

Hassell

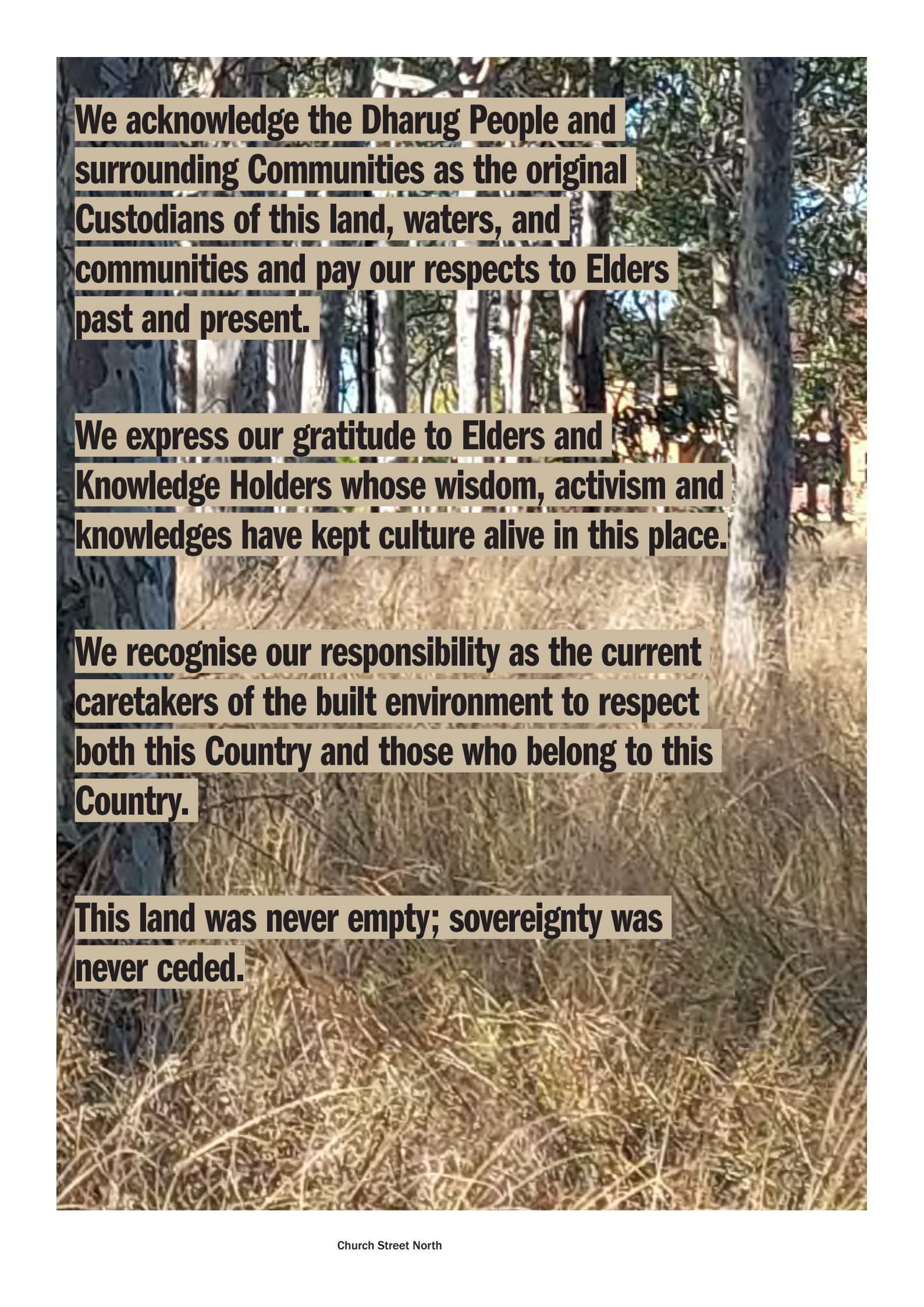
CHURCH STREET NORTH URBAN DESIGN STUDY



Church Street North
016770

Prepared for
NSW Department of Planning and Environment

Hassell ©
November, 2023



We acknowledge the Dharug People and surrounding Communities as the original Custodians of this land, waters, and communities and pay our respects to Elders past and present.

We express our gratitude to Elders and Knowledge Holders whose wisdom, activism and knowledges have kept culture alive in this place.

We recognise our responsibility as the current caretakers of the built environment to respect both this Country and those who belong to this Country.

This land was never empty; sovereignty was never ceded.



J Djinjama



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INTRODUCTION





Evolving as one

"These were templates, 'open ground where the Kangaroo frequent', with good soil and grass, water spaced trees and little undergrowth." Bill Gammage, 1942, *The biggest estate on earth: how Aborigines made Australia*



Carrington Scar Tree.
Warren Meyers



Cultural burning at Nangak Tamboree.
La Trobe University



Axe grinding stone.
Hilton Naden



The name 'Parramatta' is thought to be derived from the Aboriginal word for 'place where the eels lie down' to breed. The place now known as Parramatta is home to the Burramatugal people, who have been living on and managing the land for thousands of years. Generations of land management created the conditions of the landscape so desirable for the British, with its rolling grassy hills, devoid of the heavy brush that was typical of the Sydney Harbour area

Project overview

Project overview

The NSW Department of Planning and Environment (DPE) has engaged a multi-disciplinary team to help inform the rezoning of the area identified as the Church Street North precinct. The project team includes:

- Hassell: Urban design
- Djinjama: Design with Country
- GHD: Social infrastructure
- Extent Heritage: European heritage
- Atlas Economics: Economic feasibility

The objective of the Urban Design Study is to review the potential changes to the Height of Buildings (HOB) and Floor Space Ratio (FSR) controls previously exhibited in the Parramatta CBD planning proposal (CBD PP). The scope of the review includes:

- built form testing of the CBD PP and alternative HOB and FSR scenarios
- consideration of potential impacts to amenity, heritage and the environment
- opportunities to support the delivery of housing in line with the priorities of Government and investment in the Parramatta Light rail
- approaches to simplify FSR and HOB map controls across the precinct.

Approach and how to read this report

PART 1

The project team worked collaboratively to develop an understanding of Country, the values of the Place, the needs of existing and potential future communities, and opportunities for development to deliver positive place outcomes. This analysis is presented in PART 1, divided into four themes:

- Landscape and Environment
- Community and Liveability
- Heritage and Character
- Activation and Revitalisation

The analysis and resulting design considerations were presented to Government stakeholders and further refined based on feedback received.

A summary of the refined design considerations is provided at the end of PART 1. While these may not be as relevant in considering HOB and FSR for the precinct, they are provided as potential considerations for future detailed design/planning for the area.

PART 2

Part 2 discusses the outcomes of the modelling of potential development under the CBD PP controls and alternative HOB and FSR scenarios undertaken by Hassell. The work was reviewed by the broader project team.

The studies and Public Domain

Framework included in the CBD PP did not state place-specific objectives that informed the HOB and FSR proposed for North Parramatta.

The scenarios modelled were thus reviewed taking into account:

- objectives of the CBD PP
- the design considerations and place opportunities identified in PART 1
- development potential
- potential impacts of development, including cumulative impacts to the place values identified.

Recommendations for certain changes to the proposed HOB and FSR controls are provided (within the framework set by the proposal already exhibited) where an improved balance of design, heritage, environmental and development outcomes could be achieved.

The built form modelling has been developed at a high level, intended to inform the assessment of the CBD PP, and it is not a masterplan or design vision for the area. It has not considered or tested all constraints in detail e.g. flooding, ecology, soil, heritage, archaeology, overshadowing of adjoining properties and traffic impacts. These are important considerations that could impact built form outcomes and the development potential of individual sites.

This study does not constitute a complete Design with Country process. Certain steps such as further consultation with First Nations' knowledge holders are not included in this scope.

Study Area



Focus area for changes to HOB & FSR controls

Within the Church Street North precinct, the area where potential changes to HOB and FSR are being considered sits within the broader Parramatta CBD area as indicated in the map.

South of Victoria Road, the focus area extends to the Parramatta River which is of high cultural and historical significance and key to the identity of the emerging Central River City. This area contains and is surrounded by Parramatta's existing and emerging landmarks including the expanding Riverside Theatres, St Patrick's Cathedral, (former) St Peter's Church and the All Saints' Church that remain prominent in the skyline. Immediately across from Sorrell Street sits the new civic and cultural link anchored by the future Museum of Applied Arts & Sciences (MAAS, part of the Powerhouse Parramatta precinct).

North of Victoria Road, the focus area sits within a sensitive heritage context. It is dotted with heritage listed items and contributory buildings, flanked by Prince Alfred Square, the site of Australia's first female factory, as well as the Sorrell Street and North Parramatta Heritage Conservation Areas.

The Parramatta CBD Planning Proposal

The Parramatta CBD Planning Proposal (CBD PP) was initiated by the City of Parramatta Council to create a world-class CBD for Parramatta through 'an expanded and more intensely developed commercial core supported by higher density residential uses'.

The existing HOB and FSR controls for the Church Street North area vary significantly across sites. These reflect various considerations including previous rezoning of individual sites and built form transition to adjoining areas.

The CBD PP initially retained these limits as 'base' controls and introduced 'incentive' controls. Incentive HOB and FSR would be allowed subject to the amount of community benefit infrastructure, if any, provided by a development, up to the 'incentive' limits.

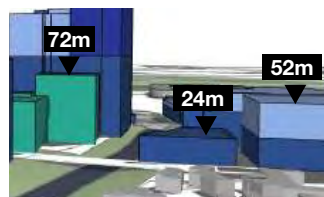
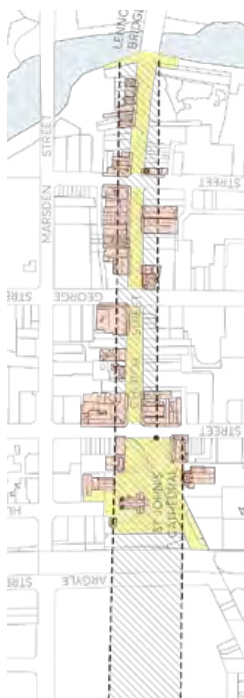
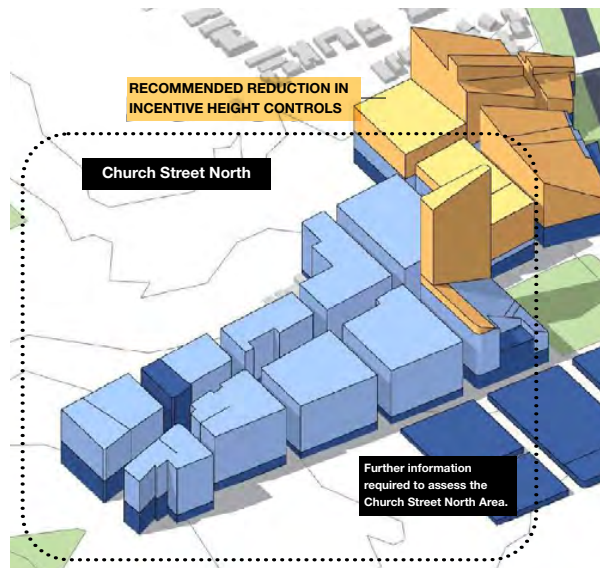
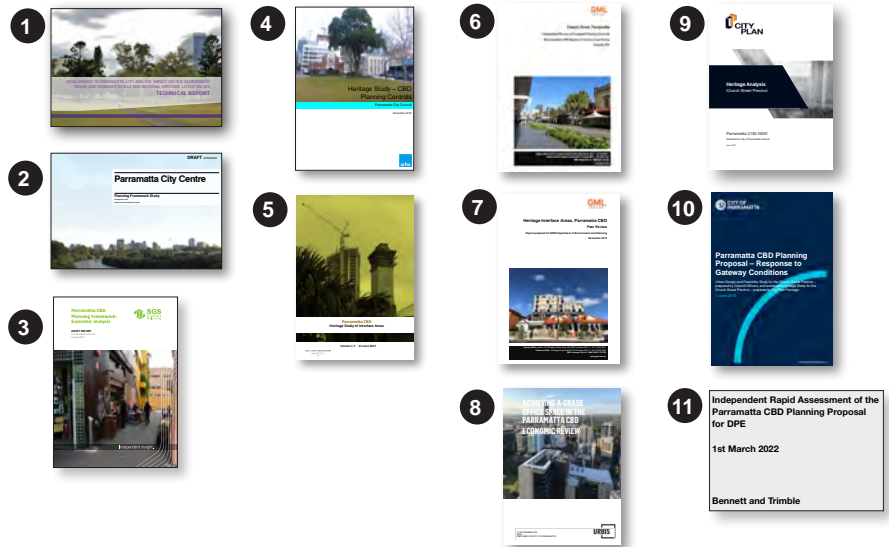
Upon refinement, the incentive limits were proposed as base controls, with further bonuses of 15% (FSR and HOB) for design competitions and 5% (FSR) for buildings of higher environmental performance. That could result in buildings over 50 storeys where HOB is only limited by the sun access requirements, or up to 29 storeys (including bonuses) where the 80m HOB limit applies.

Individual proposals for the areas outlined in black have since been decided and excluded from consideration.



Existing studies that informed the preparation and assessment of the CBD PP include:

1. *Development in Parramatta City and the Impact on the Old Government House and the Domain's World and National Heritage Listed values*, Planisphere, 2012
2. *Draft Parramatta City Centre Planning Framework Study*, Architectus, 2014
3. *Parramatta CBD Planning Framework: Economic Review*, SGS, 2014
4. *Heritage and Urban Design Study – CBD Planning Controls*, Urbis, 2015
5. *Study of Interface Areas*, Hector Abrahams, 2017
6. *Parramatta CBD Heritage Peer Review of Church St Precinct*, GML Heritage, 2018
7. *Parramatta CBD Heritage Peer Review of Interface Areas*, GML Heritage, 2018
8. *Achieving A-Grade Office Space in the Parramatta CBD - Economic Review*, Urbis, 2019
9. *Heritage Analysis, Church Street Precinct*, City Plan, 2019
10. *Urban Design and Feasibility Study for the Church Street Precinct*, Parramatta City Council, 2019
11. *Independent Rapid Assessment of the Parramatta CBD Proposal*, Bennett and Trimble, 2022



Source: Independent Rapid Assessment of the Parramatta CBD Planning Proposal by Bennett and Trimble for DPE

The Church Street southern sky-view corridor has been protected in the Parramatta CBD Development Control Plan

Existing studies

A 2014 study by Architectus (in draft with amendments reflecting a resolution by Council) was provided with the CBD PP. It sought to encourage tall, slim, well separated towers to allow sun penetration into public spaces and respond to the World Heritage settings of the Old Government House and the Domain.

A 2022 study by Bennett & Trimble informed first stage of the assessment process. It recommended height limits to protect the character and amenity of the riverfront, and that the area north of Victoria Road should be investigated in conjunction with adjoining areas.

Given the size of the CBD, studies were generally undertaken at a broader scale without modelling of potential resulting built form outcomes in each place to help inform the assessment of heritage, character and amenity impacts. Previous heritage studies were undertaken under the assumption of additional HOB/FSR being 'incentives' for community benefit, potentially not resulting in widespread uptake. There were diverging opinions about where incentives should apply. Yet consistent advice included limiting building heights in response to conservation areas and individual heritage items, and the retention of the N-S blue sky view corridor along Church Street, later implemented south of the river.

Acknowledging the significance, uniqueness and potential of North Parramatta

CBD PP Finalisation

The NSW Department of Planning and Environment (DPE), as the plan making authority, reviewed the CBD PP considering concerns raised in public submissions and key issues such as flooding, traffic, bulk and scale, public amenity, solar access, loss of blue-sky, wind tunnel effects, heritage and character.

For certain areas south of the Parramatta River, DPE progressed the CBD PP. It was made as Amendment No. 56 to the Parramatta Local Environmental Plan 2011 (LEP), commencing in October 2022.

The proposed changes to the area north of the Parramatta River were not supported by DPE. Potential issues identified included:

- The proposal may reduce the heritage fabric and character of Parramatta North and result in a general disruption between heritage items, views, and place character.
- Provision of uniform FSRs and building heights may result in homogeneous built forms where there is little building modulation, leading to a lack of interesting and varied development.
- Potential to deliver a wall of buildings along Church Street, separating the North Parramatta and Sorrel Street Heritage Conservation Areas.

- The proposed controls may result in a hard transition between the Church Street spine and the adjoining conservation areas, noting that Council's investigation into the future of these areas is ongoing and provides difficulty in understanding the surrounding context.
- The proposed sun access plane protecting half of Prince Alfred Square and the southern river foreshore from 12-2pm is insufficient and may lead to heights in excess of the adjoining land.
- The proposal may not be commensurate with the scale of the Parramatta River and may impact the natural, historical and cultural qualities of the river which is central to the identity of Parramatta and its place as the Central River City.

Collaborative Community Visioning Workshops

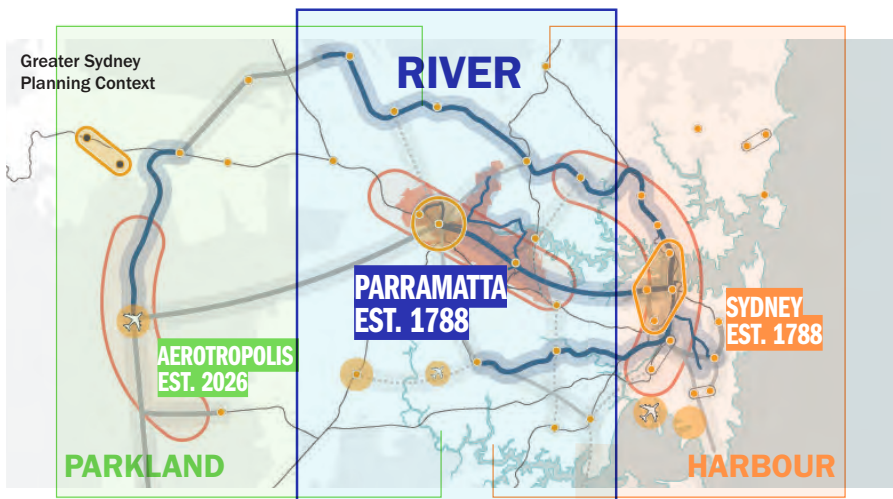
Community visioning workshops were held in December 2022. Key concerns identified included future development and its affect on heritage, a lack of facilities and amenities, traffic congestion and a lack of parking.

The potential benefits of the area's revitalisation were also acknowledged including an opportunity to celebrate and share the heritage, history and culture, enabling North Parramatta to become a lively, liveable precinct with economic growth, the creation of jobs and more local businesses.

According to the community, future planning for North Parramatta should ensure that:

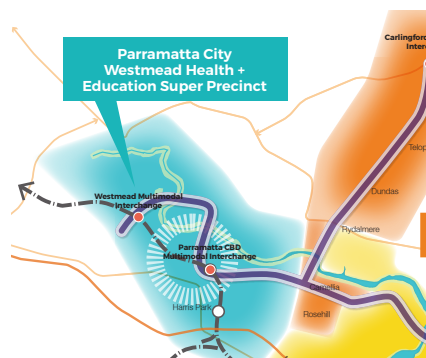
- Sense of community and diversity of people is retained.
- The precinct's unique heritage is protected and celebrated.
- New development is high quality, sustainable and sensitive to the heritage and context of the precinct.
- Infrastructure and facilities are developed and enhanced to support the current and future needs of the community.
- North Parramatta will be a key destination which attracts visitors due to its culture and heritage.

Further strategic challenges and opportunities



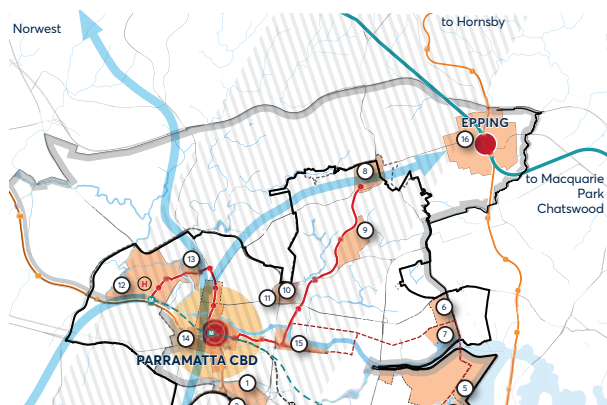
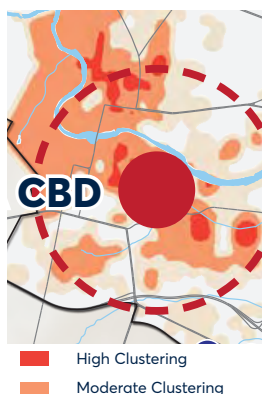
Centre of economic growth

The emerging Aerotropolis to the west positions Parramatta at the geographic centre of economic activity within the Sydney metropolitan area. Government policy has further focused on establishing Parramatta as a major CBD at the core of the Central River City. The Greater Parramatta to Olympic Peninsula is identified as a strategic corridor set to grow and change significantly over the next 20 years.



Innovation precinct around light rail

North Parramatta sits within the Parramatta City Westmead Health and Education Innovation Precinct that will be supported by new light rail along Church Street. The Northern CBD area has a key role connecting the business core to the emerging Parramatta North heritage and creative industries' hub.



A new local strategic framework

The City of Parramatta has updated its policy framework in consultation with the community and responding to strategic opportunities. It highlights the clustering of heritage items in the area and the importance of considering local character. It also advocates for mass transit links extending to the north through the precinct. Addressing Parramatta's growing vulnerability to climate change is identified as priority.

PART 1

CONTEXT

AND PLACE



ONLY

RIGHT
LANE

FORM
1
LANE

STONE







Looking West in Belmore Park

1 Landscape and Environment

1.1. Strategies and consultation: key outcomes

Analysis of the planning context and community collaboration has identified a series of outcomes relevant to Church Street North. These have been broken down into three categories at the regional and local level, together with key outcomes desired by the community. These are important considerations that should be taken into account while preparing development controls or during further planning and design for the precinct.

Regional



- Acknowledge the district's rich Aboriginal cultural and natural heritage that reinforces its sense of place and identity
- Make the River central and accessible, with new connections to make the river a public, and integral part of everyday life and activity across the city
- Recognise the opportunity for the River to contribute more to the identity of Parramatta including celebrating culture, heritage, connection to country, regeneration, biodiversity and open space
- Increase tree canopy and green cover across Greater Sydney
- Link parks, bushland, playgrounds, waterways with safe walking and cycling

Community



ALL DEVELOPMENT MUST CONTRIBUTE TO THE LESSENING IMPACT OF CLIMATE CHANGE

BIODIVERSITY TO BE PROTECTED. CONTINUOUS RESEARCH AND REGISTER OF NATIVE WILDLIFE

PHYSICAL RESPECT FOR INDIGENOUS ENVIRONMENTAL AND CULTURAL HERITAGE, INCLUDING LAND AS WELL AS ARTEFACTS

TREE COVER TO MANAGE 'HEAT SINK' PROBLEM

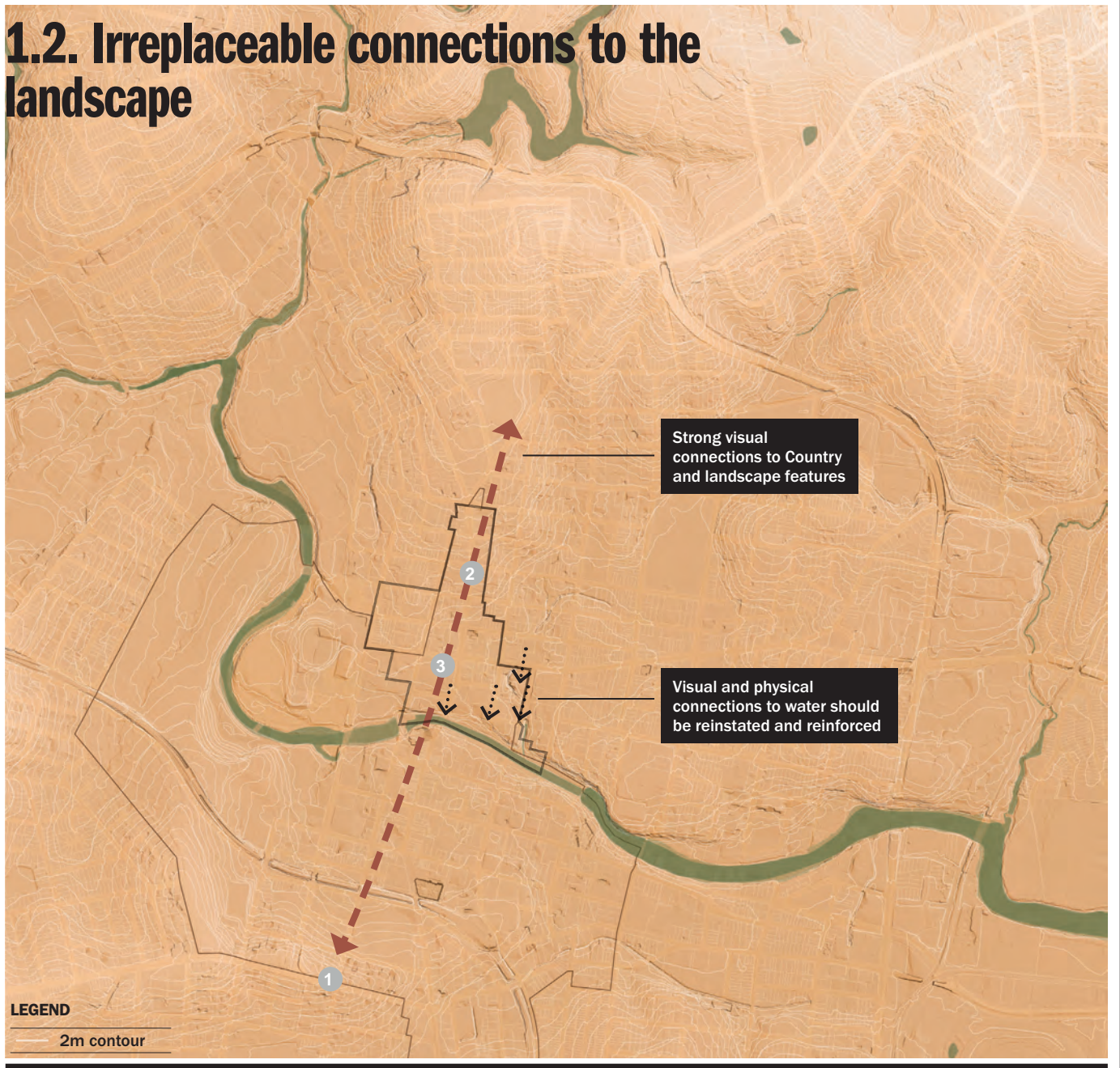
WORLD CLASS CITY, UNIQUELY PARRAMATTA AND INCORPORATES OUR CULTURAL LANDSCAPE, HISTORY AND SUSTAINABILITY

Local



- Protect and enhance our trees and green infrastructure to improve liveability and ecological health
- Protect and improve the health and swimmability of the Parramatta River, its waterways and catchment
- Prioritise connectivity to the river
- Increase resilience of people and infrastructure
- Reduce emissions and manage energy, water and waste
- The Parramatta River and bushland is a source of pride for the local community. Maintaining healthy bushland and river provides habitat for plants and animals as well as making the city a more enjoyable place to live
- Increase access to the river and its waterways through connected cycle and walkways. Activate the river for our community to enjoy
- Protect and increase canopy cover and vegetation across public and private land

1.2. Irreplaceable connections to the landscape



Connections to natural elements that define Burrumattagal Country and Parramatta's historical landscape character still remain. That includes the topography, views between the ridgelines, the blue-sky corridor along Church Street that extends south of the river, and the green vistas to the parks at each end.

