TSA Riley

Bathurst Hospital Redevelopment

Preliminary Construction Management Plan

January 2025

Document Control

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Prepared for issue:	Alex Lisney, Kyle Robinson	Date:	January 2025
Approved for issue:	Andrew Neill	Date:	January 2025

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1. Introduction

This Preliminary Construction Management Plan (PCMP) has been prepared by TSA Management on behalf of Health Infrastructure for the redevelopment of the Bathurst Hospital at 361-365 Howick Street, Bathurst NSW.

The site occupied by Bathurst Health Service, a Level C Referral Hospital facility in the Western NSW Local Health District (WNSWLHD).

This report accompanies a State Significant Development Application that seeks approval for the construction and operation of a new-build expansion, refurbishment and repurposing works to the existing Bathurst Health Service main hospital building and Daffodil Cottage Cancer Services building. Proposed works will include:

- A new-build, multi-storey health services building expansion toward Mitre St (including 1 plant level) to include overnight inpatient accommodation and non-admitted care services and a new hospital front-of house and entrance
- A new-build, two-storey expansion to the Emergency department and Operating Theatres (plus 1 plant level)
- A new-build, single-storey expansion to the existing Cancer Service building – Daffodil Cottage
- Refurbishment and repurposing to areas of the existing hospital
- Site establishment, demolition of some existing structure, cut and fill and remediation works
- Vehicular circulation and car parking improvements
- Tree removal
- Landscape works
- Alteration and amplification of existing hospital plant and services infrastructure

For a detailed project description, refer to the Environmental Impact Statement prepared by Ethos Urban.

This PCMP has been developed during the detail design phase and contains preliminary construction methodologies for the delivery of this complex integrated project. It is envisaged that this PCMP will evolve and be further developed by the Contractor when appointed to deliver the Main Works in conjunction with the design consultant team, project stakeholders, HI and WNSWLHD.

The delivery of the construction works being undertaken for the Main Works will include a staged construction approach to allow the existing hospital to remain operational during the construction of the new development.

It is noted that it is the responsibility of the Contractor to prepare detailed Environmental and Site Management Plans in accordance with the REF, for implementation during construction.

1.1 Secretary's Environmental Assessment Requirements Reporting

This report will address the SEARs requirements as detailed in Table 1: Industry SEARs requirements table below:

Table 1: Industry SEARs requirements

Item	SEARS Requirement	Relevant Section of Report
22.	**Infrastructure Requirements and Utilities** · In consultation with relevant service providers: • assess the impacts of the development on existing utility infrastructure and service provider assets surrounding the site. • identify any infrastructure required on-site and off-site to facilitate the development and any arrangements to ensure that the upgrades will be implemented on time and be maintained. • provide an infrastructure delivery and staging plan, including a description of how infrastructure requirements would be co-ordinated, funded and delivered to facilitate the development.	• 9 Services
25.	**Construction, Operation and Staging** • If staging is proposed, provide details of how construction and operation would be managed, and any impacts mitigated.	Staging: • 3 Key Milestones • 4 Site Operations • 6 Construction Methodology • Impacts and Mitigation • 5 Environmental Amenity • 7 Traffic Management • 8 Waste Management • 9 Services

2. Project Overview

2.1 Overview

The NSW Government announced a total of $200M toward the redevelopment of the Bathurst Health Service (BHS) in June 2022. BHS provides a range of inpatient, outpatient and community clinical services to Bathurst and surrounding communities and works as part of a network of health services and hospitals within the region.

BHS was commissioned in January 2008, and the Heritage Building and Ambulatory Care Unit were redeveloped in 2012 to provide enhanced ambulatory care, specialist clinics and education facilities. Some additional hospital refurbishments have been undertaken since then, but the building footprint remains largely unchanged.

BHR is proposed as alterations and additions to the existing hospital buildings on the existing site. The Project will provide for a range of new clinical and non-clinical facilities to support capacity issues and existing infrastructure deficiencies on the campus.

The BHS Clinical Services Plan (2022-2031) priorities will be used as a guiding document throughout the project planning phases.

Project Schematic Design has been developed in consultation with the WNSWLHD and BHS key stakeholders, external groups including Bathurst Council, First Nations groups, NSW Government Architect, Downer (as

incumbent PPP Contractor for hard and soft facilities management services), and the Bathurst community.

The REF documentation including this PCMP is prepared against the final Schematic Design planning, released for public consultation and review in February 2024.

2.2 Site Description

Bathurst Health Service is situated upon the lands of the Wiradjuri people. The site is bounded by 4 streets, Howick Street as the main entrance, Commonwealth Street, Mitre Street, and Durham Street which leads from the main Bathurst centre, refer to Figure 1.

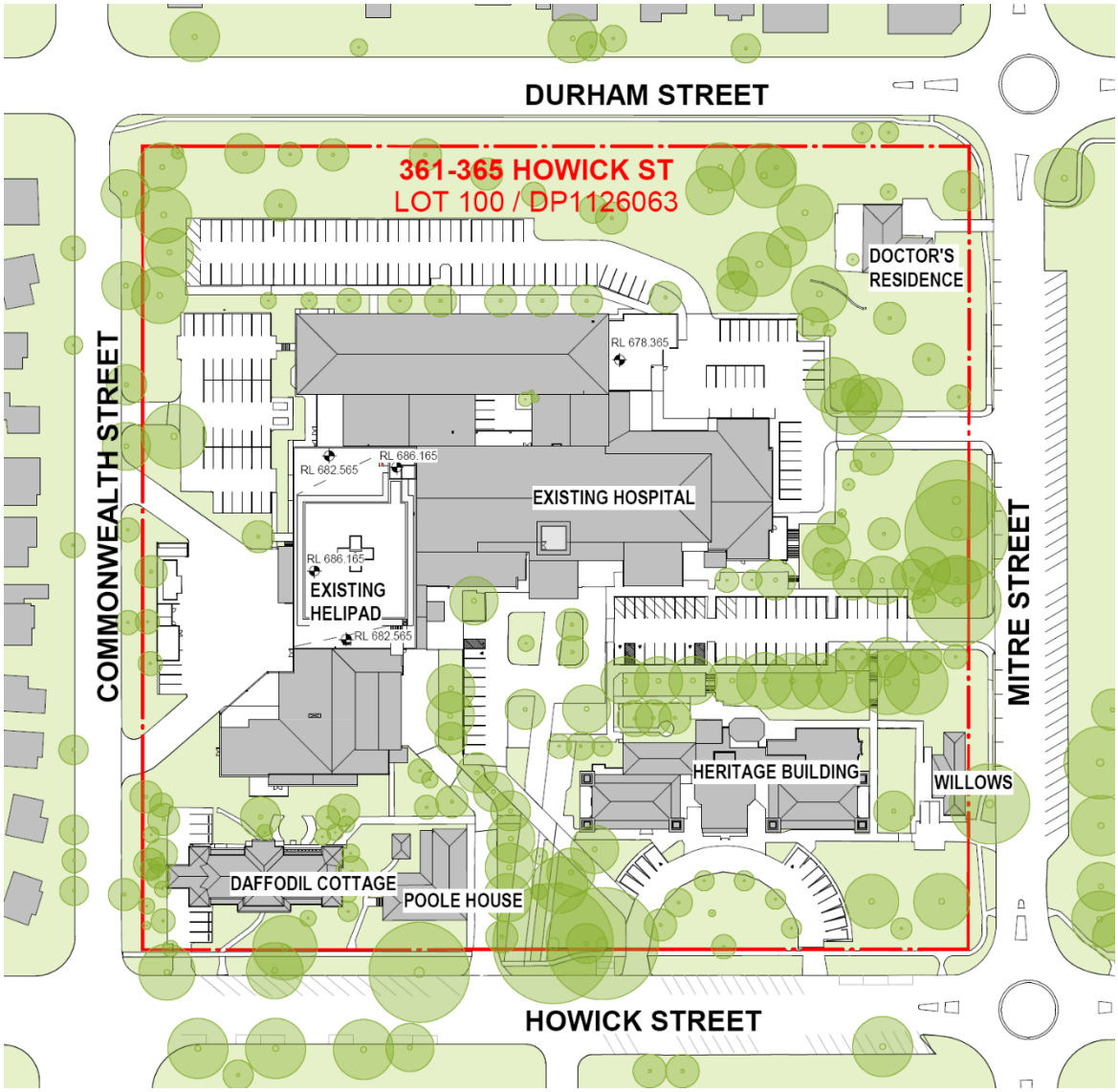

Figure 1 Bathurst Hospital Existing Site Plan (source: BLP BHR-BLP-DRW-ARC-SSD-001-XX001 [C])

The BHS campus is made up of numerous buildings from Heritage listed buildings of early to mid-1880's to modern building constructed in the early 2000s.

