>OEH acknowledged that the retention of the figs would generally mitigate impacts on Grey Headed Flying Fox. OEH noted the potential roosting habitat for the Eastern Freetail-bat present on the site and recommended tree hollows be checked prior to removal.</p> <p>The Department considers that the tree removal is acceptable as visual amenity, built form, heritage and habitat impacts have been adequately addressed and significant trees retained ensuring tree lined view corridors are maintained and potential habitat protected.</p>	<p>The Department has included conditions requiring tree protection during construction and prior to any tree removal that tree hollows are checked.</p>
<p>Contamination</p>	<p>The EPA requested that the detailed site investigation be revised to ensure the sampling data for the site meets the relevant sampling density criteria. The EPA also recommended that an unexpected finds protocol be developed for the site.</p> <p>The Applicant provided a further report detailing the findings of additional soil testing, which confirmed the previous findings that contaminants were within the adopted assessment criteria and that the site is suitable for the proposed museum use.</p> <p>The Department is satisfied that the site has limited potential for contamination and can be made, or are, suitable for the continued use and intended purpose.</p>	<p>The Department has recommended a condition requiring an unexpected finds protocol to be prepared as part of the Construction Environmental Management Plan.</p>
<p>Section 94 Contributions</p>	<p>The Applicant has requested a full exemption from City of Sydney Development Contributions Plan 2015 (Development Contributions Plan). The Development Contributions Plan identifies the section 94 development contributions that would be applicable for new workers, visitors (overnight) and residents.</p> <p>The Applicant contends that development contributions would be unreasonable as there would be no increased demand on Council's infrastructure as there are no new workers and the material public benefit provided by the University.</p> <p>Council has not requested the payment of a development contribution for the proposed development.</p> <p>The Department has considered the Development Contributions Plan and the Applicant's request, and considers that the full exemption can be supported in this instance as there are no new workers, visitors (overnight) or residents and therefore no applicable development contribution in this instance.</p>	<p>The Department considers no conditions or amendments are necessary.</p>
<p>Aboriginal Cultural Heritage</p>	<p>The Applicant contends that various studies have been undertaken across the campus to explore Aboriginal cultural heritage and there is a low</p>	<p>The Department has recommended conditions requiring a protocol for</p>

	<p>potential for discovery and impact on elements of Aboriginal heritage significance.</p> <p>The Department notes that the site has been substantially disturbed, including cut and fill for the former tennis courts on the site. Given the previous studies and findings for the campus, the Department accepts the Applicant's conclusion regarding potential Aboriginal cultural heritage significance of the site. However, given the extent of excavation required for the proposal, the Department considers that an unexpected finds protocol should be prepared. The Department also considers that works should cease on the site and relevant stakeholders consulted if any objects are found.</p>	<p>identifying and dealing with unexpected finds of Aboriginal archaeological heritage and works to stop if any objects are found and appropriate strategies developed to manage the unexpected find.</p>
Archaeology	<p>The Applicant has submitted a Historic Archaeological Assessment report prepared by Casey and Lowe, dated 30 March 2017. The report concludes that the site is of low archaeological potential and any remains found would likely be of low heritage value.</p> <p>The Department acknowledges that the site has been disturbed by the former tennis courts and accepts the Applicant's conclusion.</p> <p>Even so, given the extent of excavation required, the Department considers an unexpected find protocol should be prepared, and should deposits or relics be found on site, works should cease and the Applicant shall consult with OEH.</p>	<p>The Department has recommended conditions requiring a protocol for identifying and dealing with unexpected archaeological finds and works are to stop if any objects are found and appropriate strategies developed to manage the unexpected find.</p>

Public interest

The proposal is considered to be in the public interest as it would provide the following public benefits:

- additional investment in educational infrastructure within a highly accessible location
- growing the Camperdown-Ultimo health and education precinct
- provision of a world class cultural, education and research facility
- ensuring the State remains competitive in attracting students, staff and researchers in the tertiary education sector
- delivery of approximately 238 new construction jobs.

6. CONCLUSION

The Department has assessed the merits of the proposal taking into consideration the issues raised in all submissions as well as the Applicant's response, and is satisfied the impacts have been satisfactorily addressed by the proposal and through the Department's recommended conditions.

The proposed development is consistent with the objects of the EP&A Act (including ecologically sustainable development) and is consistent with the State's strategic planning objectives for the site as set out in the NSW State Priorities, *A Plan for Growing Sydney* and the draft *Eastern City District Plan* as it will support education land uses associated with the University of Sydney and contribute to the Camperdown-Ultimo health and education precinct. The Department also considers that the proposal would provide significant public benefits through the provision of a cultural, educational and research facility in an accessible location. The proposal would also provide economic benefits, generating approximately 238 construction jobs.