These should be preserved and enhanced through built form that responds to the natural topography of the land and provides for framed views and vistas.



Images:

1. Parramatta Looking North, 1886, City of Parramatta Research & Collections
2. Church Street Looking South
3. Church Street Looking North
4. Existing development fronting the 'bitter water' area
5. Marsden Street weir, 1951. City of Parramatta
6. Construction of the David Frater Reserve, 1959. City of Parramatta
7. Houses on a hill in Parramatta. Painting by J.W. Lewin, G.P. Harris, G.W. Evans and others, 1796-1809. State Library of NSW

Visual and physical connectivity to the Parramatta River has diminished.

Existing development is built close to the river corridor, generally presenting a poor interface to the river. The public domain and access points leading to the riverfront are particularly unattractive. The river feels secondary to the city.

Future development near the river should be designed to provide additional public spaces, open up views and appropriately respond to the scale and significance of the river corridor.



Image: GoogleMaps



The section of the Parramatta River adjoining the Church Street North precinct is highly significant to First Nation's peoples. The 'bitter water' is associated to abundant resources and is where fresh and salt water peoples meet. Here the river landscape has seen the most significant levels of post-colonial intervention.

Waterways, both above and below ground are important. The Brickfield Creek (in the south east of the precinct) had a 'pool and riffle' form. It is now inaccessible running through concrete channels and pipes. Evidence of the creek's importance as a pathway is still seen as late as the 1960's. Development should minimise further intervention and re-integrate water and people with the natural landscape. Pemulwuy, a warrior symbol of resistance was said to 'disappear' through Parramatta's waterways.



1.3. Flooding

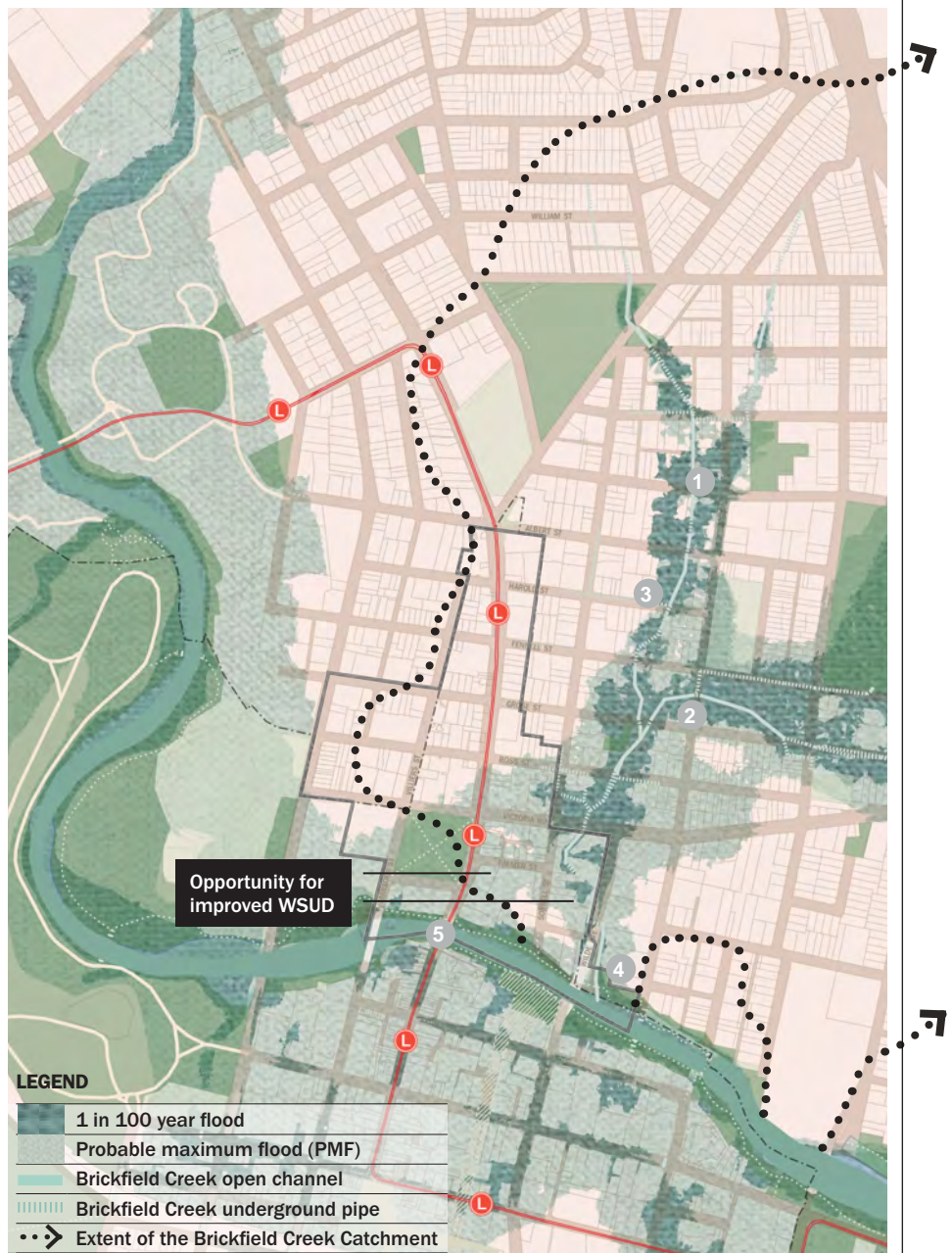
The study area sits almost entirely within the Brickfield Creek Catchment.

Stormwater and silt coming from the Brickfield Creek are major contributors to the significant flooding and water quality issues experienced in this section of the Parramatta River and further downstream.

The cumulative impact of development to the health of the Brickfield Creek Catchment and the Parramatta River should be carefully considered.

Recent development and development that occurred in the 1990's and 2000's has interfered with and/or redirected the flow of the creek. Flooding conditions in the area have also worsened over the same period.

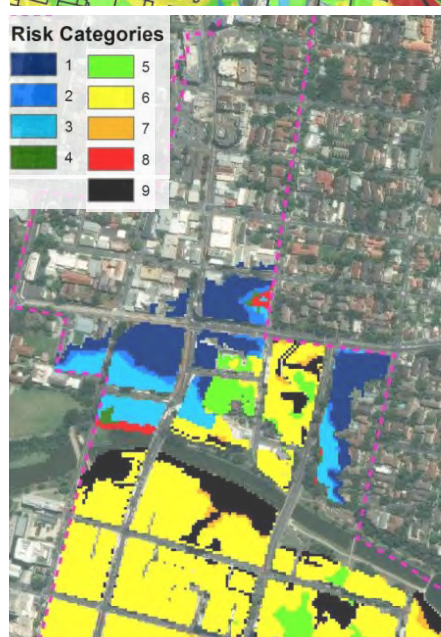
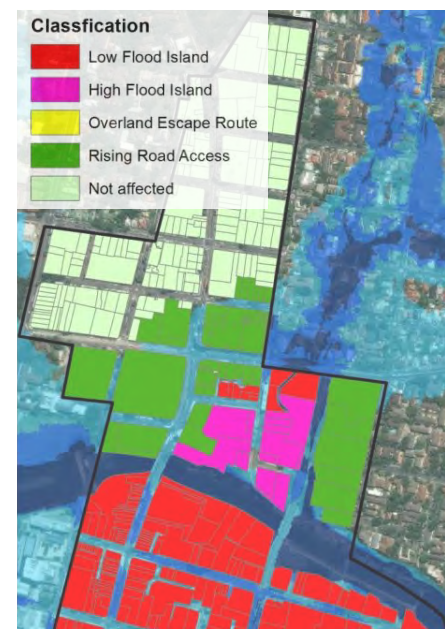
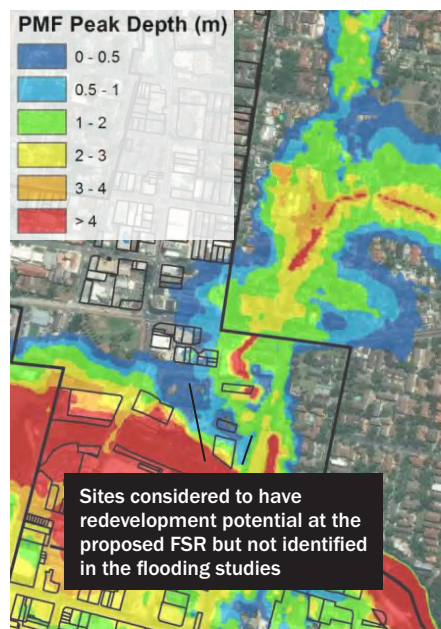
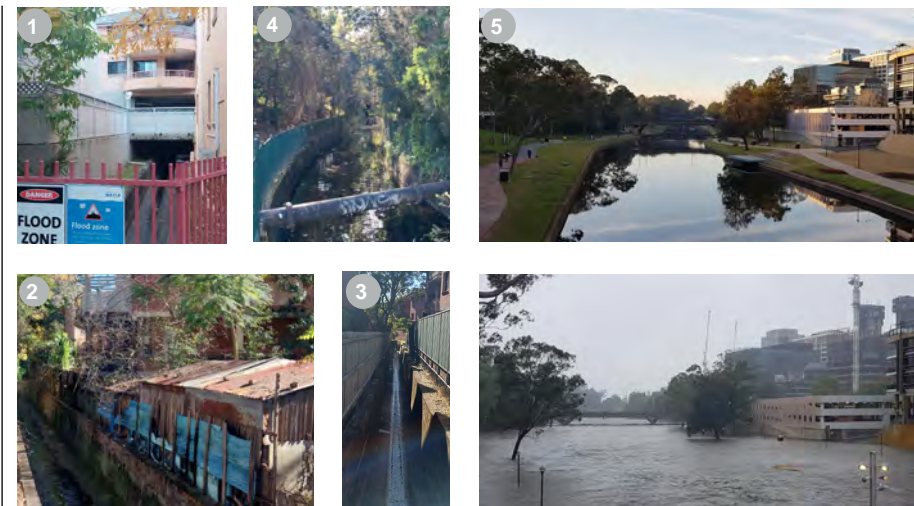
Future development should integrate Water Sustainable Urban Design (WSUD) and maximise opportunities to retain deep soil and improve flooding conditions.



Images:

1 to 4. Existing uses, including recent development, respond poorly to the water systems

5. Flooding of the Parramatta River, Daily Mail 20 March 2021



According to the studies prepared by Molino Stewart in 2017 and 2021, probable maximum flooding at peak depth would reach >4m in some areas. Sorrell Street, Lamont Street and Wilde Avenue have a concentration of sites ranked the highest in relation to risk to life due to flooding.

The worst affected blocks are over 200m long without pedestrian connections. Even though the flooding study did not identify potential development sites within those blocks (e.g. if the sites were in strata ownership), some of those sites have been consolidated and could have redevelopment potential.

A new flooding study is being exhibited by the City of Parramatta and will inform future flood management and mitigation. Consideration should be given as to whether the mitigation measures proposed would be effective if development is not coordinated through an integrated masterplan for all affected sites.

Flooding mitigation measures being adopted in the southern CBD such as half-basements, above ground parking and elevated walkways can have a significant impact on the character and experience of the streets, and should be developed in coordination with a WSUD and public domain strategy.

1.3. Vegetation and ecology

From the colonists' arrival, the land had been rapidly cleared of vegetation for farming and then small lot housing construction.

Remnant vegetation sits mostly outside of the study area and is limited to Parramatta Lake, Parramatta Park and pockets along the Parramatta River banks.

Non-human kin, previously abundant are rarely seen, except from paintings on the pavement.



Pedestrian path along the river. Hassell



Images:

1. View of part of the town of Parramatta, 1812, source: State Library of NSW
2. Endemic trees surrounding Lake Parramatta
3. Native species in Belmore Park
4. Threatened riverine ecosystem
5. & 6. Recent development has been damaging existing trees and/or does not provide conditions for canopy growth



With the exception of the Prince Alfred Square, the study area is almost completely devoid of vegetation in the public domain.

To the north of Victoria Road, trees were concentrated along Church Street and have been removed for the construction of the light rail tracks, with limited replanting.

Sorrell Street was until recently a tree-lined street along its full extent, connecting the riverfront and Belmore Park habitats. To the south of Victoria Road, tree removal due to development has disrupted this green corridor, with the remaining corridors located only within private land.

Along the side streets, the existing road reserves are unusually narrow. Development is currently allowed to be built to the lot line with balconies and/or awnings extending beyond the lot boundary. That has resulted in damage or removal of the remaining trees. Where trees have been replanted, these are mostly exotic species with minimal canopy cover and/or trees that have not been provided adequate conditions to grow to full mature size.

Preparation of a public domain strategy for the precinct is strongly encouraged. The strategy should include coordination of setbacks, awnings, succession tree planting with endemic species, footpath surfaces, street furniture and lighting to unify the area around a character that is uniquely North Parramatta.

1.4. Trees, land cover and urban heat

Tree Cover

Reinstating of indigenous species on public spaces has occurred from the 1940's, taking years to regrow.

It is the tall indigenous trees that provide the consistent green backdrop that can be seen from various places and is key to the unique identity of North Parramatta.

Most of those trees are located in private property forming significant corridors and/or groups that may be lost to redevelopment.

Future development should prioritise tree retention and de-fragmentation of vegetation corridors.






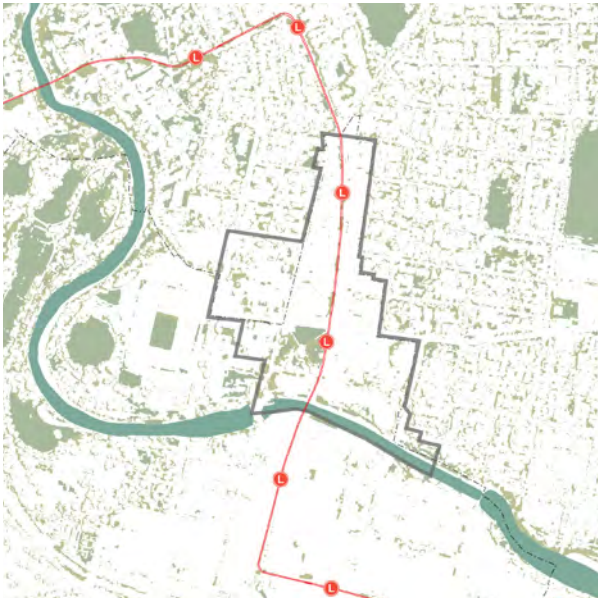
St. Patrick's Cemetery and Belmore Park. Sixmaps



Permeable surface cover




As trees may grow through tree pits on paved surfaces, grass and shrub coverage provide a good indication of the lack of permeable surfaces in the precinct.

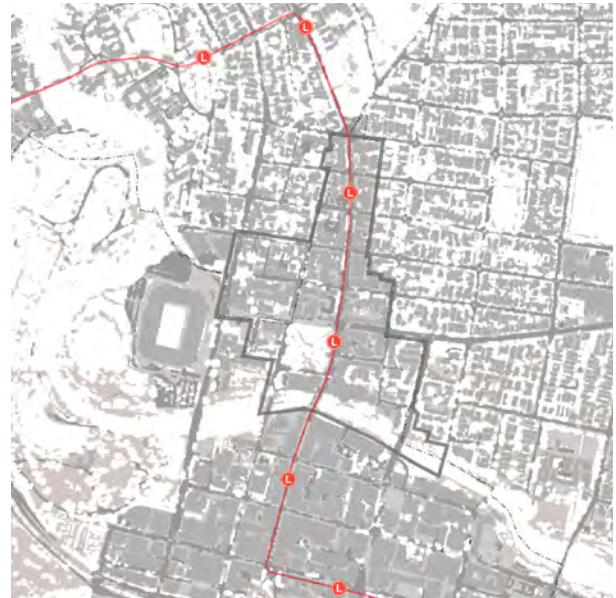
	Grass
	Shrubs, vegetation
	Water



Impermeable surface cover






There is a significant amount of impermeable surfaces, particularly at grade parking. Various existing mixed use developments do not appear to have provided deep soil.

	Building footprint
	Road and path
	Built-up areas



Canopy cover distribution





There is low canopy cover overall and significant deficit along Church Street and side streets to the west.

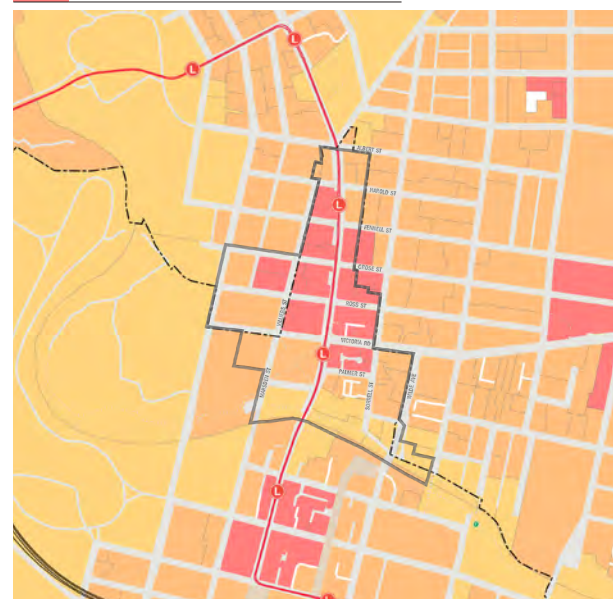
	Less than 10%
	10 to 20%
	20 to 30%
	30 to 40%
	More than 40%



Urban heat island

A large area within the precinct reaches temperatures > 9° warmer than baseline. The extent of this area is significantly larger than the areas in the southern CBD and in other Sydney centres that experience similar extreme temperatures.

	0-3° warmer than baseline
	3-6° warmer than baseline
	6-9° warmer than baseline
	>9° warmer than baseline





Prince Alfred Square. Hassell image.

2 Community and Liveability

2.1. Strategies and consultation: key outcomes

Analysis of the planning context and community collaboration has identified a series of outcomes relevant to Church Street North. These have been broken into three categories at the regional and local level, together with key outcomes desired by the community. These are important considerations that should be taken into account while preparing development controls or during further planning and design for the precinct.

Regional



- Cluster social infrastructure in metropolitan and strategic centres with public transport
- Flexible designs and shared use (schools, sportsgrounds)
- Improve efficiency and service quality through co-location and divestment of legacy assets
- High density > 60 dwellings/ha to be within 200m of open spaces that are durable, multipurpose and accessible to a wide variety of users
- Embed infrastructure that supports active and healthy lifestyles in urban renewal projects
- Provide transport connections to schools and health services, public, civic and green spaces. Access to these services is convenient
- Protection of local character
- Inclusive playspaces for people to enjoy

Community



CURRENT NEEDS ADDRESSED AND FUTURE NEEDS MET

A PLACE THAT EMBRACES THE MIXED DEMOGRAPHIC AND DENSITY

MORE CIVIC AND COMMUNITY SPACES, MUSEUMS, GALLERIES AND PUBLIC ART FACILITIES

POOR EXISTING INFRASTRUCTURE, LACK OF FACILITIES

MORE GREEN, OPEN SPACES, VEGETATION

Local



- Parramatta has a strong diversity of cultures. A sense of community is one of the City's greatest strengths, and fundamental to its identity
- The City's existing community infrastructure is highly valued by the community but nearing or reaching capacity
- People within the community face barriers to participation and there are gaps in provision of social infrastructure
- The increasing land value across CoP means that opportunities to purchase additional land or buildings for community infrastructure provision are limited
- Maintaining a healthy bushland and river makes the city a more enjoyable place to live, rest and play

2.2 The local community

by GHD

An analysis of the 2021 Census data was undertaken to understand the current characteristics of residential communities in the local study area compared to the regional study area (Parramatta LGA). A total of 21 Statistical Area Level 1 areas were combined and analysed. These areas cover both the Church Street North area and surrounding blocks with a radius of up to 400m to understand community characteristics of the precinct and surrounding population, potential users of social infrastructure

Across the precinct there is a high proportion of young professionals and career and homebuilding people (25 to 49 years).

There are high levels of cultural and linguistic diversity with a high proportion of people who were born overseas and speak a language other than English at home. Consideration should be given to a range social infrastructure that support diversity and cultural inclusion.

In 2021, there was a higher proportion of lone person and group households within the precinct compared to Parramatta LGA.

A high proportion of people live in apartments, indicating a likely higher demand for accessible and quality open space and community facilities due to limited outdoor and community-based facilities located within apartment complexes.

The majority of people in the precinct rent, a significantly higher proportion compared to Parramatta LGA.

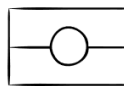


35 years was the median age in the local study area which was the same as Parramatta LGA.



69.2%

of people have lived at the same address as a year ago compared to 75.9% in Parramatta LGA



72 persons or 0.9% identified as Aboriginal or Torres Strait Islander compared to 2,079 persons or 0.8% in Parramatta LGA.



25.9%

of households in North Parramatta (SA2) experience rental stress.



58.0% speak another language at home compared to 56.4% in Parramatta LGA.



88.4%

of all private dwellings are occupied compared to 89.9% in Parramatta LGA.



10.5% of all migrants entering Greater Sydney resided in Parramatta LGA between 2012 and 2016.



7.4%

of people rent social housing in North Parramatta (SA2).



4.3%

of people require assistance with core activities compared to 1.8% in Parramatta LGA.



9.0%

indicated that they volunteered compared to 11.2% in Parramatta LGA.



74.2%

have completed Year 12 or equivalent compared to 76.2% in Parramatta LGA.



41.1%

have completed a bachelor's degree compared to 41.4% in Parramatta LGA.



86.6%

of households indicated they had one motor vehicle compared to 45.8% in Parramatta LGA.

EMPLOYMENT AND INCOME

The top occupation was Professionals which accounted for 36.3%

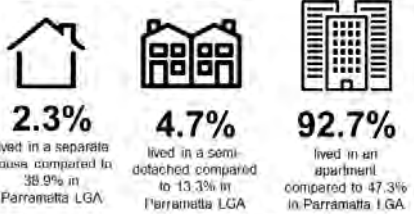
14.4% of people were employed in the health care and social assistance industry compared to 12.5% in Parramatta LGA.

7.0% of people were unemployed in 2021 compared to 4.0% in Parramatta LGA.

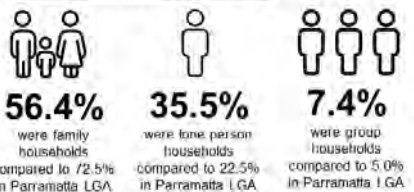
64.7% was the labour force participation rate compared to 62.1% in Parramatta LGA.

\$1,737 was the median household income compared to \$2,051 in Parramatta LGA.

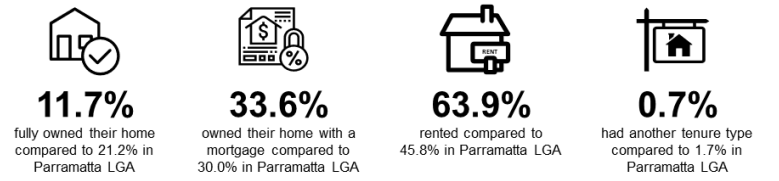
DWELLING STRUCTURE



HOUSEHOLD TYPE



TENURE TYPE



2.3 Social infrastructure audit

by GHD

An audit of existing social infrastructure within and surrounding the precinct has been undertaken to understand existing facilities that likely service the precinct.