The site slopes steeply from Howick Street to Durham Street, enabling elevated views.

3. Key Milestones

Table 2 Project milestones

Milestone	Target Commencement	Target Completion
Main Works Phase 0 - Enabling Works	February 2025	July 2025
Main Works Phase 1 – East and South New-build Extension	July 2025	February 2027
Main Works Phase 2 – Refurbishment Level 02	May 2027	October 2027
Main Works Phase 3 – Refurbishment Level 01 and Level 03	December 2027	April 2028

4. Site Operations

The construction Main Works will be undertaken by a Principal Contractor. The Principal Contractor will be selected through a competitive procurement process that will commence in Q4 2024. All statements and proposals documented in this Preliminary Construction Management Plan will be reviewed at the time of contract award for the Works to ensure alignment with the proposed methodologies and construction staging of the preferred Contractor.

Following appointment, the Principal Contractor will be obliged to develop and provide for use a detailed Construction Environmental Management Plan/s that will incorporate WHS, Environmental and Quality management as well as all relevant sub-plans including:

- Environmental Management Plan
- Sustainability Management Plan
- Construction Waste Management Plan
- Traffic Control Plan
- Construction Noise and Vibration Management plan (CNVMP)
- Dust/ Air Quality Management Plan
- Work Health and Safety Management Plan

4.1 Legislative and Regulatory Requirements

The Works will be undertaken in accordance with the following legislative requirements and any others that must be complied with as required:

- National Construction Code 2022 comprising the Building Code of Australia;
- Applicable Australian Standards;
- Protection of the Environment Operations Act and Regulations;
- Approved Methods for the Modelling and Assessment of Air Pollutants in NSW (EPA);
- Environmental Legislation Amendment (Hazardous Chemicals) Act 2024;
- Work, Health and Safety Act 2011;
- Work Health and Safety Regulation 2017;
- Waste Avoidance and Resource Recovery Act 2001;
- Environmental Planning and Assessment Act 1979;
- Heritage Act 1977;
- Local Government Act 1993;
- Soil Conservation Act 1938;
- Threatened Species Conservation Act 1995;
- Biodiversity Conservation Act 2016;
- Native Vegetation Act 2003.

4.2 Hours of Construction

Construction work will be undertaken in accordance with the construction hours set out in the conditions of approval for the Review of Environmental Factors. These are expected to be:

Monday to Friday inclusive 7.00am to 6.00pm.
Saturday 8:00am to 1:00pm
No work permitted on Sundays and Public Holidays
Safety inspections are permitted from 7:00am

4.3 Public and Property Protection

The general construction methodology principle is to separate construction areas of work from surrounding stakeholders, staff, visitors, patients, consumers, and residents. Where there is a cross-over, this will be managed to ensure safety of all persons and equipment.

The construction phasing will be developed to ensure continued hospital operations and distinct isolated construction zones which maximises separation between the hospital operation and construction work. Appropriate site hoarding and fencing (as specified in Australian Standards and SafeWork NSW requirements) will be installed prior to commencement of works to prevent public access and to maintain security for the various areas of the works.

Potential construction vehicle routes are included in Figure 2 below, these are subject to change with input from the Main Works Contractor once engaged.

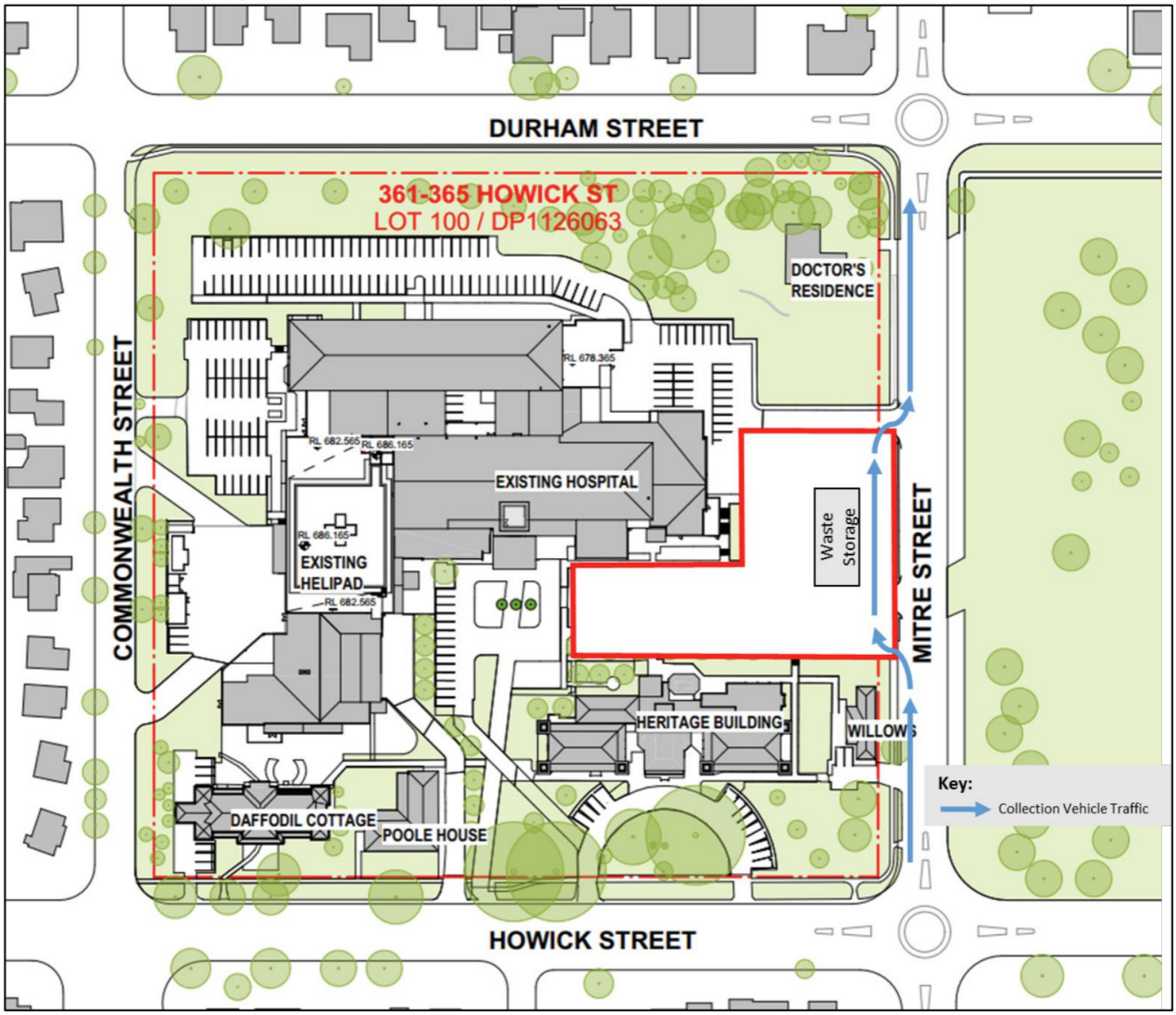

Figure 2 Vehicle approach and departure routes (source: Encycle)

Site Notices will be erected at the boundary of the site. The site notices will include details of; Principal Contractor details, name of Site Manager and 24-hour contact number, approved hours of work, and details of the Principal and other appropriate stakeholders. Safety related statutory signage will also be erected on the boundary of the site in accordance with WorkCover NSW requirements.

Construction site, hospital precinct information and pedestrian signage and any temporary pedestrian measures required will be installed and maintained for the duration of the Works.

The entry gates to the site will be manned by traffic control staff during site operation hours and will be locked shut when the site is closed. Traffic controllers will be used where required to manage the interface of construction vehicles with pedestrians and/or public vehicles.

These public and property protection measures will be reviewed at the time of contract award for the works to ensure alignment with the proposed preferred methodologies and construction staging, to ensure that the safety of the public & staff is maintained at all times during the works.

4.4 Security

Security measures must be provided to prevent unauthorised access to adjoining land and the construction work site including the safeguarding of site materials, plant and equipment. Security measures will be in place at all times when the site is not in operation. This may include perimeter barriers, locks, surveillance systems, security lighting and motion detectors. In the event where a construction site cannot be fully secured, consideration will be given to the use of a security service to prevent unauthorised access.