The Department's assessment concludes that the built form of the proposed development is acceptable and would not result in any significant adverse environment or amenity impacts and would be generally consistent with the scale and form of the existing development. Further, the development would preserve the heritage significance of adjoining buildings and the University of Sydney Conservation Area.

The Department is satisfied that the proposed development has satisfactorily responded to the issues raised and recommends approval of the SSD application for the construction of the Chau Chak Wing Museum at the University of Sydney (Camperdown campus), subject to recommended conditions. The Department's recommended conditions of consent would ensure the construction and operation of the proposed development would not result in adverse environmental impacts on the surrounding environment.

The Department concludes the impacts of the development can be appropriately mitigated through the implementation of the recommended conditions of consent. Consequently, the Department considers the development is in the public interest and should be approved.

7. RECOMMENDATION

In accordance with section 89E of the *Environmental Planning and Assessment Act 1979*, it is recommended that the Executive Director, Priority Projects Assessments, as delegate of the Minister for Planning:

- **consider** the findings and recommendations of this report
- **approve** the State significant development application for SSD 7894
- **sign** the attached development consent and recommended conditions of consent (**Appendix C**).

Prepared by: Teresa Gizzi
Senior Planner, Social and Other Infrastructure Assessments

Recommended by:



Karen Harragon
Director
Social and Other Infrastructure Assessments

Decision

Approved by:



David Gainsford 23/2/18
Executive Director
Priority Projects Assessments
as delegate of the Minister for Planning

APPENDIX A RELEVANT SUPPORTING INFORMATION

The following supporting documents and supporting information to this assessment report can be found on the Department of Planning and Environment's website as follows.

1. Environmental Impact Statement
http://majorprojects.planning.nsw.gov.au/index.pl?action=view_job&job_id=7894
2. Submissions
http://majorprojects.planning.nsw.gov.au/index.pl?action=view_job&job_id=7894
3. Applicant's Response to Submissions
http://majorprojects.planning.nsw.gov.au/index.pl?action=view_job&job_id=7894
4. Applicant's Supplementary Information
http://majorprojects.planning.nsw.gov.au/index.pl?action=view_job&job_id=7894

APPENDIX B CONSIDERATION OF ENVIRONMENTAL PLANNING INSTRUMENT(S)

State Environmental Planning Policy (State and Regional Development) 2011 (SRD SEPP)

The aims of the SRD SEPP are to identify SSD, State significant infrastructure (SSI), critical SSI and to confer functions on regional planning panels to determine development applications.

The proposal is considered to be SSD in accordance with section 89C of the *Environmental Planning and Assessment Act 1979* as it is for the purpose of cultural facility ancillary to an 'educational establishment' with a capital investment value in excess of \$30 million, as defined under clauses 13 and 15 of Schedule 1 of the SRD SEPP. The provisions of the SRD SEPP are considered in **Table 1**.

Table 1: SRD SEPP consideration

Relevant Sections	Consideration / Comments	Complies
3 Aims of Policy The aims of this Policy are as follows: (a) to identify development that is State significant development,	The proposed development is identified as SSD.	Yes
8 Declaration of State significant development: section 89C (1) Development is declared to be State significant development for the purposes of the Act if: (a) the development on the land concerned is, by the operation of an environmental planning instrument, not permissible without development consent under Part 4 of the Act, and (b) the development is specified in Schedule 1 or 2.	The proposed development is permissible with development consent. The development is a type specified in Schedule 1.	Yes
Schedule 1 State significant development – general (Clause 8 (1)) 15 Educational establishments Development for the purpose of educational establishments (including associated research facilities) that has a capital investment value of more than \$30 million.	The proposed development comprises development for a purpose ancillary to an educational establishment and has a CIV in excess of \$30 million.	Yes

State Environmental Planning Policy (Infrastructure) 2007 (Infrastructure SEPP)

The Infrastructure SEPP aims to facilitate the effective delivery of infrastructure across the State by improving regulatory certainty and efficiency, identifying matters to be considered in the assessment of development adjacent to particular types of infrastructure development, and providing for consultation with relevant public authorities about certain development during the assessment process.

Whilst the development does not constitute traffic generating development in accordance with clause 104 of the Infrastructure SEPP, the proposal was referred to the RMS who raised no objection to the development.

State Environmental Planning Policy No. 55 – Remediation of Land (SEPP 55)

SEPP 55 aims to ensure that potential contamination issues are considered in the determination of a development application. The EIS and RtS includes a contamination assessment for the site which concludes that contaminants were within the adopted assessment criteria and that the site is suitable for the proposed museum use.