There are two government primary schools with catchment areas that intersect the precinct. Parramatta North Public School currently accommodates a number of students in on-site demountables, which are used to cater to fluctuating enrolment demand. The other primary school is

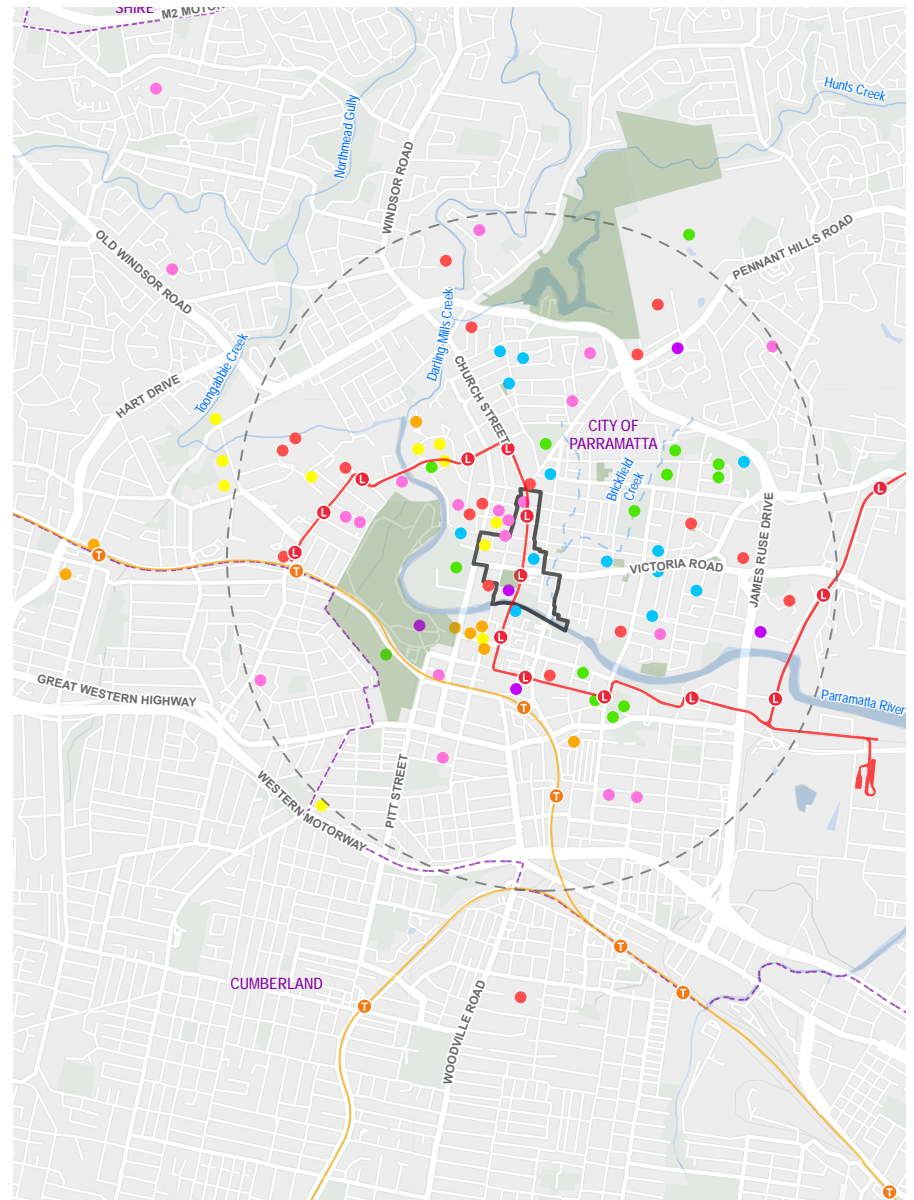
There are currently three government secondary schools with catchment areas which intersect the precinct – Arthur Phillip High School, Northmead Creative and Performing Arts High School, and Macarthur Girls High School.

There are no local community or cultural facilities within the precinct. The closest community centre is Burnside Gardens Community Centre which is located in Oatlands, approximately 2 km north-east from the precinct.

Currently there is one childcare facility located within the precinct that provides 59 long day care places. There are an additional 12 childcare facilities that provide a combined total of 621 places within 2 km of the precinct.

There are limited formal sport and recreational facilities (both indoor and outdoor) within the precinct

As shown in the map, there are a number of facilities located outside but in proximity to the precinct that currently support the social infrastructure needs of the community.



- | | | | |
|------------------------------|--------------------|-----------------------|-----------|
| Church Street North Precinct | Railway | Community and culture | Childcare |
| 2km boundary | Light rail | Education | Aged care |
| Local Government Area | Light rail station | Emergency services | |
| Parks and open space | Train station | Health | |
| Watercourses | | Sport and recreation | |



2.3 Social infrastructure audit

by GHD

There is approximately 25,802m² of open space within the precinct currently servicing an estimated population of 8,172 people, which equates to 1,584 people per 500m² of open space. This indicates that existing open space is currently at capacity. However, additional open space located outside but in proximity to the precinct offers an additional 45,740m² (4.57 ha) of open space.

The image illustrates the walkable distance from all parks and open space including pockets parks in the precinct. It demonstrates that all residences are located within 400 metres of open space.

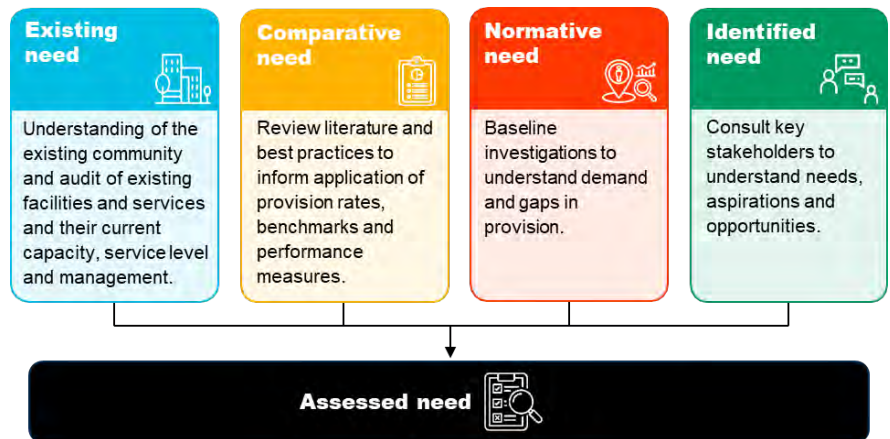
As per the Draft Greener Places Guide the minimum requirement for adequate open space is 3,000m² which is the minimum recommended size of a local park. Within the Guide it is noted that in “high-density area parks are sometimes as small as 1,500m² however, they are not adequate for a diverse range of recreational needs and need to be supported by a larger open space in the network.” Furthermore, the Draft Greener Places Guide notes that small and local parks are deemed to be at capacity if more than 1,500 residents to 5000m² of parkland are within 500m.



A development scenario based on the CBD PP controls as well as alternative scenarios were reviewed against appropriate benchmarks and rates of provision for each social infrastructure type (normative need).

Every community has its unique demographic profile, rate of growth and population density. These factors all influence community needs for social infrastructure. As such, each of the four indicators of need were taken into consideration to determine recommendations for provision of social infrastructure that will service the future needs of the precinct.

The table below outlines the recommendations and future considerations for population growth within the range of the development scenarios tested.



EDUCATION	<ul style="list-style-type: none"> Work with the Department of Education and School Infrastructure NSW to understand the current capacity and future demand of primary and secondary government school with catchment areas that intersect the precinct. Investigate opportunities for developing 'shared use' arrangements for the community use of school facilities (including halls and sports facilities) for school within and servicing the precinct.
HEALTH	<ul style="list-style-type: none"> Work with NSW Health and NSW Ambulance to understand current capacity and current and future demands of health infrastructure in the Parramatta and Westmead area.
EMERGENCY SERVICES	<ul style="list-style-type: none"> Work with emergency services to understand current demand for services and potential future changes and planning requirements.
COMMUNITY AND CULTURAL	<ul style="list-style-type: none"> Provide a new multi-purpose community facility with a minimum size of 1,000m² to service residents within the precinct and areas surrounding in North Parramatta with potential co-location opportunity with other community and cultural facilities, sport and recreation facilities and parks and open space areas. To be located close to public transport hubs as identified along Church Street. Investigate opportunities for additional community and cultural facilities, particularly district level facilities to service the broader North Parramatta.
CHILDCARE	<ul style="list-style-type: none"> Need for additional childcare places to be provided within the precinct with consideration for childcare facilities to be located close to place of work or place of residence focusing on areas of higher density, close to public transport and areas of open space and recreation.
AGED CARE	<ul style="list-style-type: none"> Investigate opportunities for new aged care facilities, considering a vertical aged care facility for low care needs. To be located close to supporting infrastructure such as retail, community centres, health services and open space.

SPORT AND RECREATION	<ul style="list-style-type: none"> Investigate opportunities for new formal and informal sport and recreation facilities to service the residents within the precinct. Consideration given to culturally appropriate sport and recreation facilities that will service the existing and future needs of the community.
OPEN SPACE	<ul style="list-style-type: none"> Explore options to provide approximately 12,000m² of additional open space (equivalent to approximately four additional local parks at a minimum of 3,000m² each). Priority should be given to areas located in the north of the precinct that currently sit > 200m from any open space. Explore potential to expand and enhance existing parks located in the surrounding area of North Parramatta to reflect best practice guidelines identified in the Everyone Can Play Guideline and Draft Greener Places Guide such as: <ul style="list-style-type: none"> Improved accessibility such as improved cross block connection and active street frontages. Provide space and/or activities for all ages play. Increase shade coverage and seating. Improved amenities such as wayfinding, lighting, garbage bins and fencing Potential to include areas for community gardens, native bush tucker/ edible walking landscapes or other sensory play opportunities Investigate opportunities to provide district level open space at a minimum size of 2 ha within the precinct or within 500m of the precinct. Investigate opportunities to provide greater diversity of open space across the precinct to include: <ul style="list-style-type: none"> Fitness and exercise spaces. Local play for all ages children. Youth recreation spaces. Connected trail and path-based recreation. Off-leash dog exercise areas.

2.4 Movement and public domain



Vehicles

Parramatta Road is the oldest highway in Australia. It was connected through to Church Street creating a vibrant 'high-street'.

Traffic generating uses and at-grade parking now impact the vitality of the precinct. Victoria Road and O'Connell Street are major barriers to pedestrian connectivity to and from the south and west due to heavy traffic and unsuitable footpaths.

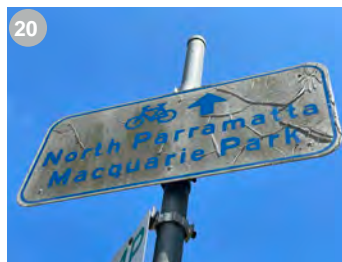
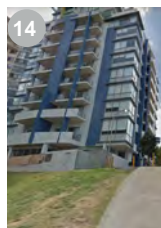
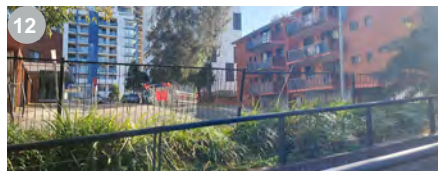
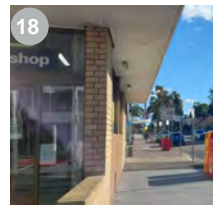
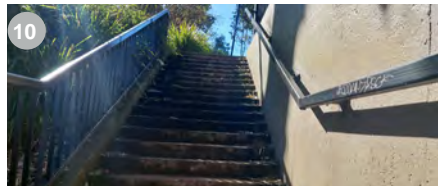
The delivery of light-rail alone may not address those issues. Coordinated public domain and built form planning is recommended to deliver an attractive pedestrian-friendly CBD.



Public Transport

With the opening of the Parramatta Light Rail in 2024, the whole Church Street North precinct will sit within walking distance to a light rail stop.

Public transport infrastructure in the precinct however, generally impacts street amenity. Once the light rail is operational, bus routes could be optimised and bus lanes better integrated. More vegetation and WSUD should be provided together with high quality street furniture and materials that respond to the role and character of Church Street.



Walking and cycling

To the south of Victoria Road, despite proximity to the river and the commercial core, the public domain is visually unattractive and physically disconnected, with some blocks being > 200m long. Development (including recent construction) does not appropriately address the streets and the riverfront. That is detracting from the ambition of a world-class CBD.

North of Victoria Road, development has generally not provided street tree planting or publicly accessible spaces. Where that was provided, it has often resulted in poor quality outcomes. The E-W side streets do not provide sufficient pedestrian amenity and have been further disconnected from Parramatta Park after construction of the stadium and associated parking.

Cycling infrastructure may be limited as cyclists are rarely seen.

Images:

1. Stagecoach on Macquarie St close to the corner of Smith Street, c. 1860. City of Parramatta
- 2-4. A gateway into the precinct, the intersection of Church St and Victoria Rd is car-dominated a
5. O'Connell Street has become a barrier to integrating the precinct with the Parramatta North heritage hub
6. Tram running down Parramatta city street, 1920s-30s. City of Parramatta
- 7-9. Bus and light-rail corridors could provide better amenity, character and environmental outcomes
- 10-15. Unattractive public domain around Wilde Ave and Lamont St.
- 16-18. Church Street and the E-W streets are not 'streets for people' to walk, stop and enjoy the Place
19. Restricted connections to Parramatta Park
20. Limited cycling infrastructure

2.4 Movement and public domain: key issues for future consideration



Victoria Road

To the west of Church Street, the existing footpath width is narrow and does not allow for pedestrian traffic commensurate to the densities proposed. The existing public domain would not support pedestrian flow from the light rail stop or the weekend visitors walking towards the stadium.

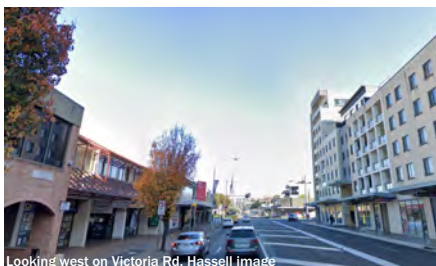
At this gateway location, that is a sub-par outcome for the whole of the CBD. Development should provide for additional setbacks and public domain upgrades along this frontage.



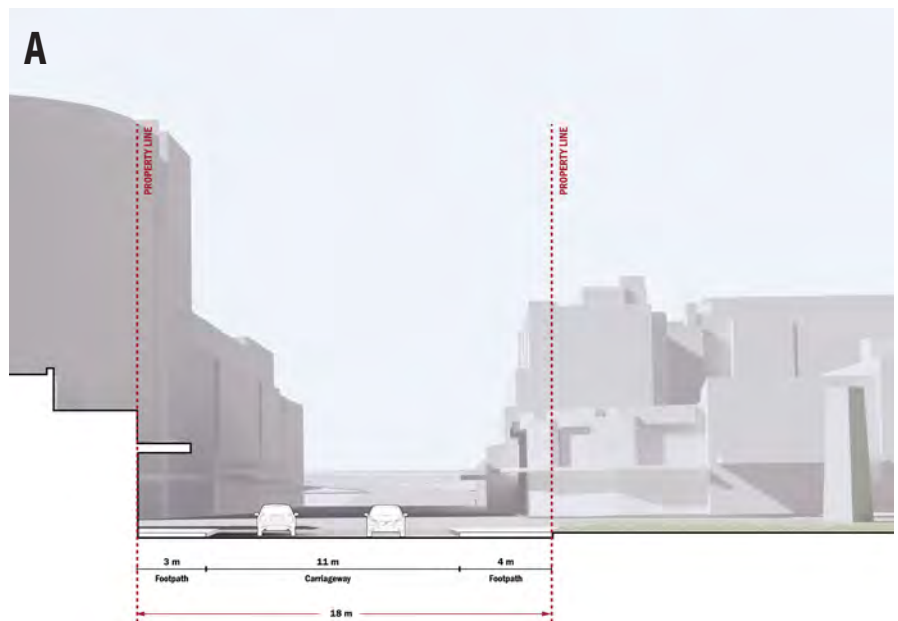
Looking east on Victoria Rd. Hassell image

Along Victoria Road between Wilde Avenue and Church Street, the left turn lane into Church Street has been made redundant with the implementation of the light rail.

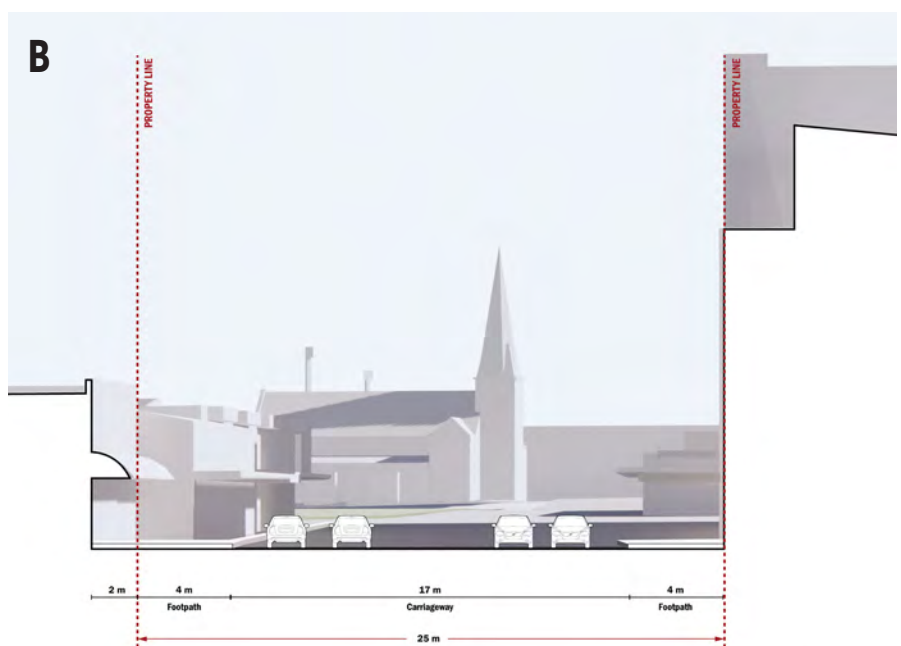
That offers a unique opportunity for footpath widening, tree/vegetation planting and WSUD in a flood-prone area and gateway location to CBD that is currently unwelcoming to pedestrians and unattractive to visitors.



Looking west on Victoria Rd. Hassell image

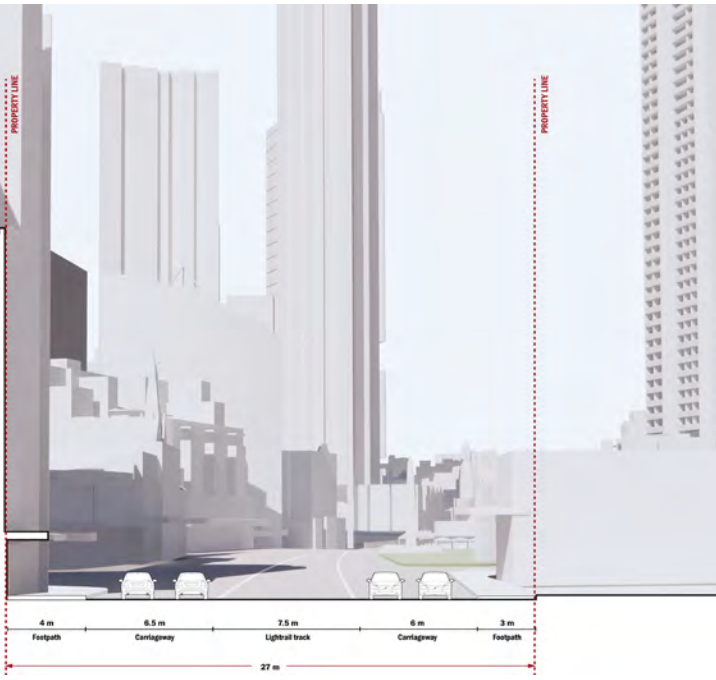


Existing conditions



Existing conditions

C



Existing conditions

Church Street

The western footpath significantly narrows towards Prince Alfred Square creating a poor outcome in a key location, considering the significance (cultural and historical) of the N-S view corridor.

The existing setback at the Ross Street corner should extend along the footpath to the south. A recessed ground floor should not be an acceptable alternative given the gateway location and the distant and closer views to the trees on the park.



Looking south down Church Street, Ross Street corner. Hassell image

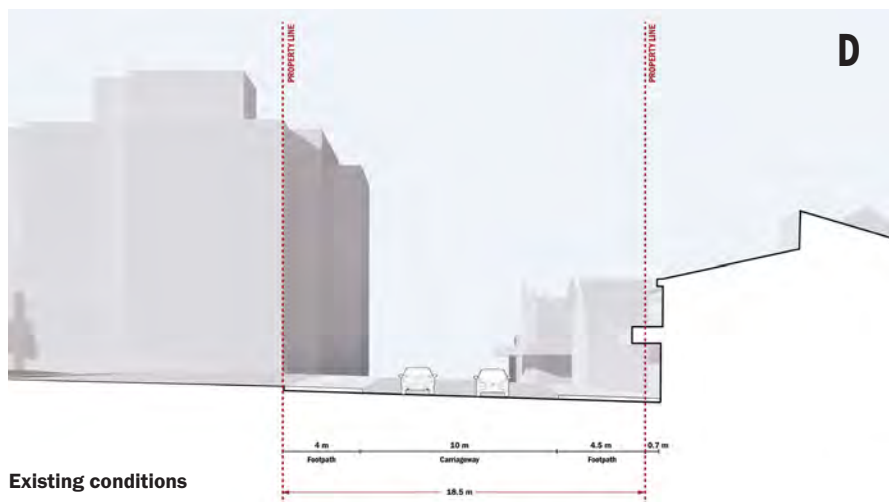
Side commercial streets

Along the E-W side streets, the existing road reserves are unusually narrow. Some existing buildings provide setbacks although these are not sufficient to allow for street tree planting. New development has been built to the boundary. If that continues to be allowed, view corridors between the two Heritage Conservation Areas (HCA) are likely to be lost.

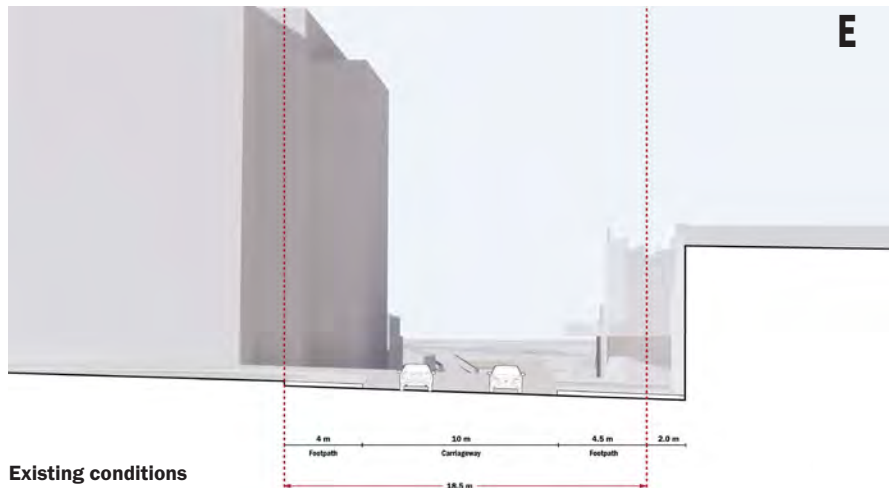
A recessed ground floor in lieu of building setbacks may be considered if that retains the E-W view corridors between the HCA as well as the historical subdivision and street arrangement. Setbacks should still be required on side streets where there is insufficient space for tree planting.



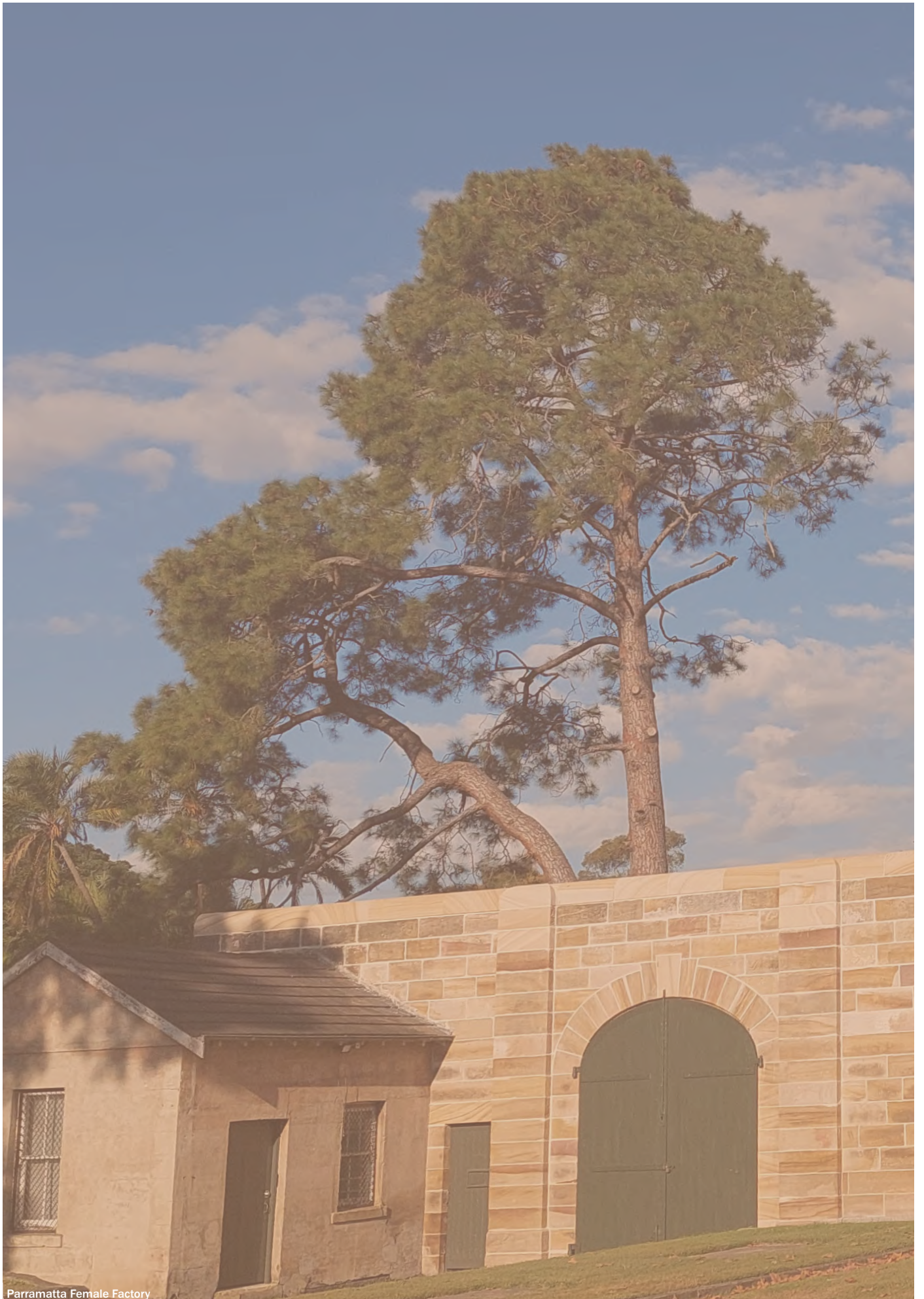
Looking east on Fennell Street. GoogleMaps



Existing conditions



Existing conditions



Parramatta Female Factory

3 Heritage and Character

3.1. Strategies and consultation: key outcomes

Analysis of the planning context and community collaboration has identified a series of outcomes relevant to Church Street North. These have been broken into three categories at the regional and local level, together with key outcomes desired by the community. These are important considerations that should be taken into account while preparing development controls or during further planning and design for the precinct.