4.5 Safety

The Contractor is responsible for the construction work at all times until the work is completed under the Contract and is engaged as principal contractor and manager and controller of the premises for the construction work under Clauses 293 and 298 of the Work Health and Safety Regulations (NSW) 2017 (WHS Regulations). The Contractor is authorised to exercise such authority of the person conducting a business or undertaking that is commissioning the construction project as is necessary to enable it to discharge the responsibilities of principal contractor and manager and controller of premises imposed by the Work Health and Safety Act (NSW) (WHS Act) and Chapter 6 of the WHS Regulations.

A site-specific WH&S management plan will be developed by the Contractor to demonstrate the commitment of the Project to Workplace Health & Safety (WH&S). The plan will identify the scope of work to be undertaken, the hazards associated with the work and the risk assessment processes and risk control measures to be used in the execution of the plan. The Contractor must include procedures for identifying and managing risk and how this will be monitored and managed to ensure employer and employee compliance with these systems.

The Contractor will maintain accreditation under the Australian Government Building and Construction WHS Accreditation Scheme (the Scheme) established by the Building and Construction Industry Improvement Act 2005 (BCII Act) while building work (as defined in section 5 of the BCII Act) is carried out. The Contractor must comply with all conditions of Scheme accreditation.

The objectives of the Site Safety Plan (SSP) include the following:

- Maintain lost time injury reporting and review positive performance indicators;
- Report all incidents and near misses and develop corrective action plans;
- Conduct Senior Management and WH&S Group reviews;
- Develop required WH&S resources;
- Formalise regular senior management reviews of WH&S systems and implement relevant improvements;
- Continually develop WH&S systems, policies, procedures and WH&S Plans to comply with statutory requirements and industry best practice;
- Maintain an Audit Program to comply with system's requirements;
- Ensure all corrective actions and non-conformances are closed out;
- Meet or exceed the requirements of AS4801 certification and Federal Safety commission accreditation;

- Adopt a zero-tolerance safety philosophy;
- Provide Safety Awareness and other appropriate WH&S training;
- Continue to implement ongoing induction procedures on all Projects;
- Hold regular Consultative Committee meetings, maintain minutes and record actions;
- Issue Safety Alerts to all staff and other stakeholders according to requirements;
- Conduct weekly toolbox talks on site and maintain a register of attendees;
- Maintain a data base of all toolbox talks.

The SSP will also address the following:

- WH&S training – identification of WH&S training needs of all personnel, induction training, refresher training, attendance of WH&S committee personnel at consultation training etc.;
- Incident management – identifies who will be available during and outside normal working hours to prevent, prepare for, respond to and recover from illness/ injury and incidents;
- Site safety rules – As a minimum will include induction and safety training, PPE, Site access and security, procedures for emergency situations, illness and injury, protection of personnel and the public, work at elevated areas, safe working, hazardous materials and dangerous goods etc.;
- Safe Work Method Statements – All activities assessed as having WH&S risks require a SWMS to be prepared and implemented.

The Principal Contractor will need to comply with their duty under WHS management in accordance with the legislative requirements listed but not limited to, in Section 4.1 of this document.

4.6 Disruption Notices

Any planned disruptions to hospital operations will be managed through the process of Disruption Notices (DNs). For such stoppages, the DN will describe the applicable works, timetable, issues and risk management plans.

DNs are submitted by the contractor to the Project Manager, HI, TSA Riley, and WNSWLHD/ Downer stakeholders for approval in advance of works commencing (minimum fourteen days).

The Contractor shall (in consultation with the Project Manager) provide positive planning and communication through this process, including establishing a “Disruption and Shutdown Approval” process with an agreed format and regular meetings, communicated formally via email.

The Contractor shall give the Principal sufficient written notice of any operational service and infrastructure interruption or significantly noisy works (such as use jackhammers etc on Site), relating to or arising from the Works. The Contractor’s responsibility or obligation to comply with all relevant codes will remain unaffected by the giving of any such notice.

4.7 Complaints & Neighbour Management

From the commencement of construction until completion, the Principal Contractor will be required to maintain a community liaison officer on the project. This officer will be contactable by both a mobile phone and email and the contact details will be clearly advertised on site hoardings, community updates and the like. The Principal Contractor will be required to maintain a register of complaints and to report to the Project Manager and Health Infrastructure the status of complaints on a monthly basis. Complaints that cannot be addressed by the Principal Contractor will be presented to the relevant representative for resolution of the issue.

5. Environment and Amenity

5.1 Remediation / Validation

The Contractor will be provided with background reports from all consultants for the site prior to commencing Phase 1 Main Works. These reports will provide sufficient background to inform the Contractor of the ground conditions and previous preliminary works to determine the further testing and specific materials handling/waste disposal that is required.

5.2 Heritage Conservation

The BHS campus includes a heritage building built in the 1880's which was the original Bathurst Hospital. This feature building is listed as a State significant historic building located on the most prominent corner of the site. The project Master Plan ensures the preservation of the heritage significance by retaining the setbacks and curtilage around the building. Spaces adjacent to the heritage building are considered as open and pedestrian friendly that also emphasise physical separation from the original structure.

Heritage investigations have been completed and included in the Review of Environmental Factors (REF). Preliminary Heritage Consultant investigations completed by Unearthed Archaeology in late 2023 have noted the proposed construction works are in the vicinity of the heritage building of Bathurst Health Service. It is also noted that none of the proposed works will directly impact on the heritage building. It is considered that the construction of the proposed additions to BHS will not have a significant visual impact on the heritage building as these additions will be located behind structures that have already had an impact on the visual amenity of the heritage building under previous redevelopment.

5.3 Soil Erosion & Sediment Control

The soil erosion and sediment control will be implemented in accordance with the Civil Engineering Report, provided with this REF Application.

5.4 Environment & Amenity

The contractor undertaking the Works will be required to submit for approval a comprehensive Environmental Management Plan (EMP) to ensure that all elements of the plan meet all statutory requirements, Conditions of Approval as well as the Ministry of Health's requirements. The EMP will describe the environmental strategy, methods, controls, and requirements for the execution of the Works. It will stand alone as the master document for site environmental activities.

The primary aim and objective of the EMP will be to provide a framework of procedures to minimise the impacts of the construction of the project on the environment. The environmental performance of the contractor will be monitored throughout the Works.

As a minimum, any further erosion and sediment controls required for the Main Works shall be designed, installed and maintained in accordance with the requirements of Managing Urban Stormwater: Soils and Construction 'The Blue Book' 2004 (4th edition) and/or details provided by project engineering consultants.

5.5 Infection Control Management

Infection prevention and control strategies that are consistent with national guidelines, including the availability of hand gels, ready access to personal protective equipment and attention to finishes.

The Contractor will develop an Infection Control Management Plan to ensure that all members of the construction team have a full appreciation of the project, the risks of infection posed by construction activities

and how to manage these risks. The Infection Control Management Plan will outline the Contractor's approach to identifying any infection control risks and details the measures required to address the risk of infection resulting from the construction works.

The Contractor will regularly consult with the Principal to identify any infection control measures required to address the risk of infection resulting from the construction works.

5.6 Dilapidation Report

Prior to commencing the works onsite and at completion, the appointed Principal Contractor will generate a Pre and Post Dilapidation Report. It is the Contractors responsibility to ensure the report considers all areas reasonably impacted by the works. At a minimum the reports will consider the following areas:

- Infrastructure and services within reasonable proximity to the works; and
- Property, Buildings, or structures within reasonable proximity to the works including site sheds.

The full extent of the Dilapidation Report will be agreed with the Principal prior to investigations proceeding.

5.7 Noise and Vibration Management

This section is to be read in conjunction with the Acoustic Report (Rev 001 dated 05/07/2024) prepared by Stantec Pty Ltd and submitted as part of this REF lodgement.

Noise from the construction site shall not exceed the limits set out in the Interim Construction Noise Guidelines, EPA and Australian Standards. No machine work will occur outside the approved working hours set unless approval has been given through the DN process.

The noise and vibration from the use of any plant equipment and/or building services associated with the premises shall not give rise to an offensive noise as defined under the provisions of the Interim Construction Noise Guidelines, EPA and Australian Standards.

As part of noise mitigation for the project, the contractor will be responsible for the management, checking of compliant maintenance regimes and statutory supervision of all equipment.