The Department considers that, in accordance with clause 7 of SEPP 55, the subject site would be suitable for its intended purpose. The Department has included a condition recommending

procedures and protocols be developed to deal with any unexpected finds of site contamination.

State Environmental Planning Policy No. 64 – Advertising and Signage (SEPP 64)

SEPP 64 aims to ensure that signage is compatible with its context. The proposed development includes signage at the front entrance of the museum with an area of approximately 3sqm. The signage comprises steel lettering and casting into concrete. No illumination is proposed. The signage would only be visible from within the university grounds.

The Applicant has provided an assessment of the proposed signage against the provisions of Schedule 1 of SEPP 64. The Department has considered the signage against the same assessment criteria and found it to be acceptable.

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

The Education SEPP aims to simplify and standardise the approval process for child care centres, schools, TAFEs and universities while minimising impacts on surrounding areas and improving the quality of the facilities. The Education SEPP includes planning rules for where these developments can be built, which development standards can apply and constructions requirements.

Schedule 4 Savings and Transitional Provisions, Clause 1(1) states that this policy does not apply to SSD applications made but not finally determined before the Education SEPP came into force on 1 September 2017. The EIS for this application was submitted on 26 May 2017, therefore the Education SEPP does not apply to this application.

Sydney Local Environmental Plan 2012 (SLEP)

Consideration of the relevant controls contained within SLEP 2012 is provided below in **Table 2**.

Table 2: Consideration of SLEP 2012

City of SLEP 2012	Department Comment/Assessment	Yes/No
Clause 2.3 Zone Objectives and land use table	The site is zoned SP2 – Infrastructure (Education Establishment). The proposed museum forms part of the University of Sydney and is therefore related to the existing educational establishment. Therefore the development is permissible in zone and consistent with the zone objectives.	Yes
Clause 2.7 Demolition requires development consent	Demolition does not form part of the application.	N/A
Clause 5.10 Heritage conservation	The submitted Heritage Impact Statement satisfactorily considers and assesses the impact of the proposed development. The proposal has been designed to maintain the significance of the existing heritage items and the University of Sydney heritage conservation area.	Yes
Clause 6.21 Design excellence	A design competition process is not required for the proposed building as the building will not: exceed 25 metres in height above natural ground level; have a CIV of more than \$100,000,000; or require a DCP to be prepared under cl. 7.20. Notwithstanding, the University of Sydney held its own design competition and selected Johnson Pilton Walker architects to	Yes

	<p>deliver the proposal. The design was developed in consultation with the University of Sydney Design Review Panel.</p> <p>The proposed building has been considered against the matters identified in Clause 6.21 and is considered to exhibit design excellence in accordance with the requirements of the SLEP 2012.</p>	
Clause 7.9 (3) Information and education facilities (Car parking)	No car parking is proposed as part of the development.	N/A
Clause 7.14 Acid sulfate soils	The development site is classified as Class 5 acid sulphate soils under the LEP. The proposal is not within 500 m of land classed 1 to 4, nor is it below 5 m AHD and it will not lower the water table below 1 m AHD on adjacent classes of land.	Yes
Clause 7.15 Flood planning	<p>The subject site is located in the Blackwattle Bay catchment. Both areas have been subject to flood modelling assessment completed by WMA Water on behalf of City of Sydney Council. The Blackwattle Bay Catchment - Floodplain Risk Management Plan, September 2015, identify no localised flooding effects immediately on the site, however it is noted that University Avenue to the south-southeast is flood effected.</p> <p>The proposed stormwater design includes an onsite detention system to ensure that the existing peak discharge conditions from the site to Lake Northam are not exceeded and existing flood impacts on University Avenue are not exacerbated.</p>	Yes
Clause 7.16 Airspace operations	The site is located on land identified on the Sydney Airport Prescribed Obstacle Limitation Surfaces Drawing No FSS6934 Revision 1, Declared by the Commonwealth Department of Infrastructure and Regional Development on 20 March 2015 as being located between horizontal surface limits of 100 - 110 metres (AHD). The proposed building will have a maximum height of RL 48.35 (AHD) and will therefore not penetrate the Obstacle Limitation Service.	Yes
Clause 7.20 Development requiring or authorising preparation of a development control plan	<p>A development control plan (DCP) is required for land if the site area for the development is more than 5,000 square metres or if the development will result in a building with a height greater than 25 metres above ground level. However, a development control plan is not required to be prepared if the consent authority is satisfied that such a plan would be unreasonable or unnecessary in the circumstances.</p> <p>The Department considers a DCP would be unreasonable and unnecessary as the proposal have been subject to a multi-staged design competition process conducted by the University. The design was then conceptualised in partnerships with the University's independent design review panel.</p> <p>The Department also notes the site is contained wholly within the University's campus, resulting in minimal adverse environmental and amenity impacts, and the development is also sympathetic to existing and future proposed University buildings.</p>	Yes

Sydney Development Control Plan 2012

Consideration of the relevant development controls contained within Council's DCP is provided below.