Regional



- Acknowledge the importance to the Region's communities of the heritage items and historic places such as the World Heritage-listed site of Old Government House and Government Domain, Prince Alfred Square, Parramatta Park, Cumberland Hospital precinct
- Undertake a design-led place-based planning approach for centres
- Creating and renewing great places and local centres, and respecting the Region's heritage
- Providing housing supply, choice and affordability with access to jobs, services and public transport

Community



A WORLD CLASS CITY WHICH CELEBRATES ITS CULTURAL LANDSCAPE AND RICH HISTORY

DEVELOPMENT IN THE 'RIGHT PLACES', INCORPORATION OF HERITAGE FOR FUTURE GENERATIONS

SMALL COTTAGES THAT TELL THE STORY OF WORKERS

HERITAGE THAT IS PART OF THE IDENTITY OF NORTH PARRAMATTA, SUCH AS THE CEMETERIES, HERITAGE BUILDINGS AND CONSERVATION AREAS

Local



- Enhance protection of views and scenic and cultural landscapes, such as historic cemeteries, buildings, lookouts and significant bushland and garden city park vistas through planning controls
- Develop local character statements, identify key place-making measures
- Enhance Parramatta's heritage and cultural assets to maintain our authentic identity
- Investigate ways to enhance areas with strong local character, including North Parramatta with improvements to the public domain and street tree planting
- Develop provisions requiring fine grain shopfront uses and presentation at street level in Local Centres

3.2 Evolving built fabric

by Extent Heritage

1814



1823



1895-1905



1788-1830s

1830s-1880s

1880s-1920s

- Penal settlement
- Establishment of street grid
- Governor Bligh's grant west of Church St
- Subdivision and development east of Church St
- Second Parramatta Gaol
- First Female Factory
- Horticultural Society's Garden
- Roman Catholic Chapel and School
- Government Reserve

- Civic, commercial, residential subdivision & development
- Church St developed as main street
- Subdivision of large estates on eastern side of Church St
- Western side of Church Street - institutions
- Construction of the railway 1855
- Parramatta Municipal Council 1858
- Roman Catholic Orphan School
- Third Parramatta Gaol
- Kings School
- Market

- Parramatta as a regional commercial centre
- Intensive residential subdivision and development along Church St and to its west
- Earlier smaller dwellings replaced by larger dwellings
- Larger allotments remain east of Church Street
- Opening of Parramatta to Castle Hill tramway 1902 for passengers and produce

1943



1965



2023



1920s-1950s

1950s-1990s

1990s-2020s



- Commercial centre develops along Church Street, south of the river
- Less new development north of the river

- County of Cumberland Scheme: Second CBD
- Intense commercial development south of the river
- Commercial and residential subdivision and development north of the river
- Growth of Parramatta's diverse, multicultural communities
- Riverside Theatres, Heritage and Visitor's Centre

- Sydney into its third century: metropolitan strategy 1988 - granted Parramatta the same status as the Sydney CBD
- Introduction of super-tall office and residential towers south of the river, intensification of the Parramatta CBD
- Some new development north of the river
- Loss of historic building stock throughout, particularly south
- Lennox Bridge upgrade allowing cyclists along the riverbank
- St Patrick's Cathedral destroyed by fire, rebuilt

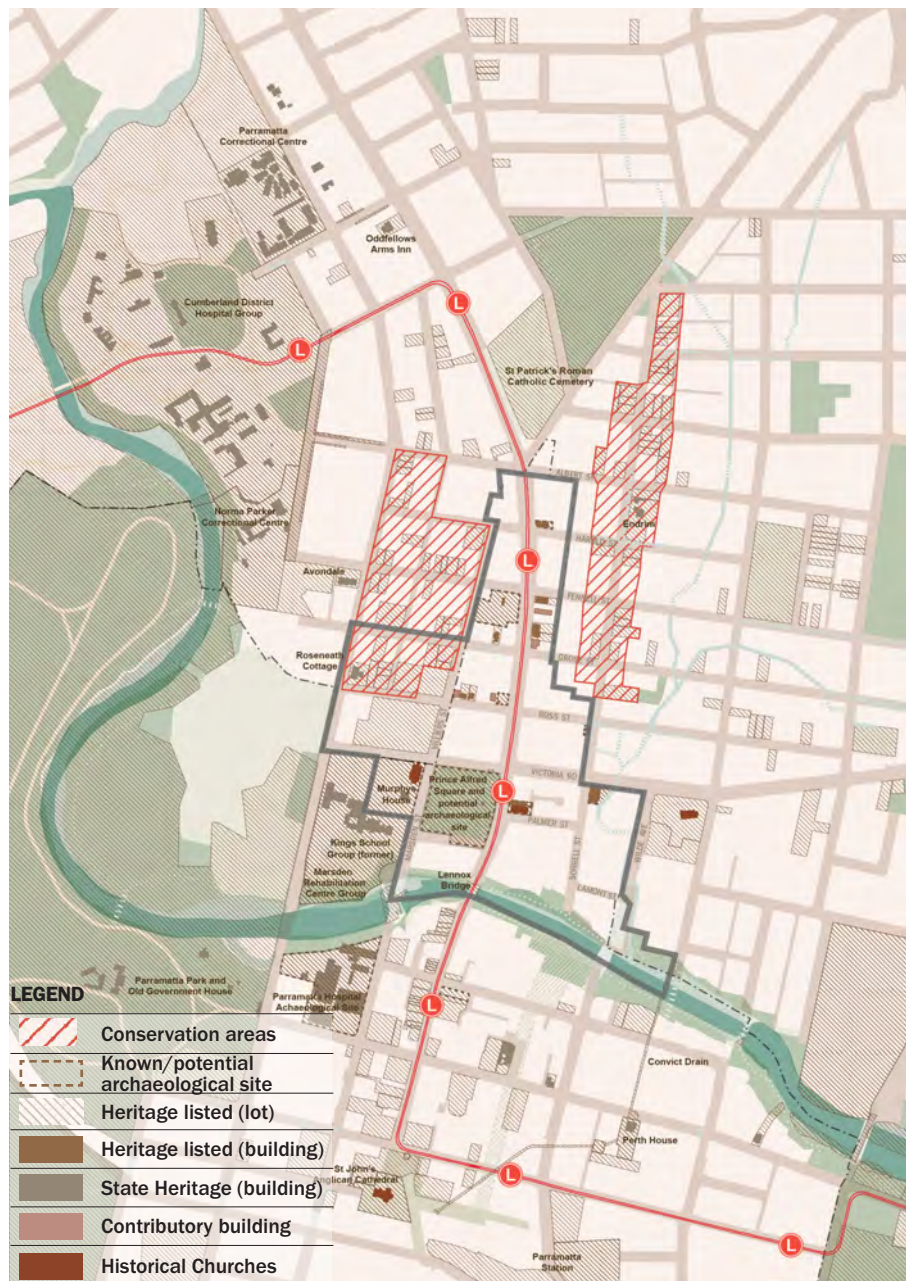
3.3 European heritage

Significance

The precinct is dotted with, and surrounded by heritage items and contributory buildings. It is flanked by the Sorrell Street Heritage Conservation Area to the east and the North Parramatta Heritage Conservation Area to the west.

The precinct also comprises potential important historical archaeological sites including Prince Alfred Square and King’s School as well as potential nineteenth century residential and commercial archaeological sites.

Cumulative impacts of development within Church Street North could diminish the heritage values of the broader area. Impacts to heritage values could occur irrespective of whether individual developments achieve 'design excellence'.





The first Female Factory at Prince Alfred Square, 1803-1821. City of Parramatta Research and Collections



Looking north up Church St, Prince Alfred Square



Female Factory. City of Parramatta



FemaleFactory



Prince Alfred Square. Hector Abrahams Architects

Prince Alfred Square

Prince Alfred Square is highly significant as the site of the First Female Factory (1803-1821). The subsequent factory at the 'Parramatta North' area is a rare example of preserved female convict history and adjoins the Parramatta Girls Home, where generations of abuse have started to be recognised.

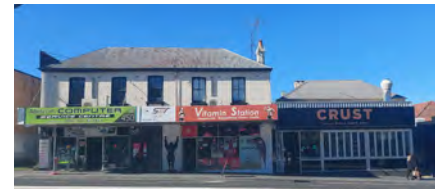
Church Street and E-W side streets

Remnant heritage listed commercial buildings and other contributory buildings along Church Street still provide a good representation of the earlier street character and the historical importance of Church Street as the colonial N-S axis.

The E-W side streets are dotted with smaller scale heritage listed buildings. In particular, Ross Street and Fennell Street still retain rows of heritage items and/or a low scale setting that has strong hierarchical and visual relationships with Church Street.



Church Street



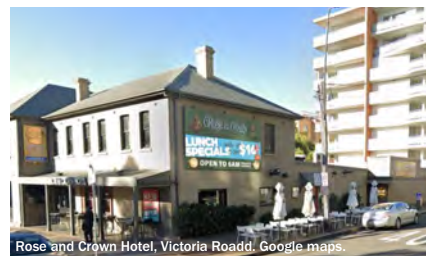
Corner of Fennell and Church Streets



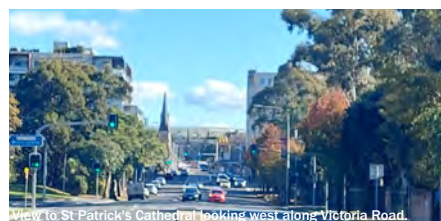
Ross Street. GoogleMaps



View to All Saints Church looking west along Victoria Road. Hector Abrahams Architects



Rose and Crown Hotel, Victoria Road. Google maps.



View to St Patrick's Cathedral looking west along Victoria Road.

Victoria Road

Besides Rose and Crown, the heritage listed hotel along Victoria Road, the streetscape is dominated by the settings of the All Saints Church and St Patrick's Cathedral that remain well preserved.

3.4 Historical settings and view corridors

The Old Government House and the Domain (OGHD)

The OGHD is one of eleven penal sites which together make up the UNESCO World Heritage listing 'Australian Convict Sites'.

The heritage values of the OGHD include important views and settings outside the boundaries of Parramatta Park. It is possible that the listing may be impacted by further development of the urban landscape surrounding Parramatta Park, including development in the Church Street North precinct.

EXTENT





Looking south down Church Street, c. 1890. City of Parramatta



Looking south down Church Street. GoogleMaps



Looking north along Church Street, c. 1880. City of Parramatta



Looking north up Church Street



Looking north up Church Street from Prince Alfred Square

N-S Views: Prince Alfred Square, Church Street

Church Street was the N-S axis of the colonial township and this alignment is highly significant.

To the south of the river, the blue-sky view corridor against the spire of St John's Cathedral is protected through strict controls. This corridor extends to the north with distinct views towards the spire of St Peter's Church marking the arrival experience.

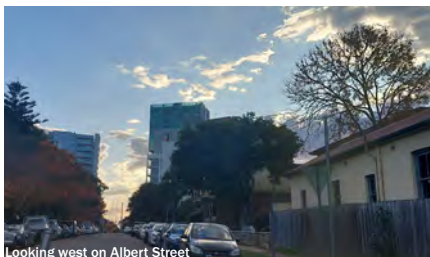
The continuation of the southern blue-sky corridor and understanding of the topography and ridgelines are still well preserved within the precinct, framed by new buildings. The N-S corridor is further strengthened by views to tall trees at the termination points of the parks at each end.

E-W Views: Heritage Conservation Areas, Victoria Road, Riverfront

The E-W view corridors across Church Street between the two Heritage Conservation Areas are currently well preserved. Development along Church Street should retain those views to avoid creating a barrier between the HCAs that could diminish the overall heritage values of Parramatta.

Vistas to, and the relationship between, the All Saints and St Patrick's Churches define the streetscape along Victoria Road and mark the arrival experience into the Parramatta CBD from the north-east and north-west.

The section of the river along the edge of the precinct is unique with a flat, broad surface acting like a mirror capturing reflections of the sky. All views along the river corridor should be retained as well as the reflections of the sky into the river.



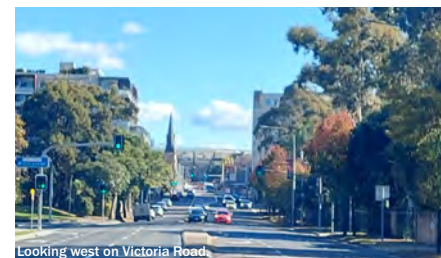
Looking west on Albert Street



Looking east on Fennell Street. GoogleMaps



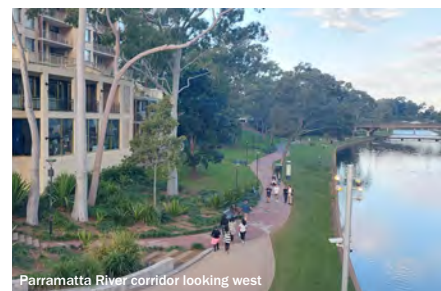
Looking east on Victoria Road. Extent Heritage



Looking west on Victoria Road.



Parramatta River corridor looking east. Hector Abrahams Architects

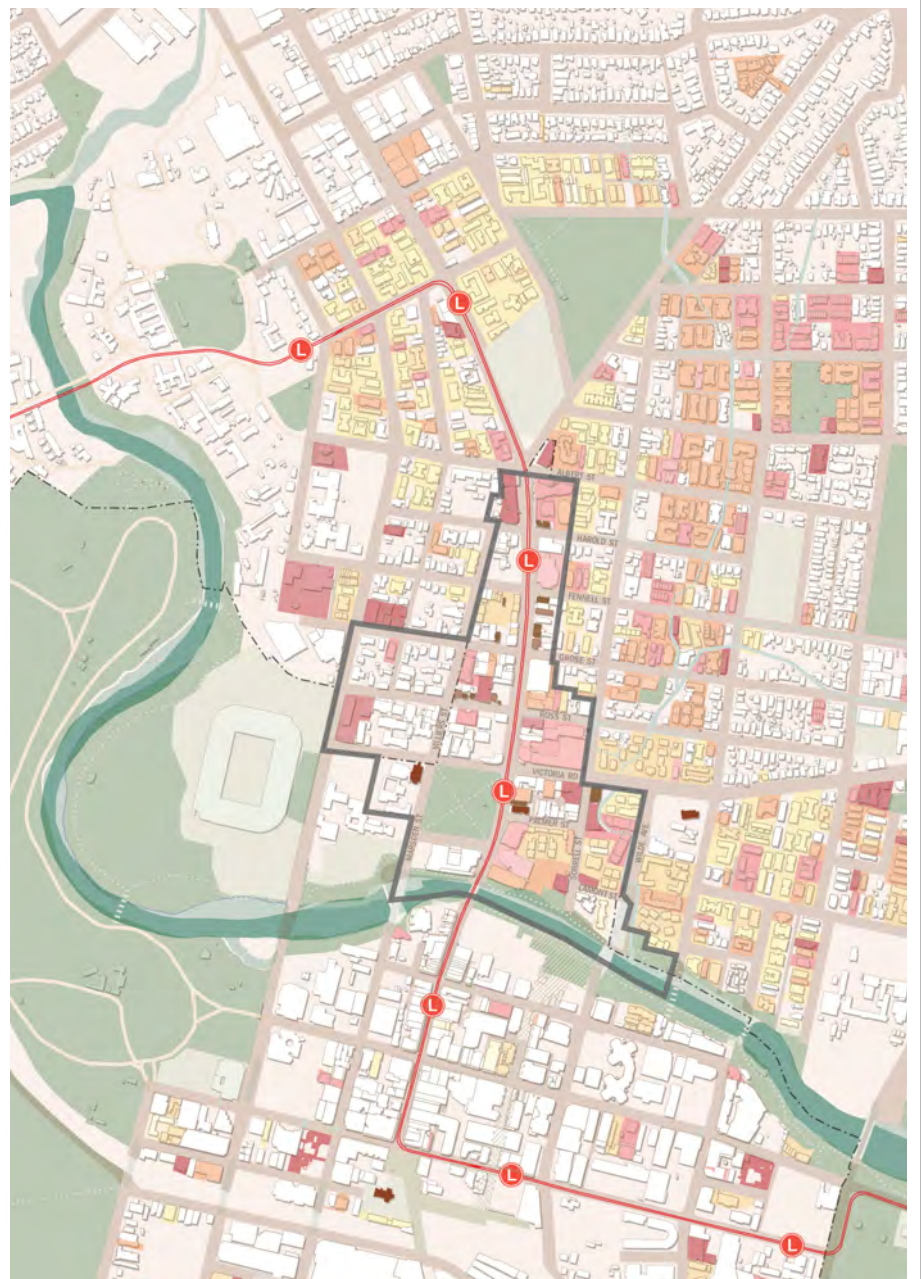
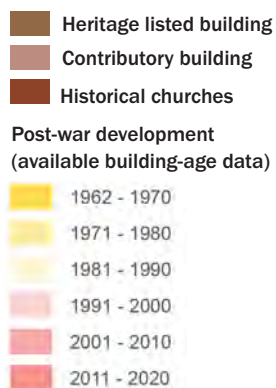


Parramatta River corridor looking west

3.6 Recent development

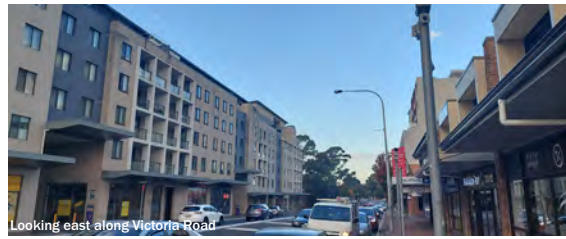
New development in the precinct has been mostly of generic quality and without providing improvements to the public domain.

Interfaces with the River, heritage areas, Church Street and Victoria Road generally have not supported the ambitions for Parramatta to have a world-class CBD.





Rose and Crown Hotel, Victoria Road. GoogleMaps



Looking east along Victoria Road



Corner of Sorrell Street and Victoria Road

Victoria Road area

A consistent character has emerged with a 5-storey street wall and recessed upper storeys as currently allowed in the existing North Parramatta DCP.

Certain existing building forms may not be allowed in the Parramatta CBD DCP and would require further integration at detailed design stages.

Church Street and side streets

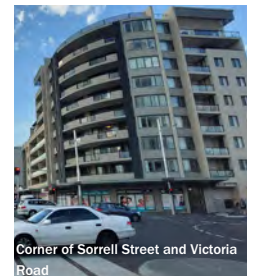
A variety of new mixed-use as well as commercial buildings have emerged along Church Street in the past 10-20 years. Mixed use buildings have a variety of forms, including large although articulated podiums and towers expressed down to the street level.



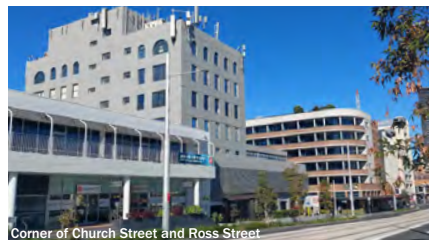
Corner of Albert Street and Church Street



Church Street and Pennant Hills Road intersection



Corner of Sorrell Street and Victoria Road



Corner of Church Street and Ross Street



Ross Street



Looking north up Sorrell St from David Frater Reserve. GoogleMaps

Riverfront

The quality of recently constructed buildings near the river is generic. To date all developments in the riverfront area have provided poor public domain interfaces to the Parramatta River.



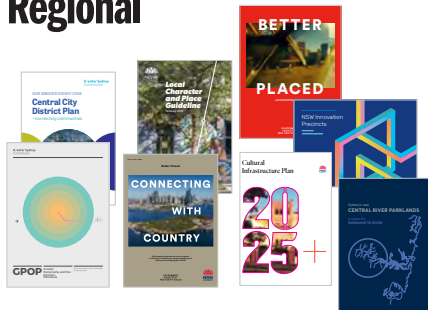
Eat Street/Parramatta Light Rail. Melissa Summers image.

4 Activation and Revitalisation

4.1 Strategies and consultation: key outcomes

Analysis of the planning context and community collaboration has identified a series of outcomes relevant to Church Street North. These have been broken into three categories at the regional and local level, together with key outcomes desired by the community. These are important considerations that should be taken into account while preparing development controls or during further planning and design for the precinct.

Regional

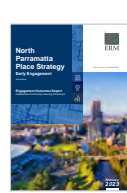


- Creating the conditions for a stronger economy, a more connected and competitive Greater Parramatta, growing investment, business and job opportunities
- Providing for a diverse and vibrant night-time economy, in a way that responds to potential negative impacts. A diversity of arts, culture, food and worship
- Create inclusive and diverse 'inner-city' liveability across GPOP to attract and retain talent
- Parramatta CBD and Westmead Health and Education Precinct: a great setting, rich local arts and cultural community, a diverse mix of housing to support people to flourish
- Sustain strong investment momentum in the principal economic anchors of Parramatta
- Support the role of the creative, heritage and entrepreneurial hub in North Parramatta

Community

ENHANCED FOCUS ON THE HISTORY OF THE AREA. INCORPORATING HERITAGE INTO NEW DEVELOPMENT

MAKE THE AREA INVESTMENT READY, INCREASE TOURISM (GLOBALLY AND LOCALLY) AND PROMOTE THE AREA AS A WORLD CLASS CITY WHICH CELEBRATES OUR CULTURAL LANDSCAPE AND HISTORY



THERE IS A LACK OF RETAIL/HIGH STREET OPTIONS

THE DILAPIDATED 60S AND 70S THREE-STOREY WALK UPS ARE UNATTRACTIVE

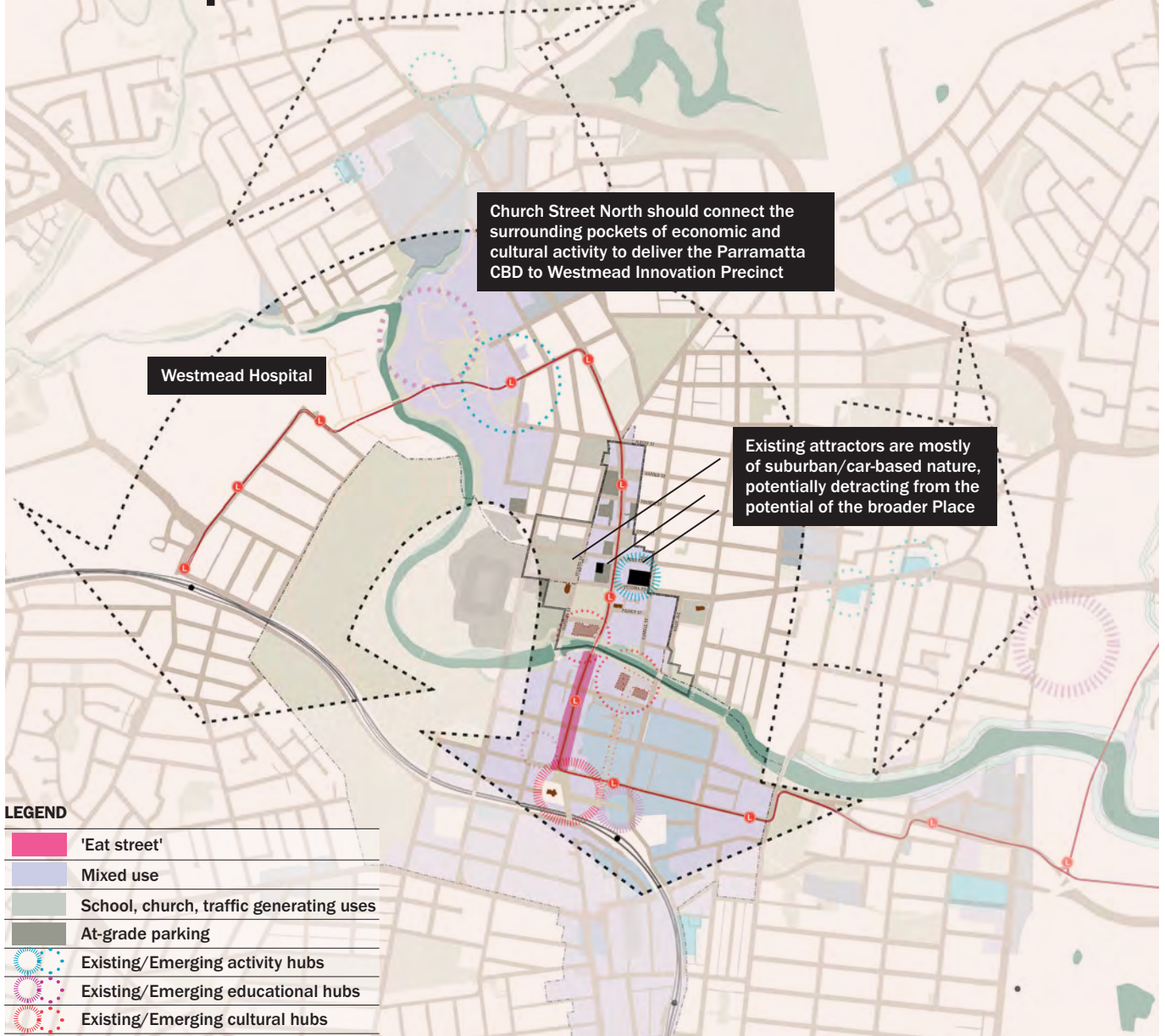
WE HAVE LOST SHOPS AND CULTURAL FACILITIES. IT FEELS LIKE THE AREA IS ON PAUSE

Local



- Expand Parramatta's economic role as the Central City of Greater Sydney. Build the capacity of centres to be strong, competitive and productive
- Create the conditions for residential development within walking distance to transport
- Actively facilitate the development of cultural facilities and precincts to promote a distinctive sense of place
- Encourage a thriving small business sector for growth and expansion
- Fine grain, active shop fronts at street level in Mixed Use zones to create neighbourhoods with interest and vitality
- Leverage the character of local precincts
- Enhance Parramatta's heritage and cultural assets to maintain our authentic identity, Civic link as culture link

4.2 Place potential

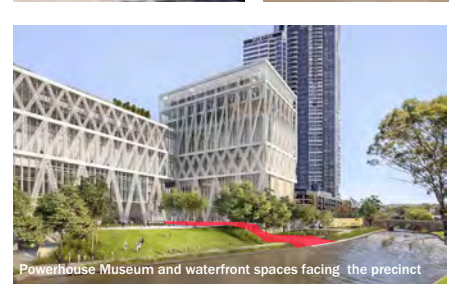
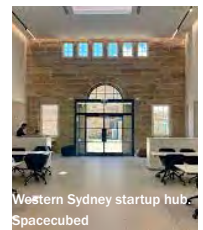


LEGEND

	'Eat street'
	Mixed use
	School, church, traffic generating uses
	At-grade parking
	Existing/Emerging activity hubs
	Existing/Emerging educational hubs
	Existing/Emerging cultural hubs

The precinct is surrounded by pockets of cultural and economic activity of city-wide significance, and unique local character – backbones of successful innovation precincts. Yet the precinct's attractors are mostly chain retail, religious or school uses, focused on car-based demand from surrounding suburbs. That may detract from the broader integration of uses and activation.