Guidelines for operational limits, identification of at-risk receivers and implementation of mitigation measures will be provided in a project Construction Noise and Vibration Management Plan. The objectives of the Construction Noise and Vibration Management Plan will be to:

- Ensure that construction works do not significantly impact background noise levels around the hospital precinct, and that applicable guidelines and regulations are met;
- Ensure all equipment operates within the applicable noise levels;
- Ensure that construction works do not cause sufficient vibration to damage surrounding buildings, and comply with the applicable guidelines and regulations;
- Vibration does not affect occupiers of the adjoining buildings; and
- Ensure construction methodologies adopted minimise the impact of noise, dust and vibration.
- Reasonable methods (having regard to the use and operation of existing health facilities in close proximity to the Site) of noise suppression on all compressors, jack-hammers and other machinery of whatsoever will be implemented to ensure that the noise levels emanating from the Site during the Works are minimised.

5.8 Odour/ Fumes Control

Any potential odours, fumes/smoke associated with demolition and construction for the site will be assessed and minimised.

5.9 Protection of Trees

The retention and protection of vegetation on the site will be met as per the conditions of approval and in line with the Arboricultural Impact Statement submitted along with this REF prepared by Douglas Arbor.

The Contractor will be required to prepare a detailed site-specific Construction Management Plan. This Plan will need to demonstrate the measures that will protect trees and vegetation being retained under the development works.

6. Construction Methodology

6.1 Project staging and decanting strategy

The construction of the project will be undertaken in a single stage, entailing the new build extensions, refit of existing departments and the majority of the traffic and landscaping alterations. The Project is proposed to be undertaken in phases to allow for the hospital to remain safe and operational during the Main Works construction phase. An existing site plan is included at Figure 1. The Main Works phasing is grouped into four general packages outlined in the following pages.

Main Works Phase 0 – Enabling Works
Main Works Phase 1 – East and South New-build Extension, Existing Hospital infrastructure works, Daffodil Cottage upgrades
Main Works Phase 2 – Refurbishment Level 02 and Level 03
Main Works Phase 3 – Refurbishment Level 01 and Level 03

A detailed Phasing and Decanting Strategy has been developed in consultation with key project stakeholders through the establishment including representation from WNSWLHD and BHS EUG, HI, TSA, BLP Architects, MBM Cost Manager and other members of the consultant design team as required. The strategy is detailed below, and full drawings within the submitted REF Architectural design package. This methodology is subject to change and following Main Works Contractor Award, an updated Detailed Construction Methodology will be prepared in consultation with project stakeholders.

Demolition is proposed to existing main hospital building spaces in phase 1 to support the proposed new-build extension works, refer to
Figure 3 below.

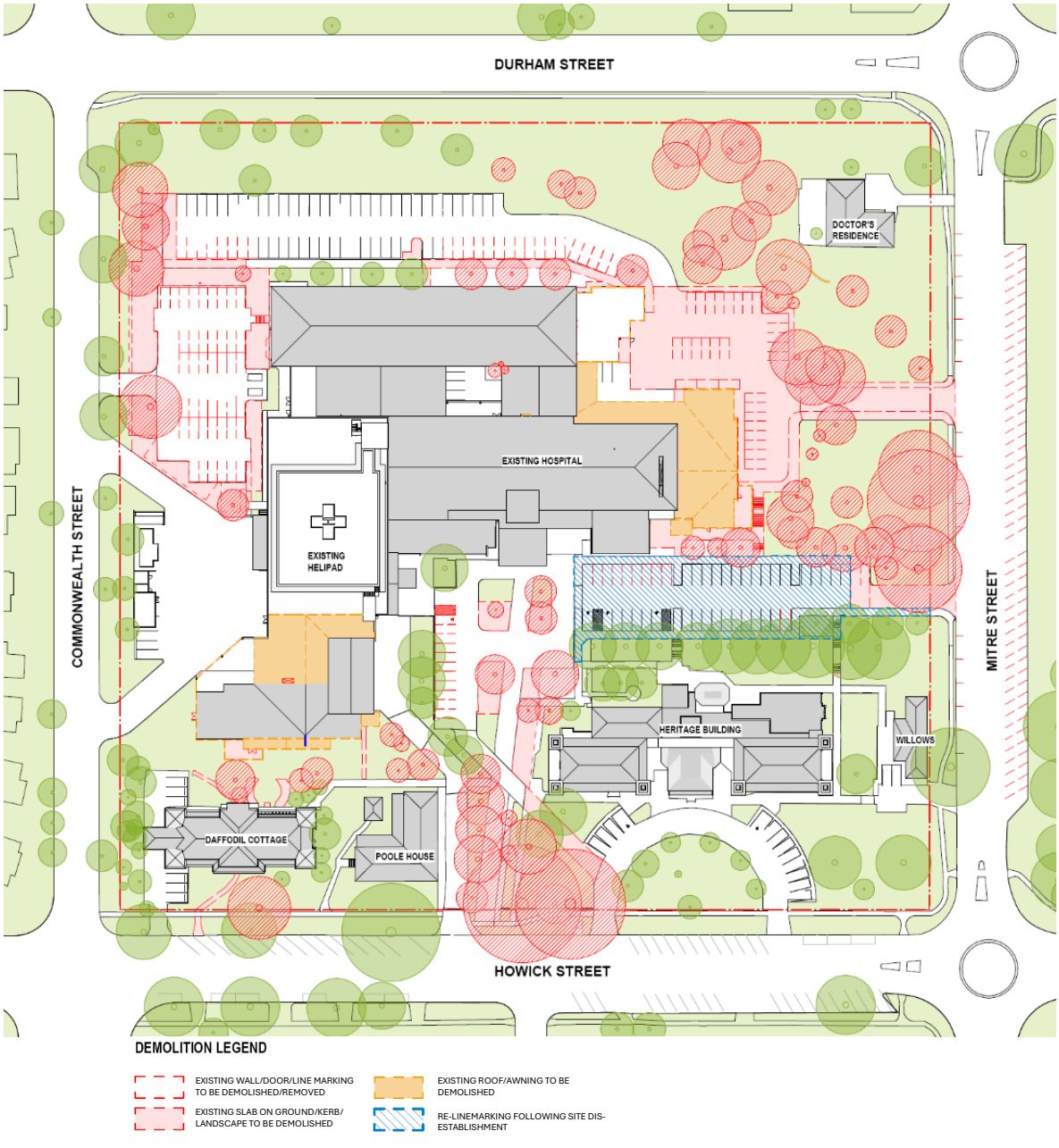

Figure 3 Proposed Demolition Plan (Source: BLP BHR-BLP-DRW-ARC-SSD-002-XX001 [C]).

Main Works Phase 0 - Enabling Works

1. Onsite parking upgrades
    - Connect existing parking zones and adjust linemarking
    - Upgrade Howick Street loop / existing vehicular entry to enable entry and exit onto Howick St

2. Services infrastructure including but not limited to:
    - Existing L01 plant room to be relocated prior to demolition (Downtime to existing L02 Ambulatory Care and L03 Community Health services. Mechanical engineer's report for further details.)
    - New Fire isolated corridor to existing stair 4

3. Decant Integrated Community Mental Health Drug and Alcohol Services
    - Temporary demountable in Fleet Parking zone
    - Slab, structure and roof to be demolished

4. Decant Mental Health Inpatient Unit (Panorama Clinic)
    - Mental Health IPU (Panorama Clinic)
    - Slab, structure and roof to remain