Table 3: DCP 2012 Compliance Table

Sydney DCP 2012	Department Comment/ Assessment	Yes/No
2.3.5 Locality Statement – University of Sydney/Royal Prince Alfred Hospital	<p>The proposed development would preserve the heritage significance of the existing buildings and maintain the landscape character of the development. The stands of figs along the Parramatta Road frontage and University Avenue are to be retained and protected, maintaining the landscape character of the University of Sydney and significant defined vistas towards the Quadrangle building to the west.</p> <p>The proposal includes improved pedestrian links to existing paths of travel and there is provision for bicycle parking on the site.</p> <p>The development is consistent with the locality statement and associated principles applicable to the University of Sydney.</p>	Yes
3.2.1 Improving the Public Domain	<p>Although located within the University of Sydney campus, the proposed development is surrounded by areas of open space that are accessible by the public.</p> <p>Shadow diagrams submitted with the application demonstrate solar access to the open space to the east, and to University Avenue to the south, will not be significantly affected by the development. The shadow diagrams indicate minor overshadowing of the open space to the west during the afternoon period mid winter, however it would not have any significant detrimental impact on the useability or functionality of this space.</p> <p>The development would not result in a loss of views from the public domain, in particular maintaining vistas from Victoria Park towards the Quadrangle to the east. Views from open spaces within the University of Sydney campus are also generally maintained.</p>	Yes
3.2.2 Addressing the Street and Public Domain	<p>The proposed development is to maintain the existing interface to Parramatta Road preserving the row of figs and existing landscaping.</p>	Yes
3.2.7 Reflectivity	<p>The 'Solar Light Reflectivity Analysis' prepared by Windtech, dated 8 March 2017 details that motorists travelling within the surrounding road network would not be adversely affected due to the orientation of the building's façade and angle of approach for motorists. The assessment concluded that subject to the implementation of recommendations in relation to external glazing, compliance can be achieved to ensure potential adverse glare impacts are minimised.</p> <p>The Department also recommends the imposition of its standard 'reflectivity' condition, requiring external materials do not exceed the maximum 20% reflectivity spectrum.</p>	Yes

3.2.8 External Lighting	<p>External lighting is proposed to comply with relevant Australian Standards and the University of Sydney Lighting Master Plan.</p> <p>Further, the Department recommends the imposition of a standard condition reinforcing compliance with Australian Standards.</p>	Yes
3.5 Urban Ecology	<p>The development preserves significant trees on the site and protects potential habitat. Additional trees and landscaping is also proposed to mitigate tree removal.</p> <p>The development is consistent with the objectives of Section 3.5.</p>	Yes
3.6 Ecologically Sustainable Development	Addressed at Section 3.6 of this report.	Yes
3.7 Water and Flood Management	Addressed in Appendix B Table 2 of this report.	Yes
3.9 Heritage	Addressed at Section 5.2 and Appendix B Table 2 of this report.	Yes
3.11 Transport and Parking	Addressed at Section 5.2 of this report.	Yes
3.12 Accessible Design	Disabled is provided to the development in accordance with Australian Standards and reinforced by recommended conditions of consent.	Yes
3.13.1 Crime prevention through environmental design (CPTED)	A 'Crime Prevention Through Environmental Design Report' prepared by ARUP, dated 30 March 2017 was submitted the application. The report demonstrates consistency with CPTED principles and Clause 3.13.1.	Yes
3.13.3 Social impacts	The proposed development provides an improved cultural facility for the University of Sydney and the community which would have a positive social impact.	Yes
3.14 Waste	A condition is recommended requiring the submission of a construction waste management plan to the Certifying Authority prior to commencement of works. A waste management plan has been submitted with the application which addresses operational waste management. Subject to conditions, the development is consistent with this clause.	Yes
3.16 Signs and advertisements	The proposed building identification signage is integrated with the front entry of the museum, is not illuminated, and is only visible from within the grounds of the University of Sydney. The signage has been considered against the provisions of this section and found to be acceptable.	Yes
3.17 Contamination	Addressed at Section 5.2 and Appendix B Table 2 of this report.	Yes

APPENDIX C RECOMMENDED CONDITIONS OF CONSENT