The light rail brings an opportunity for new development to achieve, through design guidance and placemaking, the diversity, character and attractiveness that support prosperous centres and innovation precincts.

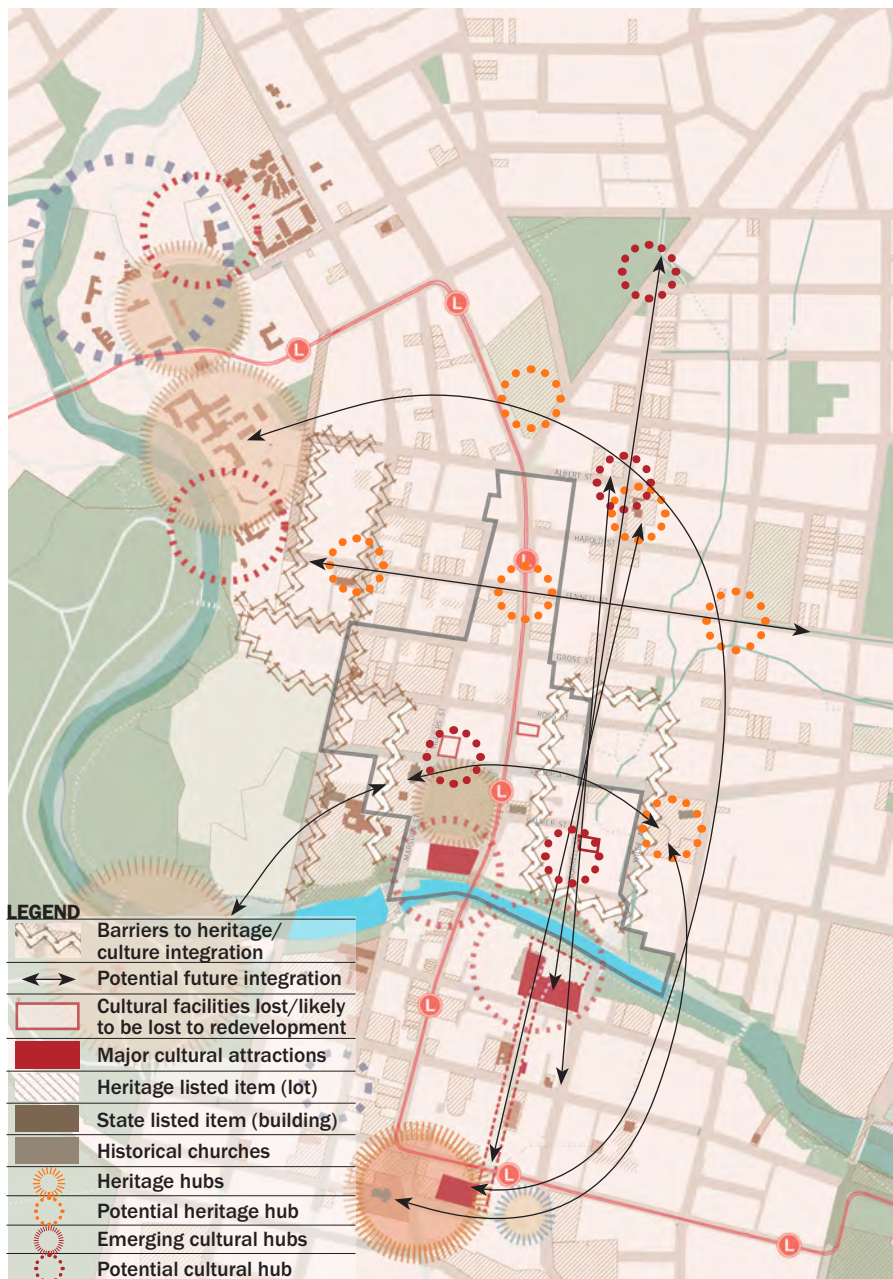
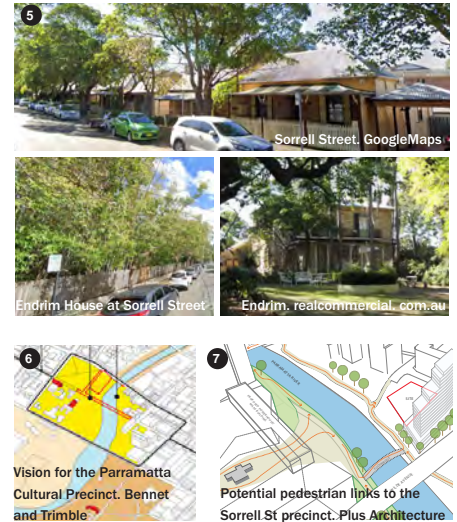


Cultural facilities have been lost, and the remaining facilities are located on sites likely to redevelop.

Heritage values of the area are generally not promoted. There is untapped potential to establish thematic and physical links that would create a magnetic destination.

Images:

- 1&2. Existing visitor centre (being relocated from the precinct). The area's heritage values are not promoted
3. Cultural facility recently demolished
4. Cultural centre on site of future redevelopment
5. Sorrell Street is not showcased. It includes the Endrim House and gardens, not publicly accessible
6. The upgraded Bayanami School now sits where the Parramatta Cultural Precinct was originally planned
7. Potential pedestrian links to the Sorrell Street area investigated in the past



The Church Street North precinct currently presents a barrier to integrating the CBD into a broader heritage, culture and innovation area.

South of Grose Street and west of Villiers Street, there is a concentration of built form and uses that physically and visually disconnect the precinct from its surroundings. That includes schools, fenced-off strata development in large lots, at grade parking and busy roads without pedestrian amenity. Recent development throughout the precinct has been mostly of generic character and responds poorly to the streetscape and the Parramatta River.

Yet the area has all the ingredients to foster a magnetic identity:

- heritage listed and contributory buildings that could be brought to the forefront of streetscapes
- heritage churches/cemeteries and conservation areas, complementing a 'ring of attractions' to link the Female Factory precinct
- old walk-up flats that could be refurbished into character-rich affordable homes, hotels, studios
- empty sites for temporary creative and community uses
- Riverside Theatres being expanded
- the heritage and culture-rich Sorrell Street corridor — a potential continuation of the 'Civic Link'

A strategy is recommended to guide development, new public domain, and placemaking around a clear vision specific to the place.

4.3 Precinct potential

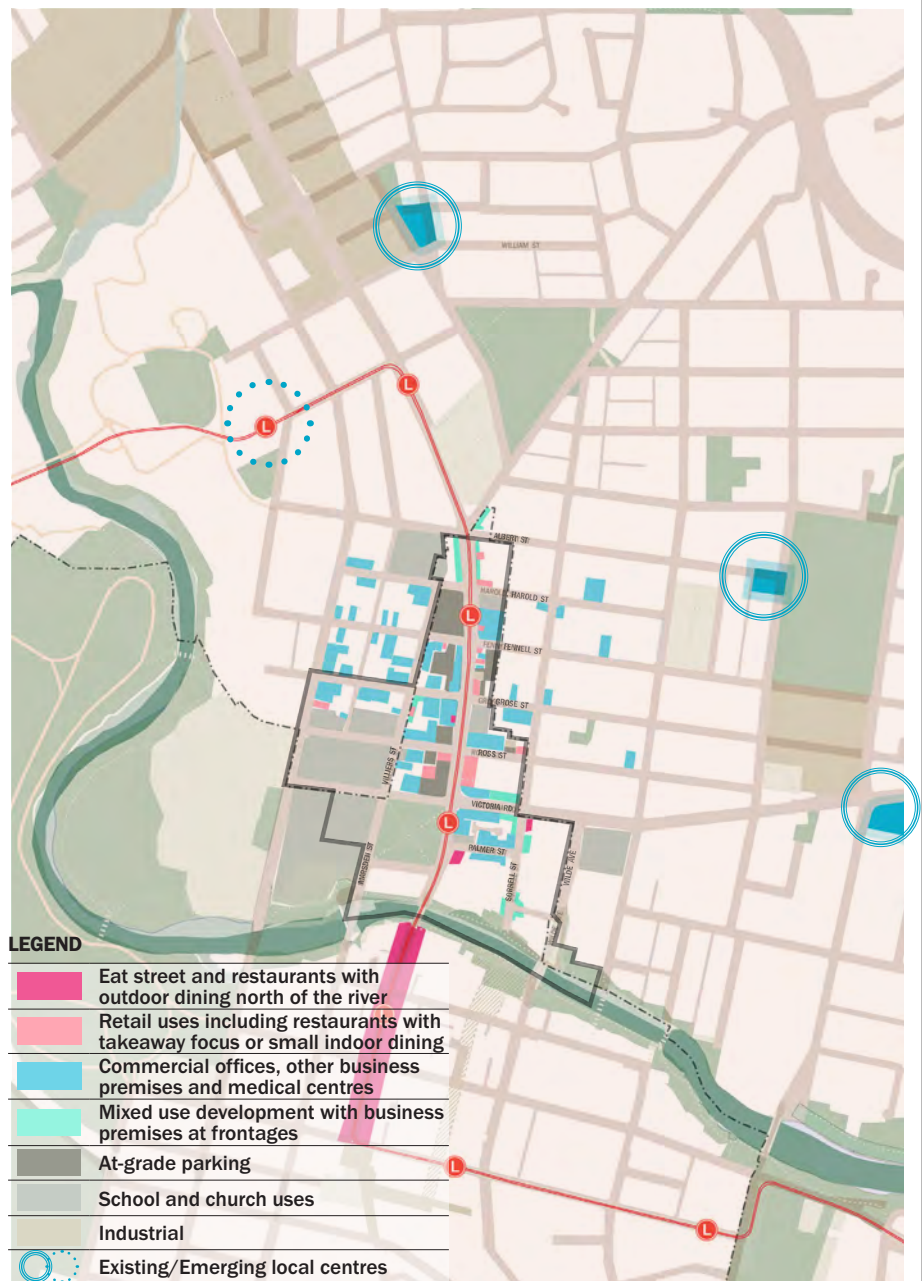
Economic activity and street activation

Economic activity to the north of the river along Church Street has increasingly disconnected from the south's 'Eat-Street' vibrancy. It focuses on traditional outer suburban services: chain retail, commercial, religious and school uses, generating vehicular traffic that impacts the quality of the streets. The light rail together with mixed use development represent an opportunity to bring back local foot traffic and revive Parramatta's N-S retail high-street.

The map shows that there are few retail uses within the precinct, with only a small number being restaurants. These are mostly focused on take-away businesses, with only two premises along Church Street providing for outdoor eating.

In the future, planning for the area should consider refocusing car-based services into the surrounding smaller centres.

There is currently a significant amount of commercial offices and business premises along Church Street and along the E-W side streets. To minimise loss of employment and support a focus on restaurants and other retail uses along Church Street, future mixed use development along the side streets should accommodate business premises.





Corner of Palmer St and Church St. Hassell image.



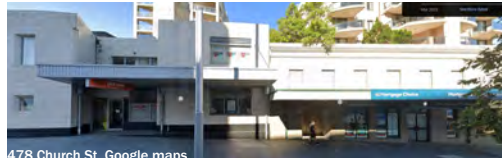
Royal Oak Hotel.



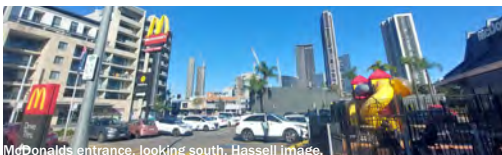
Savation Army, Church St. Hassell image.



436 Church St. Hassell image.



478 Church St. Google maps.



McDonalds entrance, looking south. Hassell image.

Church Street Hub

Existing and emerging built interfaces do not appropriately define or activate the street, a starking contrast with Church Street south of the river.

The light rail construction has resulted in further loss of retail uses and the loss of the last heritage pub.

Further detailed design controls could help ensure ground floor tenancies along Church Street are fit for purpose to encourage outdoor eating and a night time economy while retaining the amenity of residential units above.

Victoria Road Hub

As the existing business premises along Church Street are replaced with mixed uses (ideally with a high-street retail focus at the ground floor), mixed use redevelopment in the Victoria Road and Palmer Street areas could be more targeted to absorb those business premises.

For example, future requirements could encourage the first floor of mixed use buildings to accommodate business premises that do not require street interfaces.



Looking west down Victoria Road



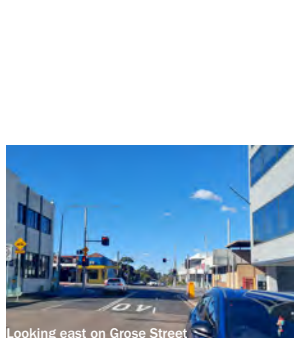
Rose and Crown Hotel. Google maps



Looking west down Victoria Road and Church Street



Corner of Victoria Road and Church Street



Looking east on Grose Street



Grose Street



Ross Street



Ross Street. Googlemaps



Sazell Street. Googlemaps

E-W Side Streets

There is currently a significant amount of older and newly built commercial offices and business premises along E-W side streets north of Victoria Road. Future mixed use development along these streets should integrate those uses.

4.4 Site potential

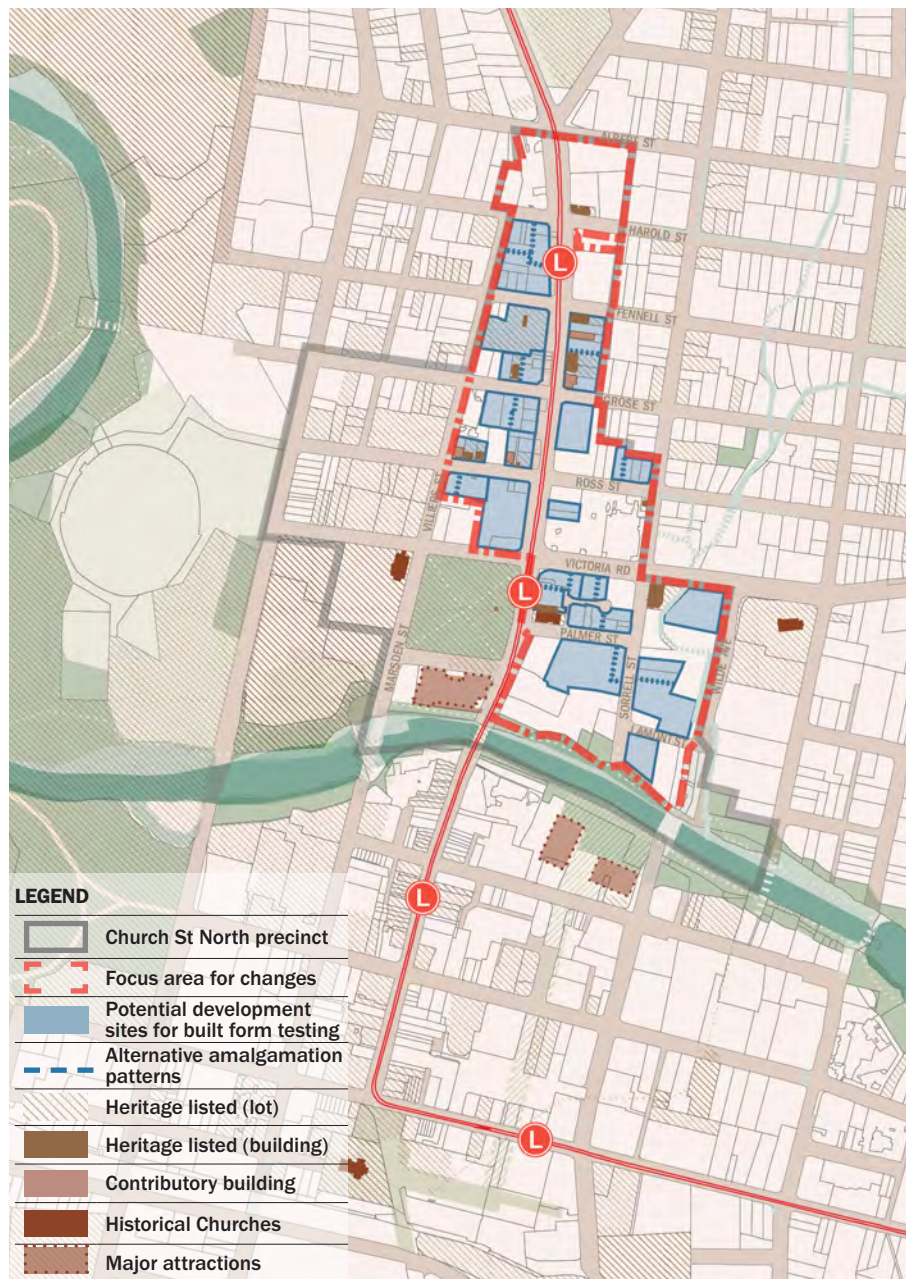
Development and amalgamation scenarios

To understand the built form, character and potential cumulative impacts of development that could result from different HOB and FSR scenarios, it is important to identify the sites that are more realistically likely to redevelop and the different potential amalgamation patterns.

Sites that are less constrained and thus more likely to redevelop in the shorter-medium term were identified through the analysis overleaf and are coloured blue on the map.





The solid blue lines indicate the largest potential amalgamation pattern identified based on spatial and ownership considerations.

The dashed blue lines indicate potential alternative amalgamation patterns (or sites in single ownership) within the larger group of sites. Built form testing has considered various amalgamation scenarios.



Heritage listed items and interfaces











Heritage listed lots should not be excluded from amalgamations or from the benefits of redevelopment, the total development capacity of a site may be reduced due to the required interfaces and transitions to the listed buildings that must be retained

-  Contributory building
-  Heritage listed (building)
-  Heritage listed item
-  Conservation area



Ownership fragmentation

Strata lots with larger numbers of units are less likely to redevelop. Smaller lots may require further amalgamation to redevelop. Vacant land in Government ownership may be ready to redevelop, although with varying uses/priorities

- Private Strata #Units
-  <10
 -  10 - 19
 -  20 - 29
 -  30 - 39
 -  40 - 49
 -  50 - 99
 -  100 - 199
 -  200 - 499
 -  Schools, church uses
 -  Government owned



Age of building

Buildings constructed in the past 10-20 years would be less likely to redevelop in the next 20-30 years

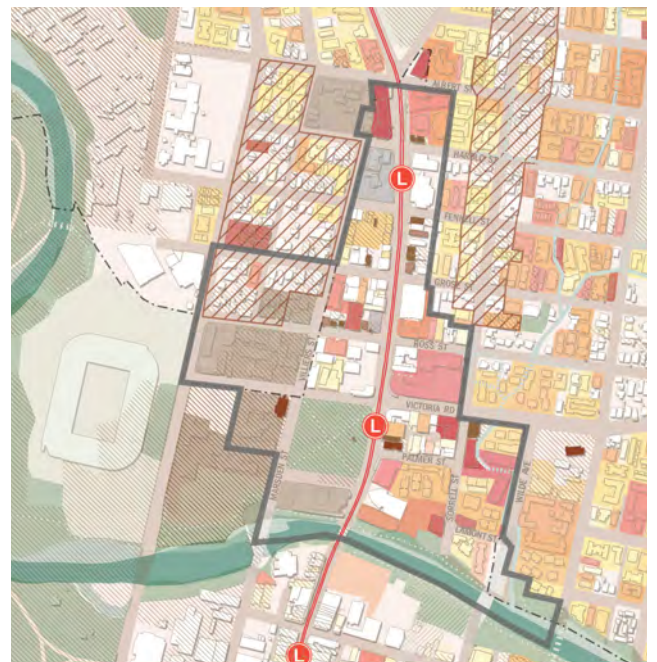
- Strata Registration
-  1962 - 1970
 -  1971 - 1980
 -  1981 - 1990
 -  1991 - 2000
 -  2001 - 2010
 -  2011 - 2020



Development potential

Overlaying ownership fragmentation, age of strata buildings, current use and heritage constraints has informed the selection of potential development (testing) sites

- Ownership & Age
- ↑
- No! strata
- Development likelihood
- 



5 Summary

5.1 Key findings about the Place

- This 'bitter water' section of the Parramatta River and archaeological sites such as the Parramatta Sand Body are of very high significance to First Nations' peoples. Key concerns include the continuous degradation of water and environmental quality, and development resulting in further loss of visual and physical connections with the non-human kin and to the broader landscape including topography, trees and sky.
- Residents of the Church Street North precinct are classified in the category of most severely affected by, and vulnerable to, urban heat, with temperatures over 9° warmer. There is a significant amount of impermeable surfaces and almost no street trees in the precinct due to unusually narrow road reserves and development being built to, or encroaching beyond lot boundary.
- There is a concentration of sites south of Victoria Road classified in the category of 'high risk to life', and where the probable maximum flooding could reach >4m at peak depth. Those sites sit within street blocks that are > 200m long without pedestrian connections. Mitigation measures such as elevated walkways may be ineffective if not coordinated through an integrated masterplan for the whole area. A new flooding study is being exhibited and subsequent steps by the City of Parramatta may address those issues.
- Layers of cultural and heritage fabric of local, national and world-wide significance permeate throughout the place and create a rich, unique character that is key to the community's identity and pride. A review of planning controls offers a once-in-a-generation opportunity for the next layer of development to integrate with, and enhance those unique features to increase Parramatta's competitiveness to attract and retain jobs, talent and investment.
- The precinct is dotted with, and surrounded by heritage items and heritage conservation areas. A key concern is that cumulative impacts of development could diminish the overall heritage values of North Parramatta. Potential development outcomes such as visual impacts, loss of views, or a wall of tall buildings disconnecting the two conservation areas could result despite individual developments achieving 'design excellence'.
- The alignment of Church Street itself is highly significant as the N-S axis of the colonial township. Yet, economic activity in the north has increasingly disconnected from the south's 'eat-street' vibrancy, and focused on car-oriented uses. The new light rail, if coordinated with built form, public domain and land use planning, brings the opportunity to revive the N-S 'high-street' though smaller scale retail uses. Employment opportunities provided by the existing business premises should be retained within new development, preferably outside the retail axis.
- There is currently a deficit of public open space provision within walking distance to the existing population, and the amended controls would bring additional residents. A multi-use community facility, a public indoor sports centre and provisions to encourage private child-care centres are also required. Given the spatial constraints within the precinct, this infrastructure would need to be delivered as part of redevelopment. That also means that
- Recent residential development is mostly of a generic quality and provides a noticeably poor design and development outcome to the streetscape and to the Parramatta River. The unattractive public domain was identified as a key factor impacting the attractiveness of the place and the willingness of higher-quality developers to invest in the area.

5.2 Summary of design considerations

Country

by Djinjama

This summary has been prepared by Hassell based on designing with Country guidance provided by Djinjama

The analysis undertaken in this section (PART 1 of the report) and resulting design considerations were presented to Government stakeholders and further refined based on feedback received. A summary of the refined design considerations is provided here.

While not all considerations are relevant to reviewing the height of buildings and floor space ratio controls for the precinct (PART 2 of the report), they are important considerations for detailed design stages and/or further planning for the area.

- Health and well being of Country must be at the forefront of all decisions, remembering to work with Country rather than to the needs or wants of humans
- Include Dharug Knowledge Holders in the planning and implementation of creating balance in the environment
- First Nations voices are heard and language is included
- Create spaces for Aboriginal culture and heritage to be reflected back to the community in the built environment, and spaces that allow Burramattagal cultural practices be brought back to this Country
- Create culturally safe, public, open spaces that encourage truth-telling, learning from the past, and each other
- Provide publicly accessible spaces for sharing the diverse cultures that make up the site today
- Designs should have a sense of being birthed by this Country rather than a faraway place
- Reflect on the original topographies and how these can be reintroduced back on Country
- Consider the broader cultural landscape and how this place relates and can balance and be rebalanced by relating to healthier parts of Country
- Provide for a balanced system of integrated networks that accommodates and supports non-humans and more than-humans
- Development must not interfere with the natural course of water (including the Brickfield Creek and the Parramatta River) but integrate WSUD, let water slow down and clean the landscape
- Enable permeability in relation to waters being able to access the ground and original waterways, open up and if possible naturalise stormwater infrastructure
- Provide for the increase of micro habitats related to water
- Mitigate urban heat by increasing canopy cover with endemic species, and create a succession plan for removing invasive species.
- Include planting that provides food sources for kin
- Re-establish green corridors for safe kin movement and encourage return of fauna species to the area that have been pushed away due to habitat fragmentation
- Use materials that are/were once native to the area and colours that reflect the Parramatta River
- Use diverse local materials that belong to Country while not causing further harm to Country

5.2 Summary of design considerations



Landscape and Environment

- Development responds to Country and the natural characteristics of the landscape, including topography and views towards important landscape features
- Improve visual and physical connections to the riverfront
- Maximise views to the sky
- Protect and enhance vegetation groups, tall trees, and the conditions for vegetation to grow
- Maximise tree canopy cover and provide sufficient deep soil to support the tree canopy; prioritise, and not further reduce, the provision of canopy cover and deep soil
- Contribute to the restoration and regeneration of natural systems,
- Development should contribute to connectivity between existing and proposed landscape corridors and public spaces
- Development must contribute to improved flooding conditions and water quality within the Brickfield Creek catchment and in the Parramatta River
- Provide for protection of human life during flooding events, prioritising natural responses to flooding and mitigation measures that will not impact the experience of the public domain

- Address the existing shortage of open space and ensure adequate provision of open space to the future community
- Improve walkable access to open space and social infrastructure through cross block connections and additional tree canopy
- Recognise streets as open spaces with places for respite and play which will be enhanced with increased planting, reduction of vehicular traffic generating uses
- Prioritise opportunities to deliver community infrastructure through redevelopment, including as a minimum an indoor sports centre and a multi-use community facility
- Facilitate the provision of private child care centres as part of new development
- Deliver generous and attractive through-site links that increase mid-block permeability, facilitate safe and direct movement
- Minimise overshadowing from buildings into public open spaces and streets
- Protect the amenity of existing and planned adjoining dwellings
- Deliver facilities and a mix of dwellings tailored to the needs and cultural preferences of the local community; provide for families and ageing in place



Community and Liveability



- Individual or cumulative impacts of development must not diminish the heritage values of North Parramatta
- Avoid a continuous wall of buildings and homogeneous built form facing Church Street, Sorrell Street, Villiers Street and the river
- Buildings should not visually dominate the skyline over a broad area and allow a predominantly green ridge line to be seen from the Old Government House
- Buildings should respond to culturally and historically significant views and vistas both through setbacks and articulation
- Development should seek to integrate and not isolate heritage items, contributory buildings and heritage conservation areas
- Buildings should transition in bulk and scale to neighbouring heritage items, heritage conservation areas and the Parramatta River
- Retain views to the All Saints Church spire from Church Street, the blue sky backdrop to the (former) St Peter's church seen from south of the river, and the blue sky views towards north and south along Church Street
- Retain E-W open views at ground level across Church Street between the conservation areas
- Use quality materials that respond to, but not imitate or detract from, the heritage of the area

- Development must enhance, not detract from the character that is uniquely North Parramatta and from emerging contemporary attractors such as the MAAS and the Riverside Theatres
- Revive Church Street as the N-S 'high-street' spine of Parramatta: redirect car generating uses to the surrounding small centres, improve the public domain and encourage retail uses, outdoor dining and a night time economy
- Strengthen the role of Victoria Road as hub for local commercial uses and ensure the quantum and diversity of employment uses is retained along the side streets
- Maximise opportunities for the precinct to support the Parramatta CBD-Westmead innovation precinct through

- better connectivity, higher quality development and greener streets to attract and retain talent
- Ensure orderly development that retains development potential and amenity of adjoining sites
- Focus on sites that have transformational potential for the precinct
- Increasing FSR alone may not help, focus on lifting desirability of the surrounding area/the street to help increase market demand, attract development interest and higher quality developers



PART 2

REVIEW OF

PROPOSED

CONTROLS





Introduction to this section

Review of the Parramatta CBD Planning Proposal (CBD PP)

Objectives of the CBD PP

Design objectives specific to North Parramatta are not included in the studies and public domain framework provided with the CBD PP, or in the current Parramatta CBD DCP.