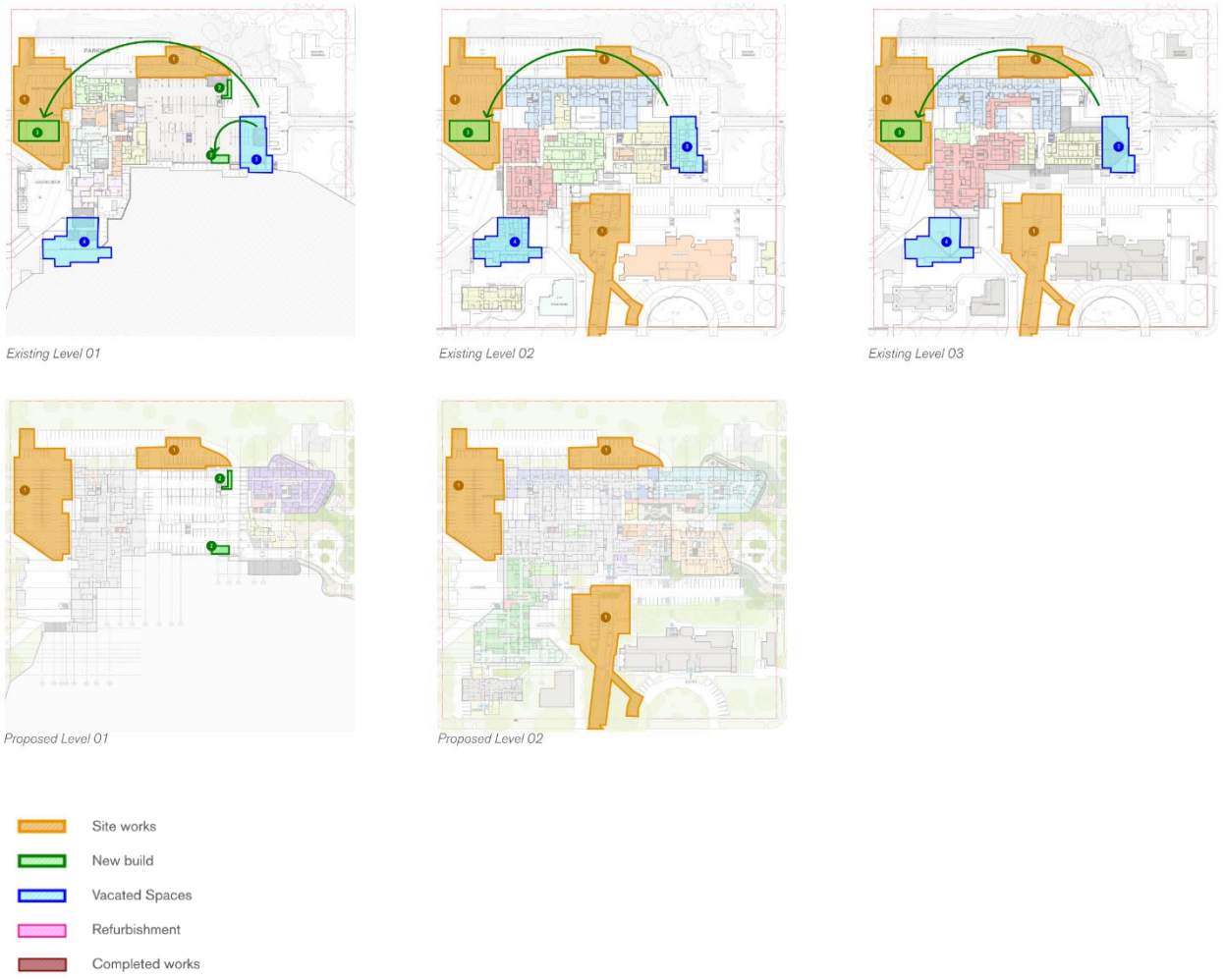

Figure 4 Early Works including decant (source: BLP)

Main Works Phase 1 – East and South Extension

Build East Extension (Mitre St) including but not limited to:

- L00 Community Mental Health
- L00 MH parking
- L01 New East Entry
- L01 Front of House
- L01 Mental Health IPU
- L01 Undercroft plant and parking
- L02 Rehab IPU
- L02 Outpatients, Ambulatory Care and Shared Areas
- L02 Public Courtyard (Displace existing rehab and paediatric gyms, will need to review temp location or alternative staging option)
- L02-L03 Hospital Street
- L03 Paediatrics IPU and Outpatients
- L03 Special Care Nursery
- L03 Maternity (review access to existing fire stire (Stair 4))
- L03 Community Health
- Roof top plant

Build South Extension including but not limited to:

- L01-L03 Egress stair
- L02 Emergency Department (impact on existing ambulance bay and driveway access)
- L03 Operating Theatre (and minor refurb for access to new build. Review tempoarry location required for impacted refurbishment zone).

Figure 5 East and South Extension (source: BLP)

- Roof top plant

3. Existing Hospital
   - New main switchboard in existing cafeteria.

4. Daffodil Cottage
   - L02 Cancer Care. (Consider alternative entry access from rear or side of cottage to avoid impact onto treatment zones, look at staging front and rear extensions).
   - Daffodil to ED external link

Main Works Phase 1 – Vacated Spaces

- L02 Rehab IPU
- L02 Outpatient Gyms
- L02 Ambulatory Care Areas
- L02 Cafe
- L02 Emergency Department
- L03 Paediatrics
- L03 Special Care Nursery
- L03 Operating Theatre (for future CSSD expansion)

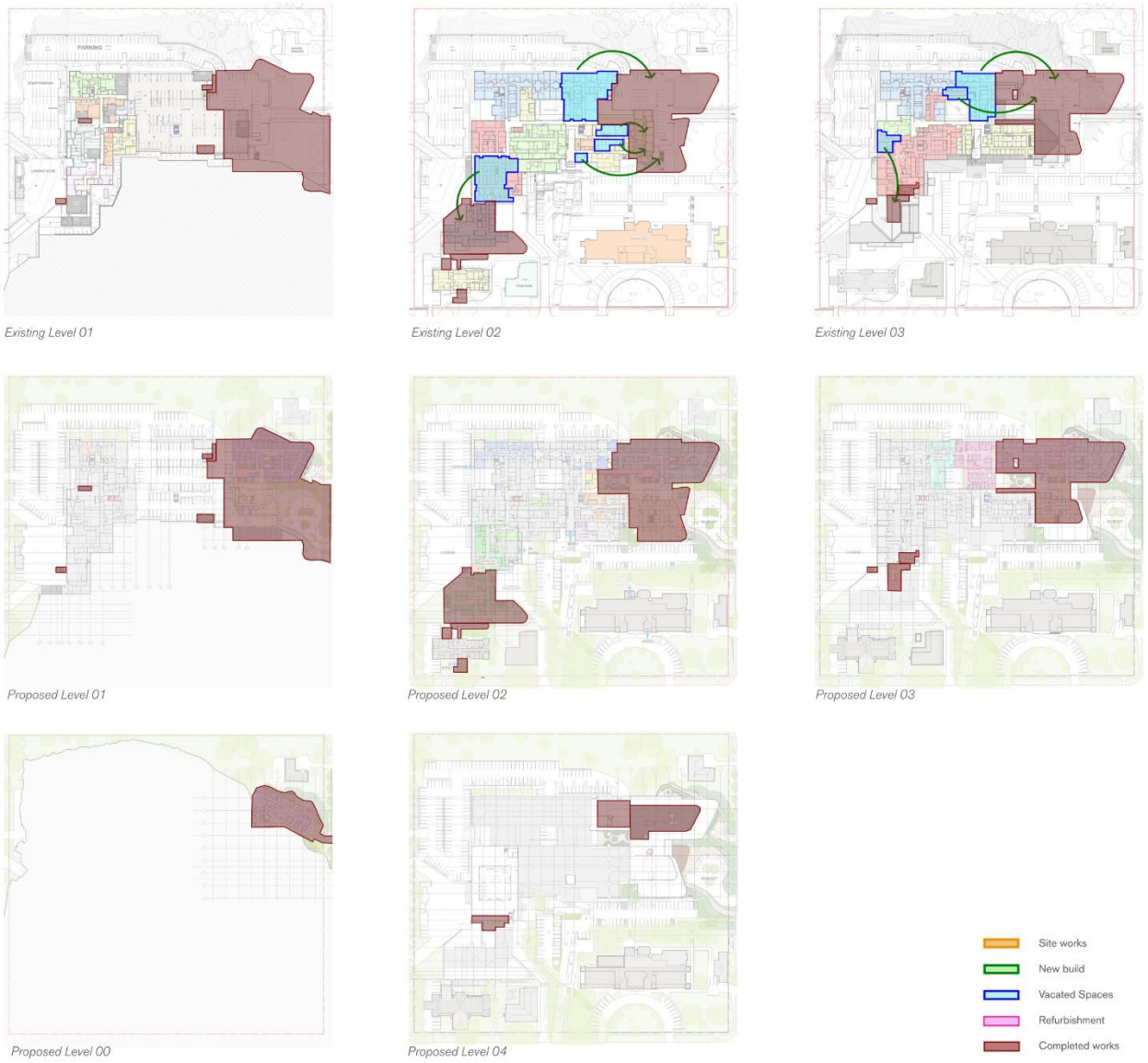

Figure 6 Level 02 and Level 03 vacated spaces (source: BLP)

Main Works Phase 2 – Refurbishment Level 02 and 3

Refurbish including but not limited to:

- L02 Medical IPU 1 & 2 (Medical IPU 2 to be completed first to minimise impact on bed numbers. Noting impact on existing 1 x 4 bedroom with no access to daylight. Option to use as for short stay patients (<23hrs).)
- L02 FOH Aboriginal Health Services
- L02 Pathology Specimen Collection
- L02 Satellite Pharmacy
- L02 Ambulatory Care
- L02 Fracture Clinic (Existing fracture clinic will need to be temporarily relocated.)
- L02 Emergency Department
- L02 Imaging (impacted rooms will need to be temporarily relocated.)
- L02 Cancer Care
- L03 Maternity and Birthing (Existing L03 Birthing and new Maternity IPU will be disolocated.)