The objective of the CBD PP is to create a 'world-class CBD for Parramatta' through an expanded commercial core supported by intensified residential development and a diversity of employment uses surrounding the core area.

A key challenge identified for Parramatta to achieve this ambition is the competition from other centres to attract and retain highly-skilled workers, generating demand for office development to strengthen the commercial role of the centre.

Within the context of North Parramatta, recommendations from background studies to address this challenge and support the vision for the CBD include: providing for a diversity of housing in well designed buildings, improving liveability and attractiveness of the place, and capitalising on the City's differentiating attributes including its diversity, heritage, character and the Parramatta River to attract new residents, visitors and investment.

Review process

Modelling of potential development under the CBD PP controls and alternative built form scenarios was undertaken by Hassell and reviewed by the broader project team.

In the past 10 years, various sites in North Parramatta have already redeveloped into mixed-use at HOB up to 40m and FSR up to 4:1.

There are existing, viable commercial uses and sites with highly fragmented ownership that are unlikely to redevelop in the foreseeable future. Other sites are spatially constrained, where development is unlikely to achieve the full scale proposed.

To ensure that consideration of potential impacts was realistic and not exaggerated, Hassell's built form modelling was focused on sites and amalgamation patterns identified through the Site Potential analysis described in Part 1.

The built form scenarios were modelled and reviewed taking into account:

- the overarching objectives of the CBD PP described here;
- design considerations and opportunities to achieve improved place outcomes (identified in Part 1);
- development potential;

- potential impacts of development, including cumulative impacts to the place values identified.

Given the framework set by the exhibited proposal and the intent for the existing Parramatta CBD Development Control Plan (DCP) to apply to this area, the design response was limited to establishing appropriate building heights.

FSRs were then calculated through built form testing of envelopes resulting from consideration of building height and DCP controls, the Apartment Design Guide, site configuration and high level constraints analysis.

Opportunities to encourage certain design and place outcomes, and support renewal through bonuses were also explored.

The built form modelling undertaken by Hassell is high level, intended to inform the assessment of the CBD PP and is not a masterplan or design vision for the area. It has not considered or tested all constraints in detail e.g. flooding, ecology, soil, heritage, archaeology, overshadowing of adjoining properties and traffic impacts. These are important considerations that could impact built form outcomes and the development potential of each site.

1 Building height

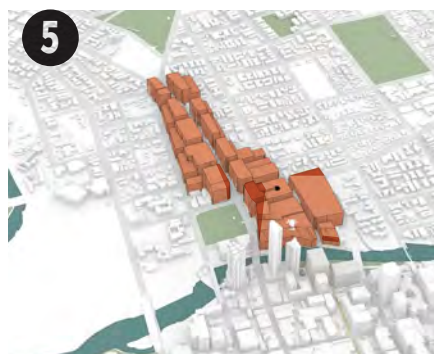
The CBD PP proposes to control the height of buildings depending on the site either through:

- 'blanket' height limits up to 92m (approximately 29 storeys, including bonuses)
- overshadowing restrictions to the southern riverbank and Prince Alfred Square from 12pm to 2pm on the 21st of June
- restricted street frontage height between certain heritage items

Six urban design strategies have been developed to review and refine the proposed building height controls:

1. Respect and reinforce the identity of Church Street North
2. Minimise visual impacts to the heritage conservation areas
3. Transition to the adjoining low scale residential uses
4. Protect solar access to public spaces
5. Retain view corridors of irreplaceable historical and cultural value
6. Respond to clusters of heritage items

These strategies have been interrogated through case studies and scenario testing. The principles established through this process have informed the recommendations provided at the end of this section.



1.1. Respect and reinforce the identity of Church Street North



Light rail spine

The alignment of Church Street is highly significant as one of Australia's first planned streets. The linear, traffic calming nature of light rail offers an opportunity to reinstate Parramatta's vibrant N-S axis.

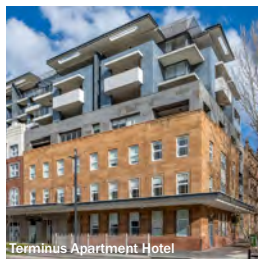
In Newcastle, careful planning of redevelopment coordinated with light rail has brought a new life to Hunter Street; taller buildings address and define the corridor. In Gold Coast, the lack of coordinated height and design controls generated a confusing street hierarchy with dispersed tall towers; a missed opportunity for the light rail to deliver a vibrant 'city-living' spine.



Newcastle East End, SJB, Durbach Block Jaggers, Tonkin Zulaikha Greer Architects



Henk Graelman



Terminus Apartment Hotel



University of Newcastle



portal.engineersaustralia.org.au

Newcastle light rail corridor

Gold Coast light rail corridor



Newcastle East End, SJB, Durbach Block Jaggers, Tonkin Zulaikha Greer Architects



realcommercial.com.au

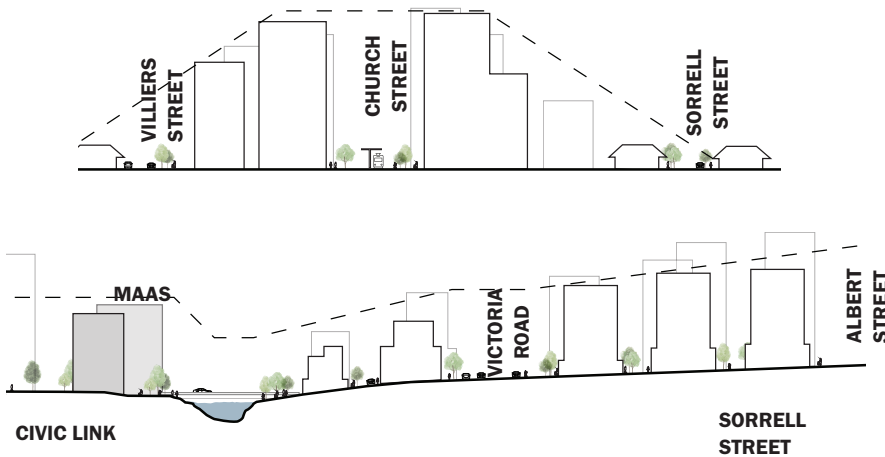
Newcastle waterfront

A desirable waterfront city

Once undesirable and neglected, Newcastle's waterfront has been transformed by development that enhances the precinct through public domain upgrades and generous setbacks.

Restraint of height and form afford shared views between developments and a legible, attractive skyline to the city.





Principles

- Locate the tallest buildings along, and directly addressing Church Street to reinforce its historical and contemporary role
- Building heights respond to, and reinforce the natural topography
- Building heights transition to the Parramatta River, allow for shared views, and retain the human scale and sense of openness of the river corridor
- The scale of buildings across the river from the MAAS should not detract from the prominence of this emerging landmark

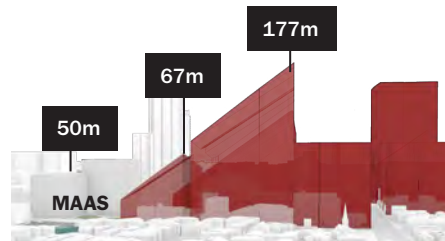
Scenarios tested

The height limits in the CBD PP are not based on a hierarchy of streets or transitions to lower scale areas. The proposal either adopts the same height limits across all sites, or allows unlimited height within a solar access plane. The CBD PP approach would result in some sites being awarded significantly, rather randomly more height than immediate neighbours.

Given the limited number of sites with redevelopment potential, the CBD PP built form testing showed that disproportionately tall towers could result in mid-block locations, fronting the river or in low-lying areas. That could undermine the response to Country, urban legibility and more equitable development opportunities that would facilitate the overall revitalisation of the precinct.

Given the narrow river corridor and the proposed sun protection window being short: 12-2pm in mid-winter, the resulting solar access plane is steeply angled and could encourage tall, unnaturally shaped built form fronting the Parramatta River. Buildings over 16 storeys (up to 34 storeys) could dwarf the MAAS (Parramatta Powerhouse), detracting from this emerging landmark for Parramatta.

CBD PP resulting block envelope controls

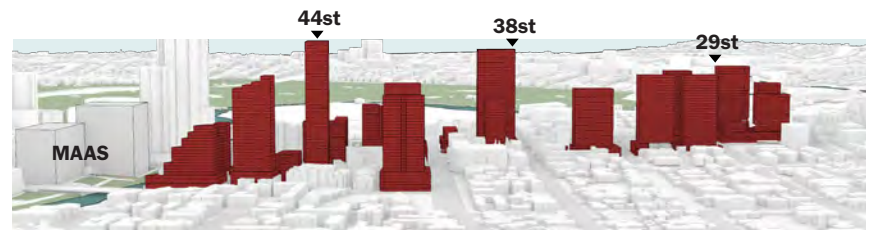


Victoria Road towards Church St Solar access controls resulting in unintended, incoherent height limits

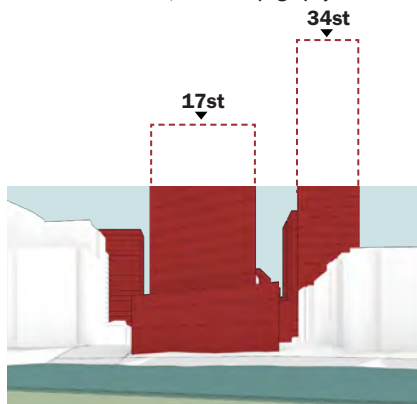


Villiers St looking north. Height controls are otherwise homogeneous, would not deliver a legible urban hierarchy

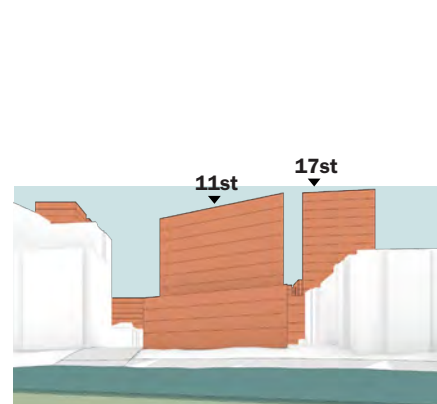
CBD PP potential resulting built form



Mid-block super tall buildings detracting from the Church Street axis and the natural, distinct topography of the northern CBD



Indicative potential view from the future MAAS park considering a human scale view plane



Requiring sun access to the riverbank from 11am-2pm helps retain the sense of openness along the waterfront

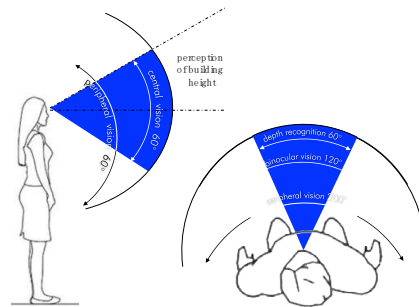
1.2. Minimise visual impacts to the heritage conservation areas



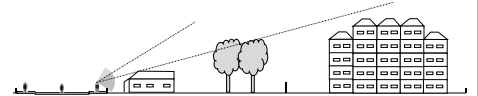
Review of NSW practice

A common approach to protect the setting of heritage conservation areas is to undertake a viewshed analysis.

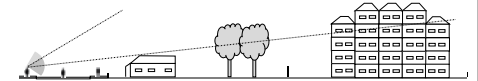
Views are usually taken at eye level at an angle of 60° (an approximation of the human field of view) from different points in the public domain. Above that angle, a person would have to step back and/or tilt their head up to be able to read the building forms, and the perception of scale becomes more overwhelming.



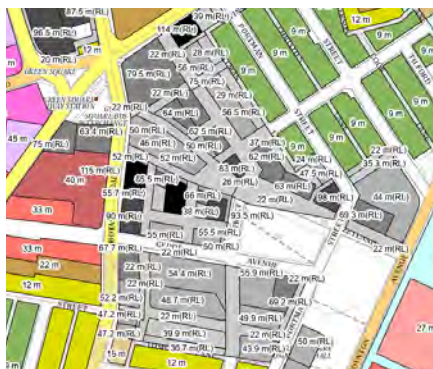
Key arcs of the human field of view. Source: *What Actually Is a Heritage Conservation Area? A Management Critique Based on a Systematic Review of NSW Planning Documents*



Seek to have building forms mostly hidden when directly facing a heritage item from the footpath



Viewer across the street (worst-case scenario); dominance of taller building forms within the field of view should be minimised



Detailed height limits seek to minimise Visual impact to the Portman Street HCA. Sydney Local Environmental Plan 2012



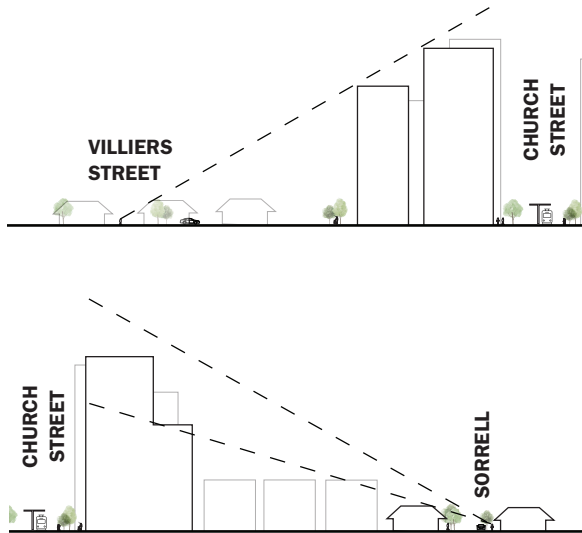
GoogleMaps

Portman Street

Zetland, NSW

In Zetland, NSW (Green Square), the setting of Portman Street is protected through detailed RL-based HOB for new development behind. Built form directly facing the HCA is generally limited to 10 storeys and taller development punctuates the streetscape where it would appear in the peripheral vision of the observer.

The new buildings are completely hidden from pedestrians walking along the closest footpath. From the opposite footpath, the controls ensure that new buildings read as < 2x the height of the heritage items.



Principles

- Respond to the significance of the conservation areas' setting and minimise the perception of a visual barrier between the HCAs by containing development well within the human view plane
- Locate the tallest portions of buildings further from the HCAs (along Church Street). Create a readable relationship of scale seen from the HCAs through articulation/transition towards E-W

**Further controls would be needed to ensure the most appropriate transition can be considered*

Scenarios tested

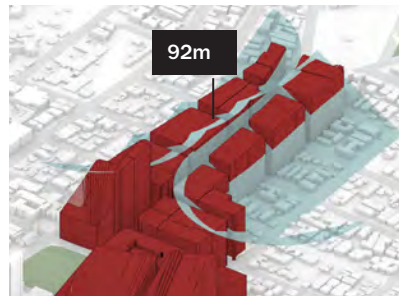
Viewshed and high level visual impact analyses from various viewpoints within the heritage conservation areas (HCAs) indicate that the CBD PP would have the majority of buildings being of a height beyond the human view plane (as seen from the HCAs). A perceived barrier between the two HCAs could result, diminishing the overall heritage values of North Parramatta.

Building forms from 5-12 storeys (40m) closer to the HCAs and up to 17 storeys (57m), if visible from the HCAs would be well contained within the human view plane.

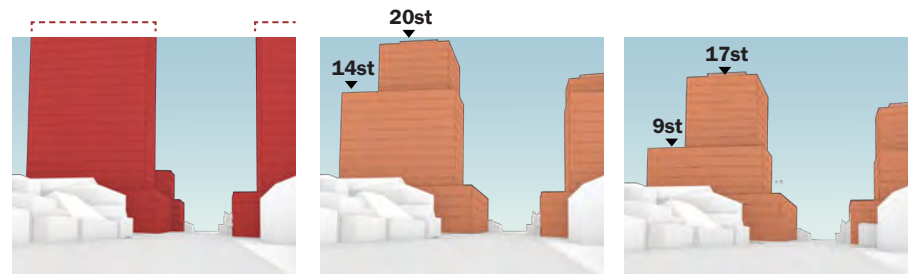
If various buildings taller than 66m (20 storeys) are located along Church Street, mitigation of the visual impact is unlikely to be achieved through building massing controls, materials or design excellence, and the scale of the built form is more likely to overwhelm the setting of the HCAs. The height parameters were derived from:

- Sorrell Street HCA: 60° view plane from the opposite footpath considering the sloping terrain
- North Parramatta HCA: view cones to capture the peripheral vision from the corners with Trott Street (assumed to be the closest points of pedestrian approach into the HCA).

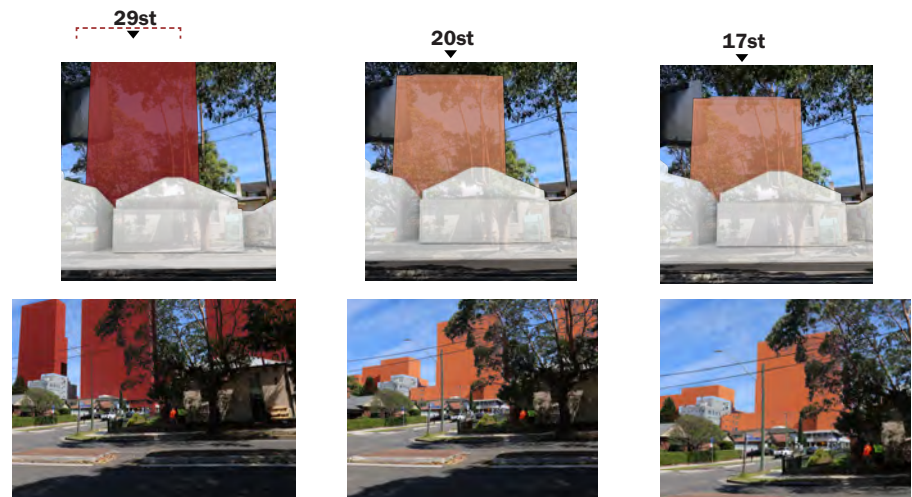
CBD PP HOB block envelope controls



Potential resulting built form



View from the North Parramatta HCA



Views from the Sorrell Street HCA

1.3. Transition to the adjoining low scale residential uses



NSW examples

The 'Midtown' development located in the centre of Macquarie Park adjoins other high-density precincts and a number of low scale walk-up flats, similar to that in North Parramatta.

Development in the precinct is guided by a masterplan that transitions a variety of building forms across an area over 500m from 20 storeys, to 14 storeys, and to 12 storeys at the interfaces with the low scale residential area/walk-up flats.

In contrast, the development shown near Castle Hill is more reflective of the scale and potential resulting built form outcomes of the CBD PP along transition areas.



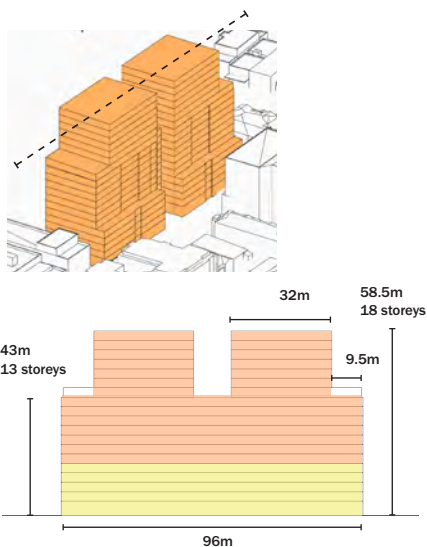
Precinct interfaces. GoogleMaps



Midtown Macquarie Park precinct. Frasers Property



Abrupt built form transitions in Castle Hill



Built form analysis, 8 Cowper Street

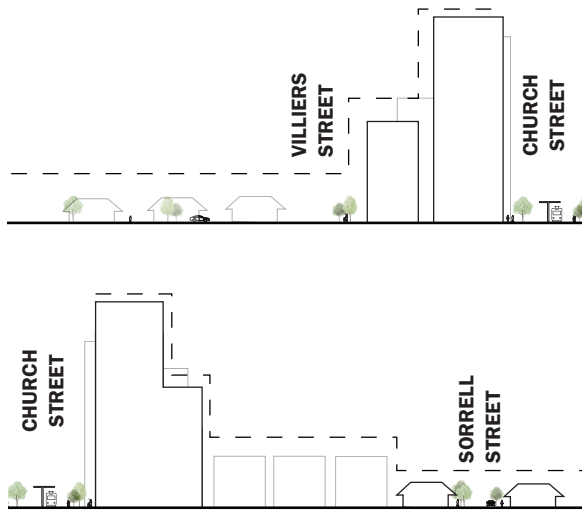


Height of buildings transitioning to the south towards Marion Street

Marion Street

An existing local example of height transitions within a relatively narrower area is observed towards Marion Street (south of Parramatta CBD).

Further detailed design considerations would be needed to guide appropriate built form outcomes in the Church Street North precinct, particularly in the area north of Victoria Road.



Principles

- Limit building height along the Villiers Street interface and give preference to lower street wall heights with ample tower setbacks to ensure an appropriate transition
- Along the eastern interface, development must provide for articulation/transition towards the east and address the rear of the site
- Retain the amenity of existing residents and minimise impacts on the future development potential of adjoining sites

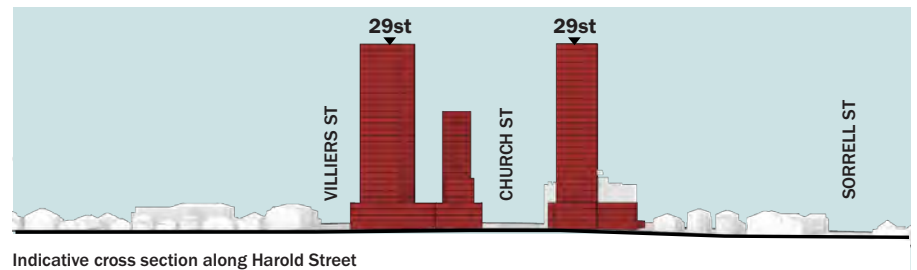
Scenarios tested

Modelling of the potential development sites along Church Street indicates that the CBD PP controls could result in 29-storey buildings along Villiers Street or immediately adjoining existing low scale uses to the east. Besides the potentially overwhelming abrupt scale transition, the amenity of the adjoining sites is likely to be significantly impacted.

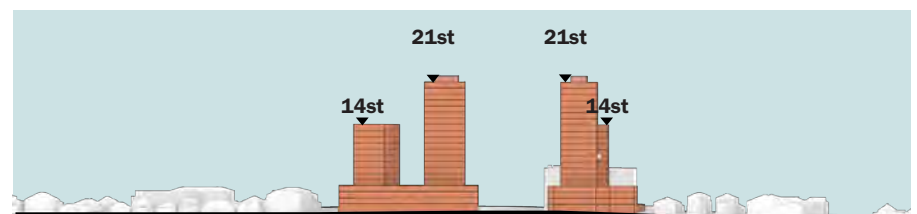
With Church Street being flanked on both sides by existing single dwelling housing and low scale (9m-11m tall) walk-up flats, it becomes challenging to achieve an appropriate transition within the space of one block (or within the same block to the east) and allow a height of building that would still facilitate redevelopment.

However, changes to controls for adjoining areas to the east are under investigation by Council. Testing of the sites with redevelopment potential indicates that development along Villiers Street is likely to be able to accommodate generous tower setbacks. Further height in this area could be considered if development can be guided by future complementing detailed design controls.

CBD PP potential resulting built form



Alternative scenarios tested



Indicative potential alternative transitions to adjoining low scale areas

1.4. Protect solar access to public spaces



Prince Alfred Square

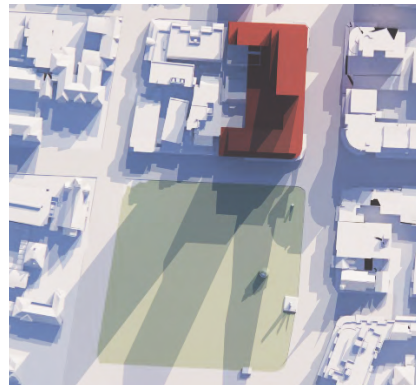
Sun access planes applied as the only height control may result in designs that pursue unusual geometries instead of a response to Country and to place. Equally important outcomes such as retaining view corridors, the amenity of adjoining sites and maximising solar access throughout the day/year may be compromised.

The sun access plane proposed in the CBD PP seeks to protect half of Prince Alfred Square from 12-2pm in mid-winter. It results in an overly narrow geometry that can encourage unrealistic expectations, encroachments and unnecessary impacts to the N-S view corridor along Church Street.

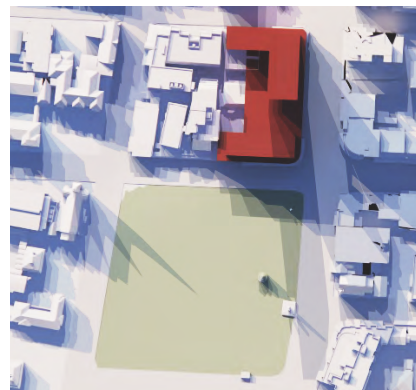
An alternative 11am-2pm sun access plane addresses this likely unintended anomaly with minimal impact to the overall height (less than 5m at the northern edge). It ensures a significantly improved outcome for Prince Alfred Square given:

- its significance as the site of Australia's first Female Factory
- its contemporary significance as the site of many community gatherings requiring enough direct sun light for the lawn to recover between events
- the role of the park as the only open space within short walking distance of future residents, and as the main habitat for the non-human kin in North Parramatta.