Build:

- Discharge Lounge extension
- L02 Back of House Link

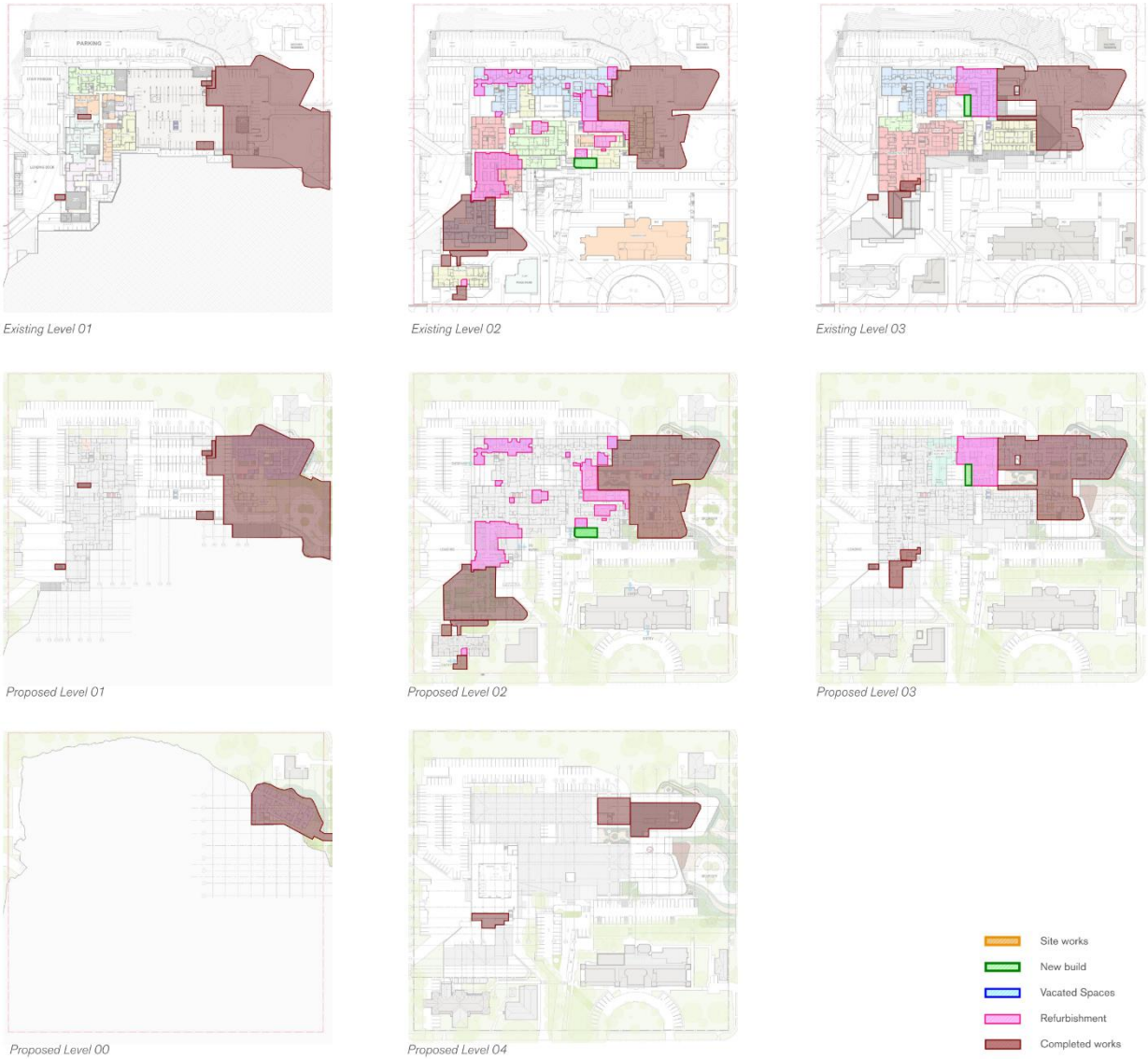

Figure 7 Refurbishment to Level 02 and 03 (source: BLP)

Main Works Phase 2 – Vacated Spaces

- L01 Pathology Collection Bays
- L02 Pharmacy Counter
- L03 Birthing

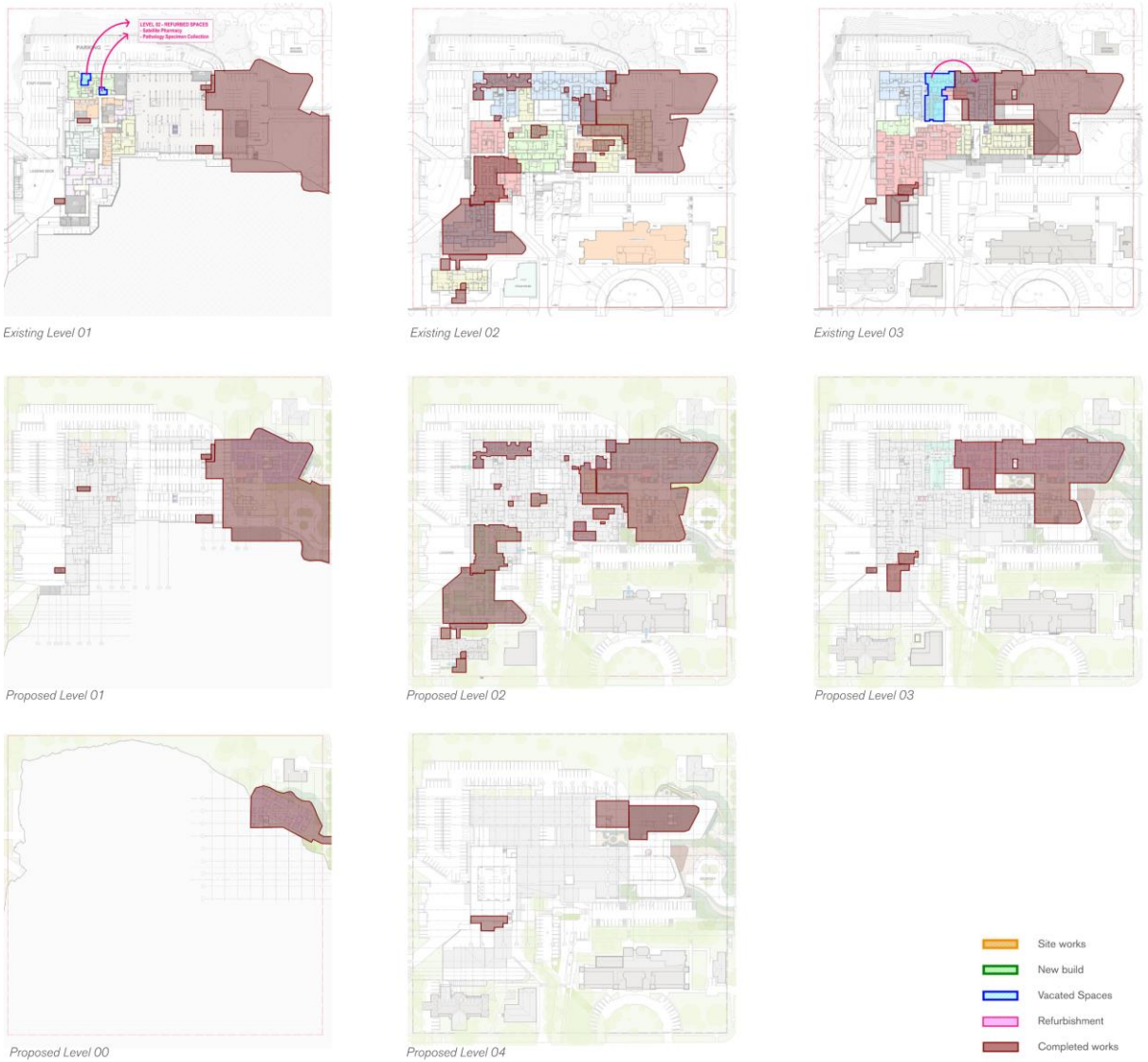

Figure 8 Vacated spaces. (Source: BLP)

Main Works Phase 3 – Refurbishment Level 01 and Level 03

Refurbish

- L01 Pathology Lab (impact on existing pneumatic tube system)
- L01 Pharmacy
- L03 Short Stay Surgical Unit (impact on existing L2 Renal Unit and Medical IPU 1 below (approx. 4-8 week window)).