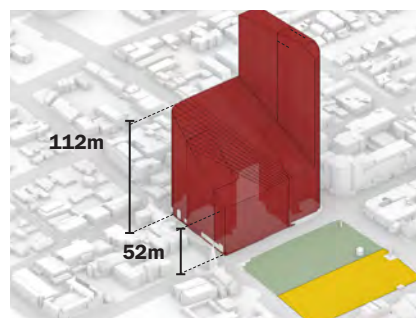
CBD PP controls: 12-2pm 21st of June



9-11am Significant overshadowing in the mornings even for a single-tower development

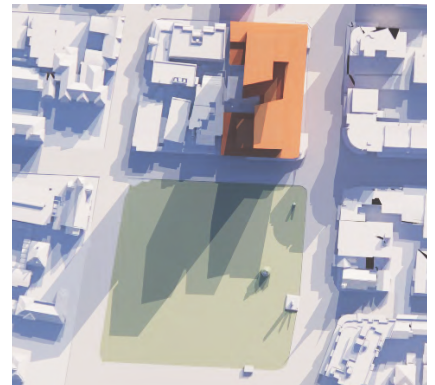


12-3pm

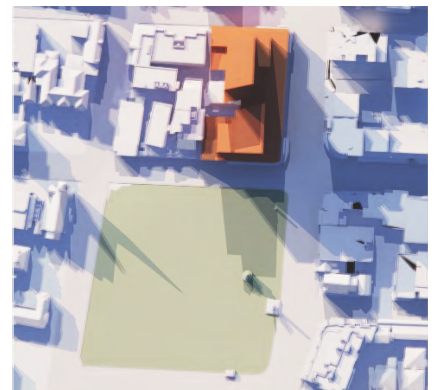


12-2pm sun access block envelope

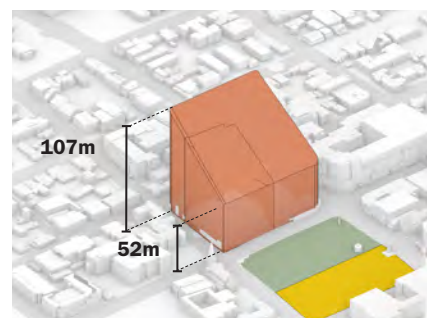
Alternative controls: 11-2pm 21st of June



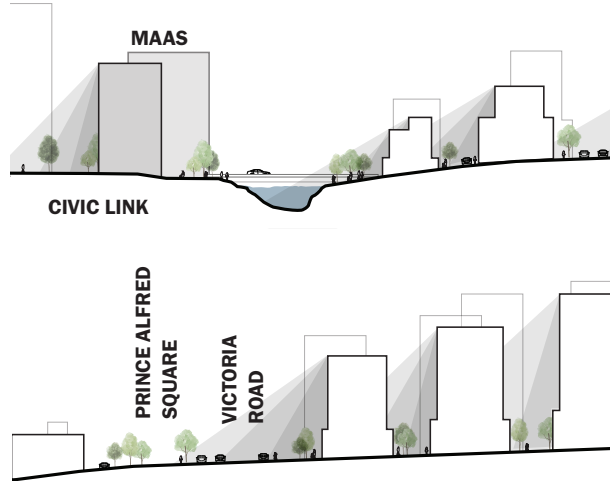
9-11am Significant improvement, particularly from 10am, irrespective of tower configuration



12-3pm (shadow due to tower configuration only)



11-2pm sun access block envelope



Principles

- Height limits are provided in addition to sun access requirements to ensure balanced design considerations
- Provide opportunities for sites to redevelop while maximising opportunities for solar access, sky views, sunlight and sun penetration into the public domain throughout the year
- Expand the sun access time window as possible, particularly where that would have multiple benefits e.g. to the character and heritage values of the area

Southern riverbank

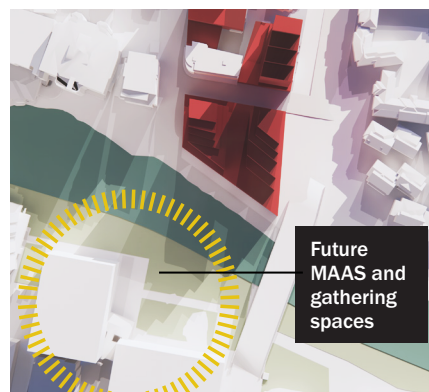
The sun access plane proposed in the CBD PP seeks to protect sun access to the southern riverbank from 12-2pm in mid-winter. That would result in the future open space and gathering places fronting the MAAS being significantly overshadowed outside that period at all times of the year. The overshadowing and disproportionate building scale (17 storeys) that could result across the river can undermine the potential for the museum to become one of Parramatta's greatest landmarks, despite all the investment made.

Although minimising the sun access requirements to 12-2pm can facilitate redevelopment and revitalise some sites across the river, the sub-par outcome for the CBD and Parramatta would likely outweigh the benefits.

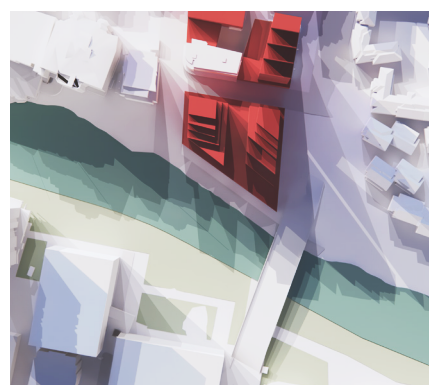
Built form testing showed that buildings up to 12-13 storeys (similar to existing buildings along the riverfront) could be achievable within an alternative sun access plane from 11am-2pm. The expanded time window would have multiple benefits including better sun access in the mornings throughout the year and sun penetration into the river.

A sun access window from 11am-2pm also helps retain the reflection of the sky into the river between buildings, which is identified (HAA) as a defining feature of this historically significant area of the river.

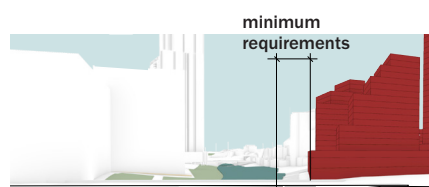
CBD PP controls: 12-2pm 21st of June



9-11am Significant overshadowing on most mornings

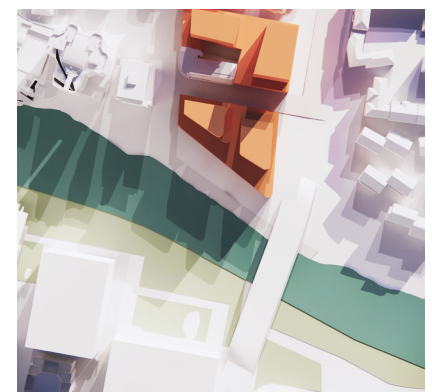


12-3pm Significant impact on sun penetration into, and the reflections on the river



Looking west to the MAAS. Indicative potential CBD PP outcome

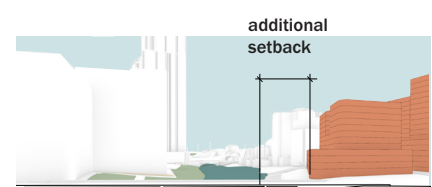
Alternative controls: 11-2pm 21st of June



9-11am Significant improvement in the mornings, particularly from 10am throughout the year



12-3pm Provides sun to the aquatic non-human kin ecosystem and retains the reflections on the river



Stricter height and sun access controls may help shift building massing away from the river corridor yet additional setbacks must be required

1.5. Retain significant view corridors



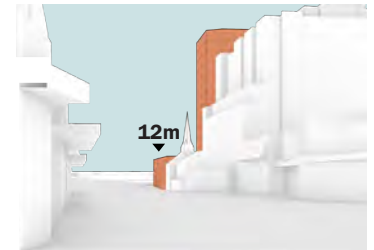
Victoria Road W-E

Lower podium heights with generous tower setbacks would help protect the views towards All Saints' Church. Future detailed design controls should consider further building setbacks to retain the strong relationship between All Saints and St Patrick's churches along Victoria Road.

CBD PP Potential resulting built form



Alternatives



CBD PP Potential resulting built form



View from the south of Parramatta River

Alternatives



Limiting height behind the (former) St Peter's Church spire preserves the arrival experience and legibility of the N-S axis



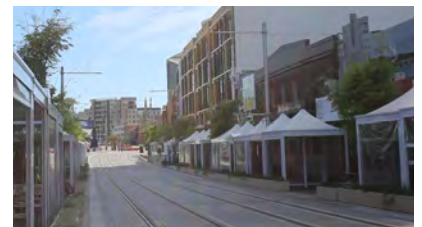
View along Prince Alfred Square



Note: setting back the tower immediately to the north of Prince Alfred Square (on the left) will also help retain the prominence of the monument

Church Street S-N

The alignment of Church Street is significant as the colonial N-S axis. To the south of the river, the blue-sky view corridor against the spire of St John's Cathedral is protected through controls. This corridor extends to the north with distinct views towards the spire of St Peter's Church marking the arrival experience.

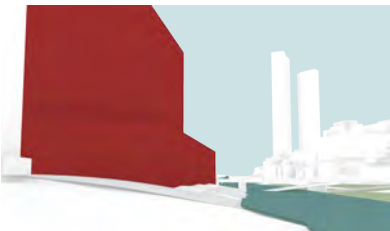




Principles

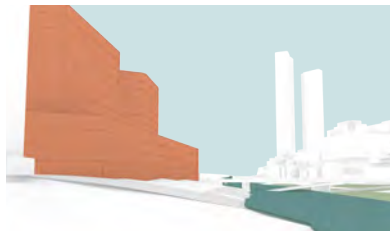
- The siting of towers must protect view corridors of irreplaceable historical and cultural value:
 - to and from the historic Lennox Bridge, the view of the river itself and views along it
 - the N-S blue sky view corridor along Church Street connecting to the corridor south of the river
 - the prominence of views to the parks at the N-S ends
 - the blue sky backdrop to St Peter's Church (from the south)
 - the All Saints Church spire from Victoria Road to the east/west

CBD PP Potential resulting built form



Building responding to the steep sun access plane protrudes towards the river, disconnecting views

Alternatives



Looking east: tower setbacks combined to the 11am-2pm sun access plane help retain the view corridor

Parramatta River

This section of the river has high cultural significance. It is the major historic focal point for the city and key to the identity of the place.

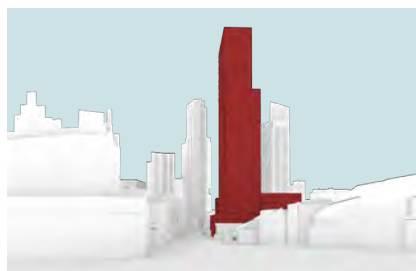
Tower setbacks would help preserve view corridors from a distance but should be supported by building setbacks in detailed design controls.

Church St N-S

The continuation of the southern blue-sky corridor and understanding of the topography and ridgelines are still well preserved within the precinct, framed by new buildings. The N-S corridor is further strengthened by views to tall trees at the termination points of the parks at each end.



CBD PP Potential resulting built form



View from the corner of Fennell and Church Streets. The tower near Prince Alfred Square is set back 6m from the street wall



Same tower in context: legibility of the N-S corridor and the associated historical and cultural connections are lost. Views to the trees at Prince Alfred Square are obscured.

Alternatives



The tower near Prince Alfred Square is set back 12m from the street wall



Same tower in context: the tower setback retains a sense of the blue-sky view corridor and the limited podium height allows for views to the trees at Prince Alfred Square.

1.6 Respond to clusters of heritage items



Development interfaces

Cantilevering over heritage items is seen in other parts of Parramatta. The success of a cantilever depends on scale, roof form and detailed design. simpler building massing roof and massing. The former fire station has relatively large scale with linear facade and roof forms that can be more easily related to taller, contemporary building forms.

In the Fifty Albert example, the heritage item becomes isolated and is overwhelmed by the scale of the development above. The smaller scale of buildings in Church Street North may mean that it is more difficult to achieve a sympathetic cantilever design.



Former fire-station at 140 Church Street, Parramatta. Heritage 21



Fifty Albert: 42-50 Albert Road, Melbourne. Extent Heritage

Source: Compilation of heritage advice by Extent Heritage



Newcastle East End. SJB, Durbach Block Jagers, Tonkin Zulaikha Greer Architects



Abercrombie Street. Extent Heritage

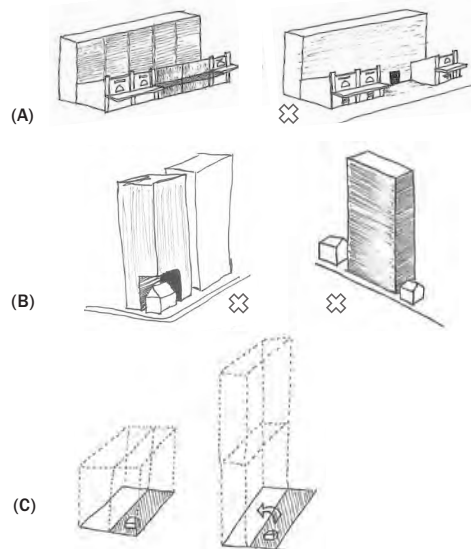
Historical high streets

In Newcastle, the new East End development prioritises setbacks and massing distribution that gives prominence to the listed buildings.

In Sydney, the new development on Abercrombie Street, has a different grain to the heritage listed buildings in front. Particularly in regards to the terraces, this almost layered effect visually separates the old from the new, and is less overwhelming.

Principles

- Ensure low podium heights and wider tower setbacks along street frontages with heritage items
- Conserve the existing pattern, rhythm and topography of streets, avoid long linear podiums
- Commercial streets should retain the mode of street address, without creating gaps (ref. A)
- Development must not isolate, or overhang the space above a heritage item (ref. B)
- Potential disproportionate impacts from amalgamation; benefits must be shared with the item (ref. C)



Source: Compilation of heritage advice by Hector Abrahams Architects (HAA)

'Where a development is of a certain height and is adjacent to a cluster of individually listed heritage items, then the impact of that development upon the significance of the setting of the area must be considered' (HAA).

The CBD PP proposes to restrict height between strips containing heritage items. While that can help prevent heritage items from becoming isolated, it would not prevent cantilevering over the items or retain the overall scale of street frontages where heritage items sit intertwined with contributory buildings and new buildings.

Podiums would need to be lower (2-3 storeys) along street frontages that include heritage items to ensure an appropriate response. The Parramatta CBD DCP requires podiums to be a minimum 14m/4 storeys tall which would not be appropriate.

While the DCP allows a street wall up to 21m with 6m tower setbacks, a lower podium would require much deeper tower setbacks to mitigate the visual impact of the tower on the streetscape and on the setting of the heritage cluster.

Rows of heritage listed items



Church Street



Fennell Street



Ross Street



1.7 Building heights and sun access plane

- Discussion and recommendations

Overview and Sun Access Plane

The CBD PP proposes to control the height of buildings depending on the site either through:

- 'blanket' height limits up to 92m (approximately 29 storeys, including bonuses); or
- overshadowing restrictions to the southern riverbank and Prince Alfred Square from 12pm to 2pm on the 21st of June



The 'blanket' height limit of the CBD PP does not seem to be based on, or seek to reinforce a hierarchy of streets and could encourage homogeneous built form. Appropriate height transitions (discussed in the opposite page) will be important to protect and enhance the place values of North Parramatta.

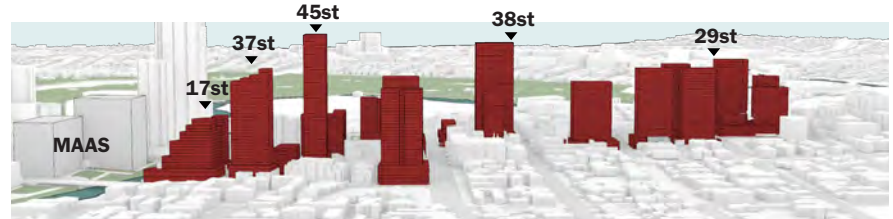
The 12pm to 2pm sun protection window is insufficient. Prince Alfred Square and the planned future open space and gathering places fronting the MAAS would be significantly overshadowed outside of that period at all times of the year.

The sun access protection window should be extended from 11am to 2pm. That would significantly improve sun penetration into the public domain throughout all mornings (compared to the CBD PP).

Sun access controls applied in isolation encourage unnaturally shaped built form that could detract from the character of Prince Alfred Square and the Parramatta River. Given the location of sites yet to be redeveloped, the sun access controls would likely result in the tallest buildings of North Parramatta being located mid-block, in low-lying areas, or away from the main N-S axis on Church Street. The focus of revitalisation could also be shifted away from the light rail corridor.

The built form resulting from the approaches proposed in the CBD PP is likely to undermine a response to Country and the natural topography of the area as well as urban legibility. A height limit should apply to all sites in addition to sun access planes to ensure balanced design considerations and outcomes.

Potential resulting built form



View from Victoria Road towards Church St: indicative potential CBD PP outcome. Building heights limited by solar access may result in unbalanced design responses to Country and incoherent skylines



Looking west to the MAAS: indicative potential CBD PP (right) and alternative outcome (left, assuming maximum bonuses). Bonuses and/or stricter height and sun access controls may help shift building massing away from the river corridor. However, additional setbacks would be required to ensure an appropriate response to river.

Area south of Victoria Road

The Parramatta River is highly significant to First Nation's peoples and to the heritage, culture and identity of the Central River City. Specialist studies highlight the importance of preserving the openness of the river corridor to allow sunlight into the river ecosystem and ensure that the sky between buildings remains reflected on the river.

The remaining riverfront lots to be redeveloped (south of Lamont Street, *map, A*) sit much closer to the river corridor than existing development, and buildings up to 17 storeys would be allowed on the riverfront sites under the CBD PP. Adjoining those sites to the north, a potential development site could achieve approximately 37 storeys under the CBD PP directly fronting the river and the Powerhouse (MAAS). The museum, set to become one of Parramatta's main landmarks, could be dwarfed by new development.

Heritage advice (HAA) recommended ample setbacks for the sites south of Lamont Street and that all views along the river corridor, in particular to and from the historic Lennox Bridge should be preserved. A place-based DCP that allows for additional pathways and generous setbacks to the river and Sorrell Street is highly encouraged. Low height limits are recommended (12m along the river frontage and 28m elsewhere on

the riverfront sites) to minimise visual impacts on the river corridor. Opportunities to expand deep soil and publicly accessible spaces should be maximised on those sites.

The other riverfront sites have already redeveloped and height limits should not change (*map, B*).

According to previous specialist studies and recent heritage advice, the height of buildings and setbacks for properties surrounding the All Saints' Church and the former St Peter's Church must be carefully controlled to preserve their overall setting which is broader than immediately adjoining lots. The blue-sky backdrop to the churches' spires are iconic and unique to Parramatta and must also be preserved.

Rearrangement of height limits for the sites immediately to the north

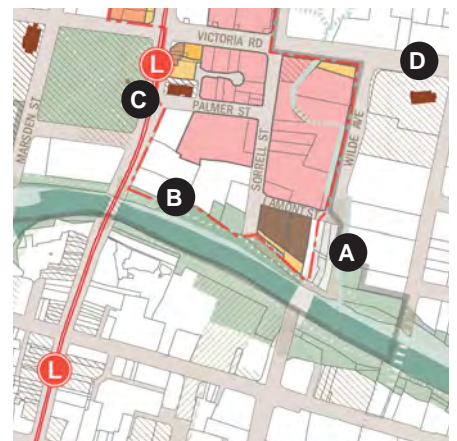
of St Peters' Church (*map, C*) and generous setbacks near the All Saints Church are recommended (*map, D*).

For other sites south of Victoria Road, a height of 15 storeys (49m) is recommended as a scale transition that respects and reinforces the cultural and historical importance of the Parramatta River and responds to Parramatta's historical and emerging landmarks. That will also allow view sharing towards the river and from the river into North Parramatta.

The building heights illustrated in the map below represent the desired future character based on heritage and design considerations, and not necessarily how these could translate into planning controls within the specific context of the Parramatta LEP. That is discussed separately in section 3.

Height of buildings discussion (not planning controls)

	12m 2-3st
	18m, 5st
	28m, 8st
	34m, 8-10st
	49m, 14st



1.7 Building heights

- Discussion and recommendations

Area north of Victoria Road

Viewshed and high level visual impact analyses from various viewpoints within the heritage conservation areas (HCAs) indicate that impacts to the overall heritage setting could be more successfully minimised if building forms are limited to 5-9 storeys closer to the conservation areas and up to 17 storeys (57m) where visible from the HCAs.

Between 17-21 storeys (57-69m), visual impacts are likely and will depend on the location relative to individual items or the quality of existing vistas. Yet, a legible relationship of scale towards the HCAs may be achieved through

building form modulation.

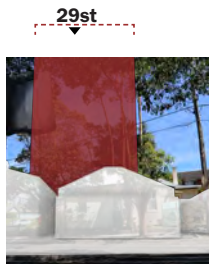
Built form testing indicates that the CBD PP controls would likely result in various, mostly 45m-long towers being located along Church Street and Villiers Street with little height variation (25-29 storeys) perceivable to the human eye at that scale. That is likely to have the effect of a 'wall of buildings' which may disrupt the historical relationship between the two HCA and diminish the overall heritage values of North Parramatta.

The 'blanket' 92m height limit in the CBD PP does not allow for built form transition towards E-W and would impact the amenity and character of the adjoining low-scale areas.

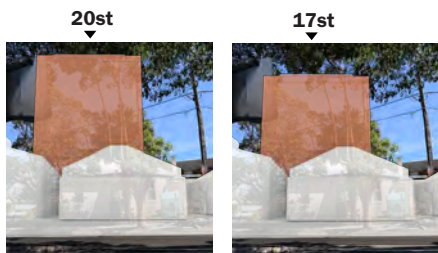
Any development taller than 6 storeys immediately adjoining a low-rise residential area or along Villiers Street will have character and/or amenity impacts that must be addressed through further setbacks and place-specific controls. Additional height may be difficult to achieve under the Apartment Design Guide for retaining solar access to adjoining buildings. Changes to adjoining areas are under investigation by Council and should provide for further transition down to low-scale areas.

To avoid precluding development altogether while adjoining sites are investigated, height zones are recommended considering viewsheds and the sloping terrain to Sorrell St.

CBD PP indicative scenario

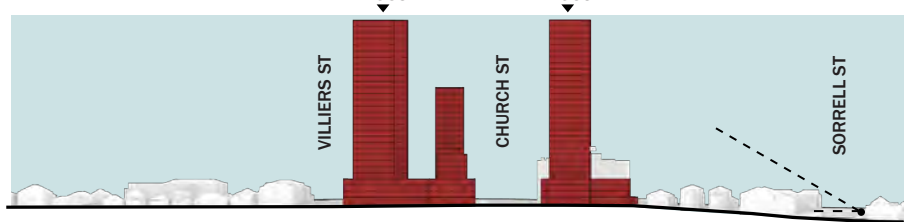


Alternative scenarios tested



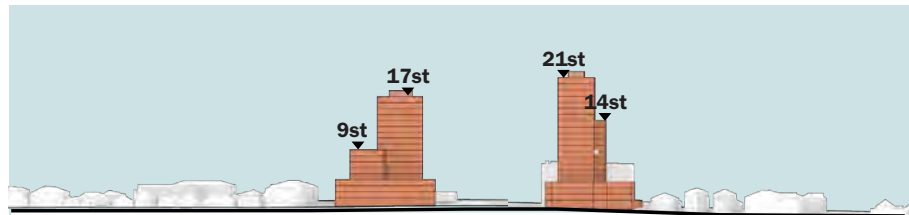
Indicative views from the Sorrell Street HCA

CBD PP indicative scenario



Section along Harold Street - indicative potential CBD PP outcome: lack of built form transition overwhelming the conservation areas.

Alternative scenarios tested



Indicative potential alternative outcome: any development above the current height controls in this area will have potentially significant impacts that must be minimised through further place-based podium and setback controls. Development along Villiers St should be kept to 5-9 storeys where directly adjoining heritage items.

The 'taller zone' (*map, A*) indicates where the tallest portions of buildings should be contained.

The 'transition zones' consider the most likely amalgamation patterns and provide for:

- West (*map, B*): 8-10 storeys low-scale buildings well set back from Villiers Street or, in larger sites, allowing for a building articulation zone towards taller elements
- East (*map, C*): a 9m buffer with a height limit of around 12 storeys aligned with rear setbacks that would be required if sites develop on their own. The buffer zone is to cater for amalgamation with sites to the east (should be encouraged), allowing building articulation towards Sorrell Street while still containing development within a human scale viewplane.

A lower scale interface is also recommended where the precinct immediately adjoins Sorrell Street (*map, D*).

Where street frontages are lined with heritage listed buildings a height limit of 10m is recommended, for 10m from the front lot boundary. That is to protect the street setting of the heritage items, and avoid isolating or cantilevering over heritage items (*map, E*).

Along the western side of Church Street, south of Ross Street, a street wall height of 12m is recommended to retain the views to the trees at

Prince Alfred Square as well as the N-S view corridor along Church Street, connecting to the blue-sky corridor already protected south of the river (*map, F*).

The building heights illustrated in the map below represent the desired future character based on heritage and design considerations, and not necessarily how these could translate into planning controls within the specific context of the Parramatta LEP. That is discussed separately in section 3.

Further considerations for planning controls

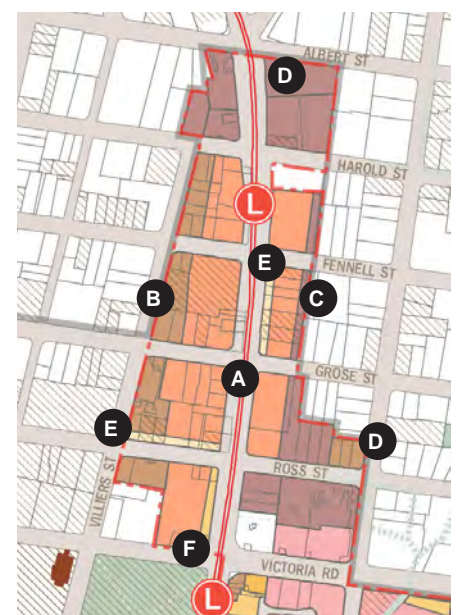
Sites north of Harold Street have already redeveloped and sit at a sensitive location in relation to the views from the Old Government House and the Domain. A height limit of 40m (as per existing HOB for certain sites within these blocks) could be adopted to further simplify the controls (*map, G*).