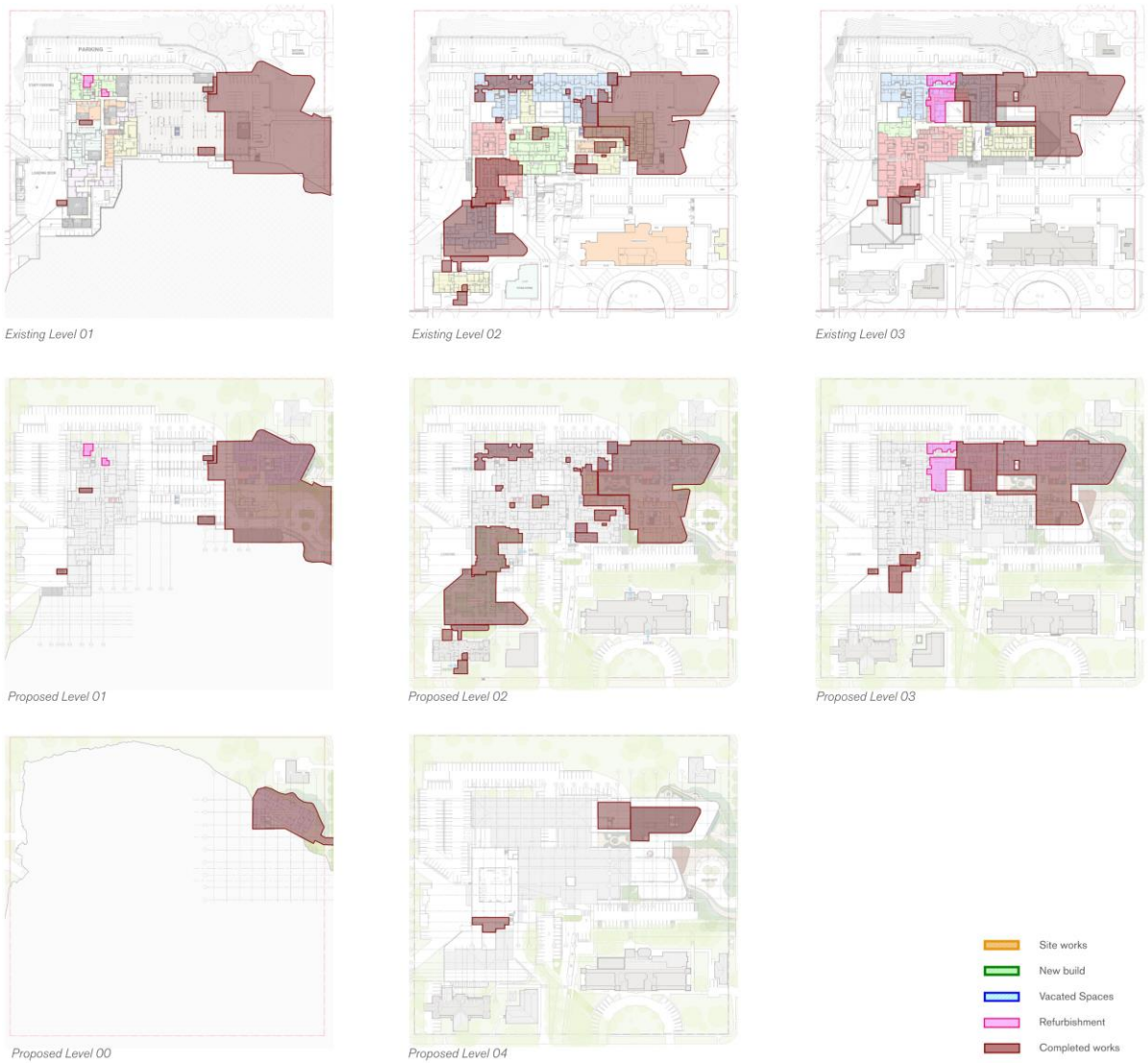

Figure 9 Refurbishment to Level 01 and Level 03 (source: BLP)

7. Traffic Management

Note: This section is to be read in conjunction with the Construction Traffic Management Plan prepared by TTW Traffic Engineering. As part of the Construction Management Plan, the Contractor will be required to submit a Traffic and Pedestrian Management Plan (TMP) for approval prior to commencement of the works.

7.1 Construction Entry and Exit

Generally, construction vehicles will have origins and destinations from a wide variety of locations throughout the area. However, all construction vehicles will be restricted to the arterial road network, where possible. As such, dedicated construction vehicle routes have been developed with the aim to provide the shortest distances to/from the arterial road network, whilst minimising the impact of construction traffic on the local road network in the vicinity of the site.

Alternative routes would not be used without specific prior approval from the appropriate stakeholders The potential construction vehicle routes are shown in Figure 10 and 11 and include:

- **Construction access during all phases** will be via Commonwealth Street, Howick Street, and Mitre Street.

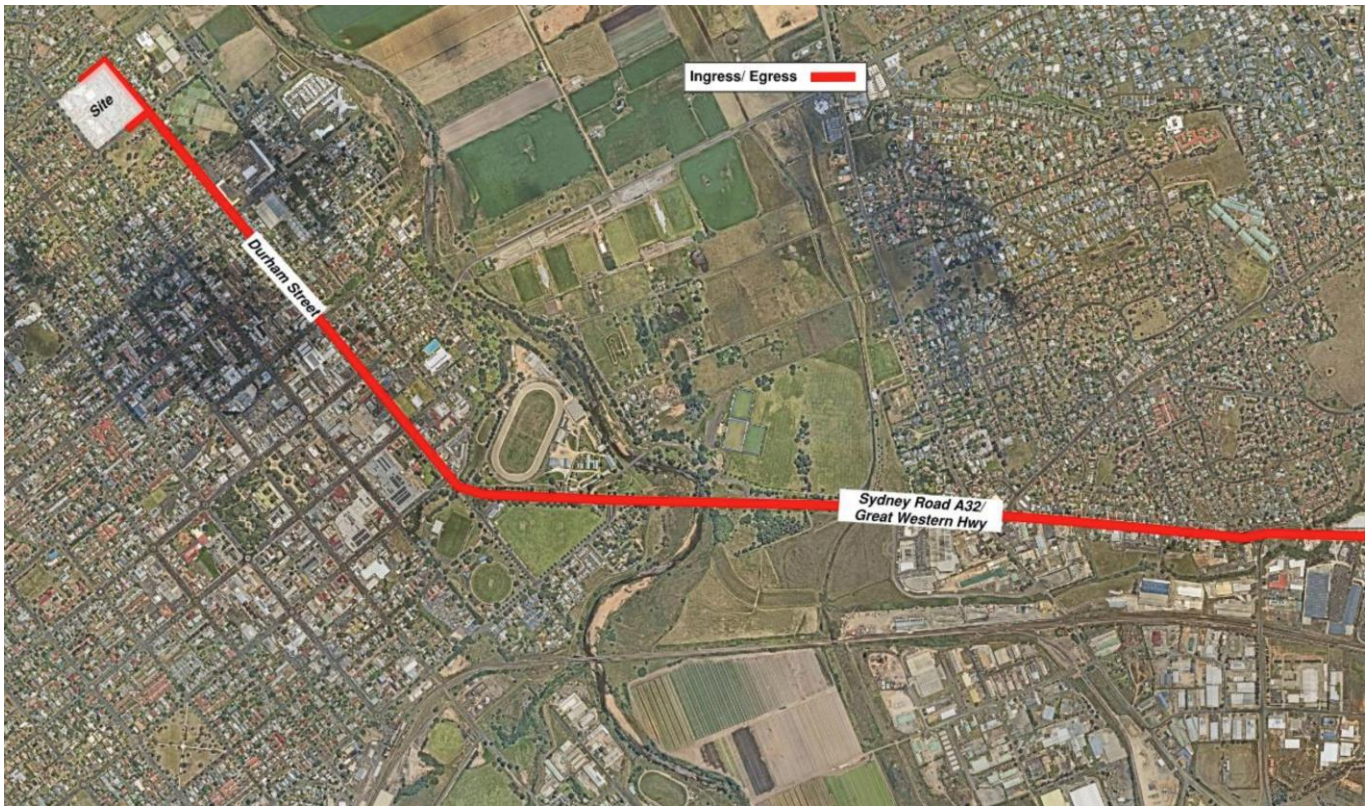

Figure 10 Construction Traffic Routes - East

Figure 11 Construction Traffic Routes - West & South

Specific details of the site access arrangements will need to be developed in conjunction with the appointed contractor and their construction methodology. The selected construction vehicle access would need to allow for all vehicles to enter and exit the site in a forward direction and would need to minimise any vehicle queuing on surrounding roads, which could affect emergency vehicle access or the precinct traffic operations.

7.2 Construction worker and vehicle numbers

The numbers of construction personnel onsite will fluctuate dependant on the stage of the works. It is expected approximately 300 additional jobs will be created during the construction phase. At present the peak personnel per day is 620. The Principal Contractor will be required to undertake an analysis of the required construction workforce in accordance with the noise, traffic and physical distancing requirements at all stages of construction, this will be incorporated within the Detailed Construction Management Plan (DCMP).

The estimated generation of heavy vehicle traffic during the construction of the Main Works will be confirmed by the Principal Contractor and detailed within their finalised DCMP, however vehicle movements would likely be spread across the day and would include vehicles such as a concrete, articulated haul or delivery trucks.

7.3 Traffic Management

The Bathurst Hospital Redevelopment Traffic consultant, TTW, have developed an initial Construction Traffic Management Plan (CTMP) in line with the project specific requirements. This is included in the Traffic Impact Assessment (TIA) report included in this REF Application and should be read in conjunction to this PCMP.

7.3.1 Traffic and Pedestrian Management Plan

Prior to construction works commencing, the Principal Contractor will develop a Construction Pedestrian and Traffic Management Plan which will detail how traffic, pedestrian and cyclist access will be managed during the construction works.

Traffic flows and vehicle/pedestrian separation are a major consideration, and pedestrian routes are to be maintained throughout construction. Traffic control personnel will be provided by the Principal Contractor during operating hours, or as advised by the Principal Contractor within their Construction Pedestrian and Traffic Management Plan.

Key issues for traffic, pedestrian and cyclist management during construction to be considered in the Construction Pedestrian and Traffic and Management Plan include, but is not limited to:

- Provide safe and uninterrupted access for pedestrians and vehicles accessing the construction site, hospital site;
- Ensure maximum safety of site personnel, pedestrians, cyclists, commuters, and drivers;
- Minimise environmental nuisance and impact as a result of construction traffic;
- Ensure construction traffic does not unduly interrupt existing traffic flows on the local road network;
- Safe operation of buses and other transport services during construction in adjacent roads;
- Have no vehicles arrive at the site, without prior arrangement, outside the approved working hours;
- Encourage site workers to utilise local public transport system and car sharing wherever possible;
- Timely and effective implementation of traffic management measures;
- Maintain access at all times for hospital and stakeholder's deliveries.

Pedestrian and vehicular movements into and around the site will be maintained, or alternate routes determined where necessary, and be defined by clear signage. Where necessary, physical traffic management personnel will be used to guide pedestrians and vehicles safely.

Temporary hoarding appropriate to the interaction between pedestrians and construction works (as per relevant codes and standards) will be constructed to prevent unauthorised access to the construction site. These hoardings and fences may be staged to allow for appropriate construction methodologies to be planned.

Deliveries to within the site will be managed through the existing road within the hospital as agreed with the Project Manager and WNSWLHD. Relevant management controls to be implemented as required.

Materials will be staged and stored in such a way to promote a clear and safe work site. At all times, materials are to be stored safely within the work area or site compound. While loading and unloading vehicles, it will be clearly stated that vehicles must not obstruct roads, driveways, and paths of egress from surrounding buildings or fire protection equipment.

7.4 Heavy Vehicle Access and Parking

The CTMP outlines the anticipated construction vehicle routes to/ from the site, with the aim of minimising the impact of construction traffic on roads near the site. All loading is expected to take place within the bounds of the site. Traffic controllers will be employed to manage construction vehicle movements in and out of the site.

7.5 Construction Worker Parking Strategy

The Overview CTMP outlines the anticipated construction staff parking and traffic strategy. The contractor will be

responsible for providing an off-site parking solution. The site is highlight constrained with limited space to provide on-site parking for construction workers and construction worker vehicles will not be permitted to park on local streets surrounding the hospital. Construction worker parking will be permitted on Morrisset street.

8. Waste Management

8.1 Waste Management and Recycling Principles

A Construction and Operational Waste Management Plan has been prepared in conjunction with this REF by Encycle.

The Contractor will be required to recycle and reuse materials where possible. The contractor will be required to arrange for the sorting and recycling of waste materials and packaging to ensure maximum recycling is achieved. The contractor will be committed to achieving compliance with the EPA guidelines.

Dangerous goods (such as petrol, diesel, oxy-acetylene, oils etc.) will be stored in a lockable compound with sufficient ventilation, bunding, hard surface and located away from waterways and drains in accordance with relevant codes of practice and standards. Material safety data sheets on all of these flammable and potentially harmful liquids will be provided by the contractor undertaking the Works.

9. Services

9.1 Services Diversions

During the works, should any services diversions require to be undertaken, the following principles are to be followed:

- Any required services diversions/disruptions will be undertaken with full coordination, development and input with relevant Project Management, HI, WNSWLHD, Downer and authority stakeholders and will only proceed with approval, via a Disruption Notice process and appropriate consultation with the relevant service providers.
- Impacts on the hospital will be minimised, which may result in 'Out of Hours' work.
- At all-times, provision of safe patient care will be paramount and staff and visitor safety, access and security maintained.

9.2 Infrastructure Requirements and Utilities

9.2.1 Stormwater, Potable Water and Sewerage Infrastructure

- Bathurst Regional Council is the authority for the potable water supply, sewerage and storm water. No extension/upgrade to the existing infrastructure are planned as part of the proposed development. Further information on the Stormwater system of the proposed development can be found in the Civil Design and Water Management Plan prepared by Taylor Thomson Whitting (TTW).
- Consultation with Bathurst Regional Council have confirmed no upgrade to connection points will be required if the current site network is in agreement with the survey conducted by Usher and Co. While upgrades are not expected to be required, should design finalisation conducted by the Contractor deem this necessary, the connection point upgrade work will be at the project's expense.

9.2.2 Electricity Infrastructure

- The two substations and high voltage reticulation are owned and maintained by power supply authority servicing the area (Essential Energy). The serviceability of the assets is monitored by Essential Energy and appropriate action is taken for any upgrades or maintenance that may be required.

- Both existing substations have been deemed suitable to supply the proposed development and no changes to the substations or any high voltage reticulation will form part of the proposed development.

9.2.3 Telecommunication Infrastructure

- No upgrade has been deemed necessary for the existing telecommunications infrastructure to support the proposed development.

10. Conclusions

Project Stage *Design (D) Construction (C) Operation (O)*	Mitigation Measures	Relevant Section of Report
C	*The hours of demolition or construction including delivery of materials to and from the site shall be restricted to between:* • *Monday to Friday inclusive 7.00am to 6.00pm.* • *Saturday 8:00am – 1:00pm* • *No work permitted on Sundays and Public Holidays*	*Section 4.2*
C	*Contractor to provide and adhere to project Construction Noise and Vibration Management Plan*	Section 5.7
C	*Separate construction areas of work from the public, hospital staff and visitors. Where there is a cross-over, this will be managed to ensure safety of all persons and equipment.*	Section 4.3
C	*From the commencement of construction until completion, the Principal Contractor will be required to maintain a community liaison officer on the project.*	Section 4.7
C	*Contractor undertaking the Works will be required to submit for approval a comprehensive Environmental Management Plan (EMP)*	Section 5.4
C	*Prior to construction works commencing, the Principal Contractor to develop a Construction Pedestrian and Traffic Management Plan detailing how traffic, pedestrian and cyclist access will be managed during construction*	Section 7.3.1
C	*A preliminary Staging and Decanting Strategy has been developed in consultation with key project stakeholders including representation from WNSWLHD, HI, TSA Riley, BLP Architects and other members of the design team as needed. The Main Works contractor will develop the final Staging and Decanting Strategy in consultation with stakeholders.*	Section 6.1


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