Height of buildings discussion (not HOB planning controls)

	10m 2st
	12m 2-3st
	34m, 8-10st
	40m, 10-12st
	57m, 17st
	Heritage listed

Along Villiers Street (*map, B*), the potential amalgamation patterns identified indicate that development is likely to be able to accommodate generous tower setbacks. To achieve simplified planning controls, a more uniform height limit of 40m could be considered, complemented by further heritage/detailed design controls to protect the character of Villiers Street.

Additional height could be considered to the south west of Ross Street, where development would sit on the periphery of the HCAs, if/where that would not impact legibility of the natural topography or the setting of the Old Government House and the Domain (*map, F*).



2 FSR

- Discussion and recommendations

Overview

The total FSR potentially achievable through the CBD PP is derived from a 'base' FSR and bonuses as follows:

- south of Lamont Street, a total 6:1 FSR (5.2:1 base FSR + up to 15% design competition 'DC' bonus)
- for all other sites, a total 7.2:1 FSR (6:1 base FSR + up to 15% 'DC' bonus, and up to 5% for buildings exceeding certain environmental performance targets).

For sites < 1,800m², the Parramatta LEP implements a 'sliding scale', reducing the FSR proportionally to the site area.



Area south of Victoria Road

This area comprises four blocks. The block north of Palmer Street has spatial and access constraints. The other blocks have a high concentration of existing residential flat buildings (RFB) developed without a coordinated masterplan.

The FSR achievable in this area would likely be lower than in the area north of Victoria Road that are generally less constrained. Adopting a master planned approach to redevelopment of this area in the future may help balance development potential across the broader precinct.

North of Palmer Street (map, A)

Apart from a mixed use building at the corner with Sorrell Street, the block includes (the former) St Peter's Church and adjoining heritage listed building, and various small lots with commercial strata.

The existing central lane makes most sites unsuitable to residential development without resulting in poor amenity or heritage outcomes. An opportunity remains to redesign and redirect Palmer Lane to improve development opportunities for the whole block while shifting development away from the sensitive view corridors to St Peter's Church.

Without adopting a master planned approach to redevelopment of

this block in the future, significant additional FSR to the 4:1 currently allowed may not be achievable. However, considering the planning implementation through the Parramatta LEP, the 'sliding scale' FSR would apply to the smaller sites. Increasing the 'base FSR' could be considered to support development on those sites, although cementing the existing lot configuration.

Further planning for the area should also seek opportunities to reintegrate the existing employment-generating uses within new development.

South of Palmer Street (map, B)

The riverfront strip is already built out to FSR 4:1, substantial for a riverfront area. The developments sit close together with a large number of apartments facing the river (south), thus relying on sun access to most windows on all the other façades to meet the ADG. That has cascading impacts to the development potential of sites to the north. Future development is unlikely to be able to achieve an aspect to the river without overshadowing the existing façades.

Within those constraints, the FSR proposed in the CBD PP could result in unattractive apartments that may not be saleable, and in poor overall design outcomes that may impact further investment in the area.

North of Lamont Street (map, C)

Development to date has resulted in an impermeable block over 200m long and has seen the culturally significant waterways of the Brickfield Creek channelled and redirected.

Part of this area is identified as being potentially submerged and isolated during flooding events. Additional density should consider those issues and whether redevelopment could ameliorate the conditions through provision of WSUD, further deep soil and through-site links.

Besides the heritage hotel on Victoria Road, development on this block may impact the settings of, and views to the adjoining All Saints Church.

Existing buildings follow a haphazard orientation within the block. The FSR proposed in the CBD PP would likely either: be unachievable due to overshadowing of adjoining RFB, encourage poor building form outcomes, or compromise heritage values/the riverfront character.

South of Lamont Street (map ref. D)

Two sites along the riverfront may have redevelopment potential. The CBD PP would allow up to 17 storeys and 6:1 FSR on these sites. That is high considering potential constraints such as flooding and archaeology.

If the riverfront sites redevelop individually, the CBD PP FSR would encourage many steps in the building

form and/or reduce existing amenity or future development potential of the immediately adjoining site. Without a masterplan, the proposed scale fronting the river resulting from the CBD PP would replicate the 'first-in best dressed' approach discussed earlier, and would also impact design outcomes and development potential of the blocks to the north.

No increase to the 'base' FSR is recommended for the two riverfront sites. Given the gateway location fronting the MAAS, amalgamation and place outcomes should be encouraged through bonuses or a site specific DCP. Opportunities to achieve additional public spaces fronting the river and/or connect the heritage and culture corridor along Sorrell Street to the 'Civic Link' should be explored in the future.

In general, the poor quality of the river interfaces and the public domain have contributed to low economic returns currently achieved in the area, compared to the premiums achieved in other riverfront locations in Sydney. While the CBD PP could achieve redevelopment of a couple of sites, haphazard development at the scale proposed may further erode the ability for the precinct to attract quality developers and unlock broader revitalisation.

The FSRs shown on the map below were calculated through built form testing of envelopes resulting from the height of buildings discussed

earlier, the existing CBD DCP, the ADG, consideration of high level site constraints and potential impacts of the resulting building massing.

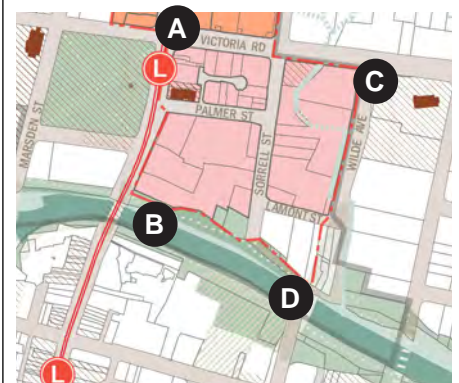
Further considerations for planning controls

South of Victoria Road, the analysis indicated that sites more likely to redevelop are small (the sliding scale applies) or site dimensions may allow for GFA to be potentially accommodated through detailed design solutions (e.g. multiple towers).

Considering the context and complexity of the Parramatta LEP, FSR could be further generalised to have the same maximum FSR for sites north and south of Victoria Road, except where specific FSR or 'no change' has been recommended due to potential impacts to place values.

Total FSR
(not reflecting planning controls or bonuses)

4.7:1 FSR
Heritage listed



2 FSR

- Discussion and recommendations

Areas north of Victoria Road

The FSR of 7.2:1 proposed in the CBD PP is significant and not commonly applied as a 'blanket' to areas of existing sensitive context. It is likely to result in a wall of very tall (up to 29 storeys) homogeneous buildings along Church Street and Villiers Street, with loss of heritage or culturally significant view corridors and views to the sky.

Irrespective of a building's height, poorly articulated massing and building bulk could have significant cumulative impacts to place values.

Above a height of around 20 storeys, buildings become more expensive to construct due to additional requirements (e.g. structural, lifts). Elongated rectangular floor plates are more efficient and encouraged

in the Parramatta CBD DCP up to 45m long which could appear 'bulky' at around 20 storeys. Developers will likely seek to maximise the GFA that can be accommodated within those parameters and minimise height, potentially precluding vertical articulation and the use of alternative building shapes and typologies that could better respond to the area's character and heritage constraints.

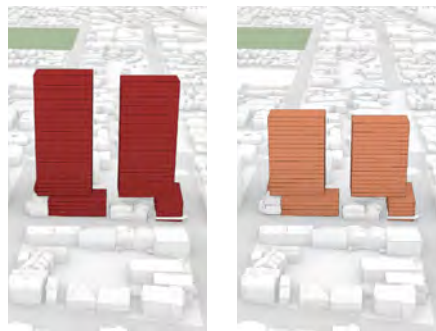
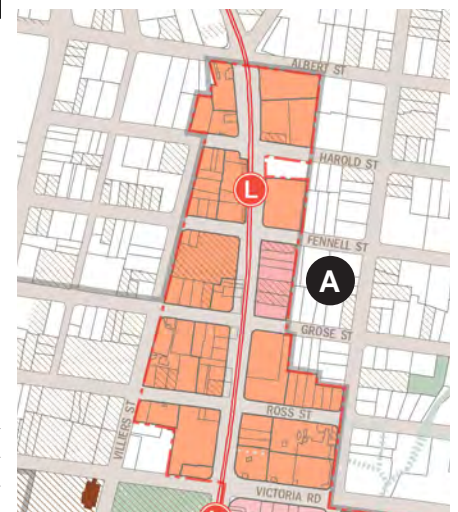
For the block between Fennell and Grose Streets to the east (446-458 Church Street, *map ref. A*), this issue is particularly significant. A number of heritage items located along the street frontage require a low podium. The tower would then become more emphasised and must be further set back. In this current site configuration, a wide facade facing Church Street will inevitably result and additional FSR would exacerbate this issue. Amalgamation to the east

should be strongly encouraged to seek tower forms that minimise bulk along Church Street as well as provide a transition down towards Sorrell Street. Without amalgamation with the eastern sites, an FSR lower than the other sites in this area should be awarded to ensure a small tower footprint.

The FSRs shown on the map below were calculated through built form testing of envelopes resulting from consideration of the height of buildings discussed earlier, as well as the existing DCP controls and the Apartment Design Guide.

The approach provided is generalised and also takes into account that the sliding scale would apply to some of the amalgamation patterns tested.

Total FSR (not reflecting planning controls or bonuses)



Indicative potential CBD PP (left) and alternative outcomes (right) for the heritage strip along Church Street. Reducing the height of buildings alone may not ensure an appropriate design response, and a wall of buildings may result

	5.2:1 FSR
	4.7:1 FSR
	Heritage listed

3 Bonus

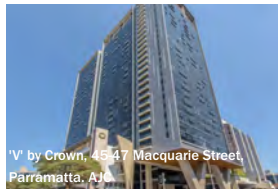
Existing bonuses

The current LEP allows additional 15% HOB and FSR for a building that is the winner of a design competition. Where the land has permissible FSR 6:1 and above, an additional 5% FSR is allowed for buildings that exceed certain environmental performance targets, without height increase to offset bulk.

These bonuses are high within the NSW context. An overall maximum of 10% is more common. It considers that planning envelopes informing the controls would adopt GBA to GFA efficiencies of around 75% that may be improved through detailed design.

A two-staged competition process is commonly adopted to establish the most appropriate FSR up to the total bonus. That step is recommended for North Parramatta, where bulky towers may have cumulative impacts to place values beyond consideration of impacts to adjoining sites.

The existing bonuses may be more achievable in CBD areas with higher 'base' HOB, not in height-sensitive contexts. At the scale of the scenarios tested (including the CBD PP), the bonuses applied to any portion of a site area that exceeds 1,800m² would likely need to be accommodated within the same building envelope. The bonuses specify that the additional % FSR for the land is allowed into the building subject to the bonus, which may not encourage multi-tower development.



Example of potential cumulative impacts to broader place values irrespective of individual buildings achieving design excellence and not having impacts on the immediately adjoining land

Bonus testing: CBD PP scenario

Example site area	2,000m ²
Floorplate efficiency	75% GBA to GFA
HOB base	80m
HOB 15% bonus	12m approx 3 additional storeys
Permissible floor plate	950m ² (as per DCP for buildings > 75m)
Additional GFA from additional height	2,140m² GFA (950m ² x 3 x 75%)
FSR base	6:1 (12,000m ² GFA)
FSR +15% +5% bonus high performing building	2,400m² GFA
Potential undelivered bonus FSR	260m²

Bonus testing: Alternative height limits

Example site area	2,000m ²
Floorplate efficiency	75% GBA to GFA
HOB base	57m
HOB 15% bonus	8.5m approx 2 additional storeys
Permissible floor plate	850m ² (as per DCP for buildings < 75m)
Additional GFA from additional height	1,275m² GFA (850m ² x 2 x 75%)
FSR base	5:1 (10,000m ² GFA)
FSR +15%	1,500m² GFA
Potential undelivered bonus FSR	225m²



233 Princes Highway, Arncliffe.
Bayside Council



39-43 Innesdale Road, Wollli Creek.
Real Commercial



Arncliffe Youth Centre



Discovery Point, Wollli Creek

The place needs identified include a multi-purpose community facility, open spaces, youth recreation spaces and child care centres. There are opportunities for these to be achieved through redevelopment in the area.

In Wollli Creek, the 'Discovery Point' development, built in 2010-2016 provided a 3,100m² 'village plaza', including pedestrian alleyways and a 900m² central green open space. The Arncliffe Youth Centre, built in 2021, was delivered within the 'Bloom' development and includes two indoor multi-purpose courts and rooms for youth recreation/services.

Other bonuses

Bonuses are usually not expected to be achieved in full. Exceeding planning controls is acknowledged to have significant impacts weighted against place benefits such as affordable housing and public spaces.

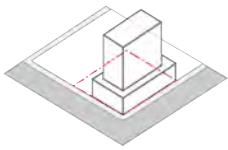
The map and diagrams show examples of place outcomes that could be achieved through bonuses and/or development controls. Further coordination through a public domain strategy could help optimise outcomes. For example, by encouraging public spaces where that also improves heritage curtilage, by prioritising open space outcomes for the areas north of the precinct that currently sit > 200m from open space, or by encouraging larger open spaces through combined pocket parks delivered in adjoining developments. Given the existing lot sizes in the precinct, an area of 3,000m² usually required for a local park may require the combination of various pocket parks.

Examples of bonus conditions that could encourage the intended place outcomes include:

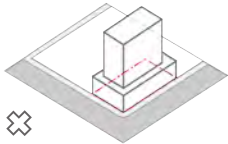
- provision of commercial premises or centre based child care facilities
- delivery of multi-purpose community facilities
- delivery of usable publicly accessible open spaces
- additional deep soil, WSUD and tree canopy requirements.



Site eligibility



Wider sites offer opportunities to mitigate the impact of height and provide positive place outcomes



Narrow sites should not be awarded bonus: a 'wall-shaped building' is likely to result

Example place outcomes encouraged through bonus



Restoration and integration of heritage buildings Increased deep soil, retention of existing trees

Consider

→ Consider bonus to suitable sites where the impacts of bulk and scale can be partly offset by the place outcomes provided

In the future, review the existing bonuses to avoid unintended bulk in areas with lower height limits.

In the future, review the design excellence clause to include consideration to WSUD, potential future development (not just proposed towers), and the significance of the Parramatta River.

Scenarios tested

A few tall, slender buildings along Church Street can create focal landmarks potentially improving overall legibility of the skyline seen from the sensitive areas. That is if site configuration and size allows for additional tower setbacks and built form transition. Visual impact to heritage settings is unavoidable but could be partially offset by improved ground conditions e.g. open space, larger heritage curtilage, heritage restoration, employment uses or services that benefit the community and the place.

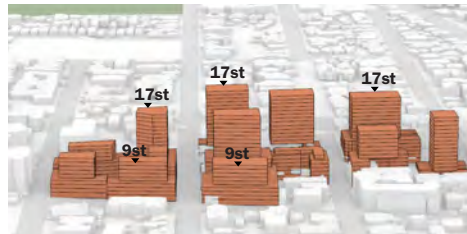
South of Victoria Road, any additional height is likely to impact the setting of Prince Alfred Square, St Peters or All Saints churches, or the riverfront. The focus of the revitalisation may be shifted away from the N-S axis and an incoherent skyline may result. Bonuses should be carefully considered against priorities for this area e.g. retaining trees and deep soil, flooding mitigation or new links.

CBD PP scenario (indicative potential built form along Church Street)



Potential resulting urban form along Church Street with base HOB 80m +12m DC bonus

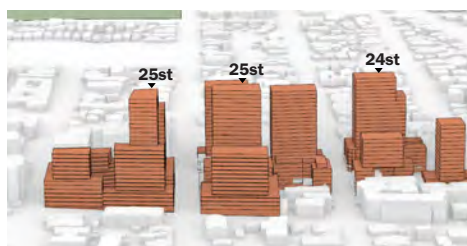
Alternative scenarios (indicative potential built form along Church Street)*



No bonus



Design competition bonus



+15.5m height bonus for place outcomes

**The built form modelling assumes an existing DCP and the framework set out in the exhibited CBD PP. The built form outcomes are indicative only, subject to further testing, and are not intended as a design vision for the area.*

3 BONUS

- Discussion and recommendations

OPTION 1

This option provides the total height of buildings and FSR based on heritage considerations and built form testing, and reflects the desired future character. It has been developed as a stand alone design framework, assuming design excellence and sustainable development as baseline requirements, with no additional bonuses to be applied.

The FSR recommendations are generally derived from:

- potential impacts of the resulting building massing to the place values identified, including Country and heritage considerations (*map, A*)
- the height limits, and high level consideration of site constraints such as existing adjoining development, flooding affectation, i.e. areas south of Victoria Road are likely to achieve a relatively lower FSR (*map, B*).

While the FSR is still generalised (not provided site by site), the total FSR listed in the OPTION 1 table (compared option 2) could more comfortably allow for building massing articulation and a greater variety of building forms to be achieved within the height limits.

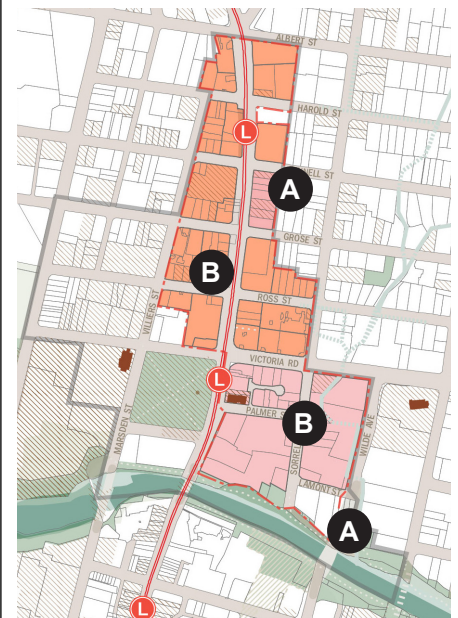
Total building height



TOTAL HEIGHT - NOT SUBJECT TO BONUSES

10m	2-3st
12m	2-3st
18m	5st
28m	8st
34m	8-10st
40m	10-12st
49m	14st
57m	17st

Total FSR



TOTAL FSR - NOT SUBJECT TO BONUSES

5.2:1
4.7:1
no change

The FSR and height recommendations presented in the table include all bonuses and should not be taken as base 'HOB' and 'FSR' controls. The complexities and potential discrepancies resulting from the current bonuses in the Parramatta LEP would need to be factored down for planning implementation of the recommended design outcomes, hence a resulting 'base' FSR control for Option 1 would be lower than in Option 2.

OPTION 2

This option provides a 'base' FSR and allows for bonuses associated with design competitions and place outcomes. The 'base' HOB and FSR reflect the planning considerations discussed in Section 1.7 and Section 2. It provides further simplified height of buildings and FSR that may be more easily translatable into planning controls considering the context of the Parramatta LEP.

Even though smaller sites would not be eligible for bonuses, increasing the base FSR (from current controls) improves opportunities for those sites to redevelop under the sliding scale.

With additional FSR, redevelopment of certain large sites could also deliver improved place outcomes and further accelerate the precinct's revitalisation.

For other sites, the bonuses may allow more housing to be delivered where the additional FSR can be accommodated.

With the addition of all bonuses, this option can result in higher outcomes than Option 1. However, full adoption of bonuses may not be able to be achieved on all sites, for example due to the discrepancies associated to the design competition bonus. However, this option assumes that the issue of bulk can be mitigated by further controls and/or through the competition itself.

Base HOB and bonuses



HOB	+15% design competition	+15.5m place outcomes
10m	-	-
12m	-	-
18m	-	-
28m	32.2m, 9st	47.7m, 12-13st
34m	-	-
40m	-	-
49m	56.4m, 17st	71.8m, 21-22st
57m	65.6m, 19-20st	81m, 24-25st
63m	72.4m, 22st	87.9m, 27st

Design competitions allow for testing of alternative building massing distributions and improved envelope efficiencies. They are recognised as a process to establish the most appropriate FSR for specific site conditions, which is not always the maximum allowed.

Base FSR and bonuses



FSR	+15% design competition	+10% place outcomes
5:1	5.75:1	6.25:1
4.5:1	5.18:1	5.625:1
no change		

If a development comprises lots with varying HOB, bonuses should only apply to the portion of the site with the tallest permissible HOB. Heights at sensitive interfaces must not be compromised. Other clauses in the LEP must ensure that transition to heritage items and HCAs will be appropriately addressed.

Restricting the design competition bonus to sites > 1,800m² could encourage amalgamation and better design outcomes. Smaller isolated sites could achieve exemption from the sliding scale through a design competition.

The additional 15.5m should only be allowed on sites > 2,400m² with dimensions >= 45m x 50m and where development provides positive place outcomes, given that the visual impacts at this scale cannot be fully offset.

Floorplates > 60m must have a maximum dimension of 35m to minimise visual impact and maximise sunlight into the public domain.

4 OTHER CONSIDERATIONS

Character and vistas

The Old Government House and The Domain (OGHD)

Parts of the Church Street North precinct fall within key views of the OGHD identified by Planisphere in 2012 and highlighted in blue in the table. The significance of the views was assessed according to:

- landscape setting,
- layering of cultural and heritage elements, and
- visual prominence and symbolism

Different precincts (areas) where future development has potential to impact the views from the OGHD were identified by Planisphere based on sensitivity – the significance of each view, proximity and topography. Although the Church Street North precinct does not contain areas classified as "highly sensitive", it contains two "sensitive" areas, identified as areas 3 and 7.

Planisphere's guidelines for each area are provided in the opposite page. The guidelines focus on retaining the majority of the green ridgelines seen from the Domain, and on defining the 'riverside edge'. The latter principles have already been discussed and adopted in this report.

Planisphere also recommended updating the design excellence clause to require that future development addresses the guidelines, the views and the settings of the OGHD to avoid a significant impact on the World and National Heritage values.

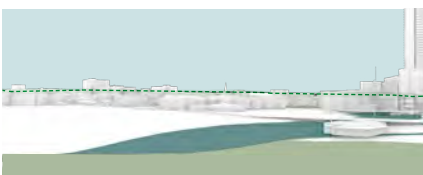
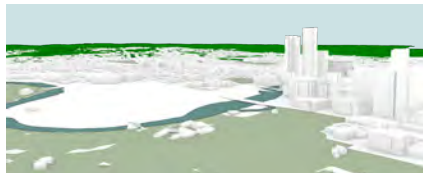
VIEWS RATINGS TABLE

VIEWS	HERITAGE VALUES			TOTAL
	MULTILAYERED	PROMINENCE	LANDSCAPE SETTING	
1: OGH towards the city	2	3	3	8
1b: OGH courtyard towards the city	3	2	1	6
2: Looking NE towards OGH within domain	2	3	3	8
3: Looking NE towards former Kings School from OGH	3	2	2	7
4: Looking N from the crescent	2	1	3	6
5: Bath house area to city	3	2	2	7
6: Looking NE from the crescent towards the city	2	1	2	5
7: Bath house area to Westmead	1	1	2	4
8: Parramatta River views	2	2	3	7
9: Looking E from the crescent towards the city	2	1	1	4
10: Dairy precinct	3	1	3	7
11: Looking N towards the Female Factory	1	2	1	4
12: George Street	2	3	2	7
13: Macquarie Street	1	2	2	5
14: Hunter Street	2	1	1	4
15: Looking E towards Old Government Farm	3	2	1	6
16: Mays Hill	1	1	2	4

- High significance
- Moderate significance
- Low significance



View no. 3: 'Looking NE towards the former Kings School from OGH'. Planisphere



Although the ridgeline appears to be more visible from higher points of view, it appears almost aligned to the existing building line when seen from the OGH



Extent of terrain that was generated seeking to capture the ridgelines

Consider



Source: Principles provided by Planisphere (2012)

Riverside Edge (area 3)

Preserve views along the river and improve overall legibility of the river:

- Height transition between city central and river
- Upper level setbacks in the blocks immediately adjacent to the river, step down in height

Enhance visual connection between landscape and built elements:

- Address the river and any street frontage; a positive, active pedestrian interface with public spaces/promenade along the river
- Buildings designed to the highest contemporary architectural standards

City Edges (area 7)

Retain the majority green aspect (tree-lined ridge) when looking N and NE from the Domain:

- Majority of development is lower in height than the tree-lined ridge
- Materials/finishes reduce distant visibility and minimise contrast against the green backdrop
- Tops of towers are well designed and do not display advertising

Create the city 'edge':

- Development at the city edges is secondary to central area where the tallest buildings are located
- Buildings do not visually dominate the skyline over a broad area

For the purposes of this report, view no. 3: 'Looking NE towards the former Kings School from OGH' was further interrogated. A high level analysis of the view and terrain indicates that:

- The views appear partially obstructed by protected trees within the Parramatta Park heritage area
- The ridgeline sits very close to, and at times behind the existing buildings within the precinct as seen from the OGH

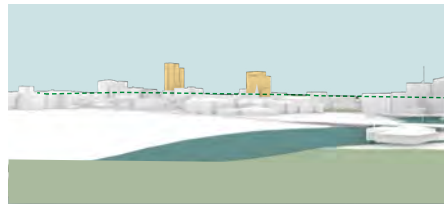
High level modelling indicates that almost any development above the height of existing buildings could interfere with the views to the ridgelines, depending on how buildings are designed or orientated. There does not appear to be a difference between the impacts of the scenarios tested as the scenarios were modelled to the same DCP.

The existing 14-storey mixed use developments as well as approved proposals would also be visible (assuming there are no trees obscuring those views).

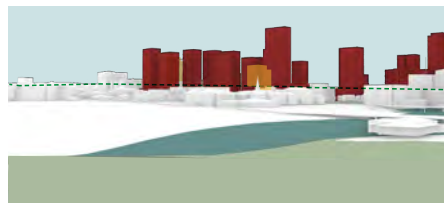
An approved proposal at 8-12 Victoria Road may in the future interfere with views to the St Patrick's Cathedral spire, although the view analysis undertaken is basic and may not be accurate.

Visual impact assessments should be required at detailed design stages considering all relevant views.

Existing with approvals



CBD PP scenario (indicative potential built form)



Alternative scenarios (indicative)*



No bonus



Design competition bonus



+15.5m height bonus for place outcomes

*The built form modelling assumes an existing DCP and the framework set out in the exhibited CBD PP. The built form outcomes are indicative only, subject to further testing, and are not intended as a design vision for the area.

4 OTHER CONSIDERATIONS

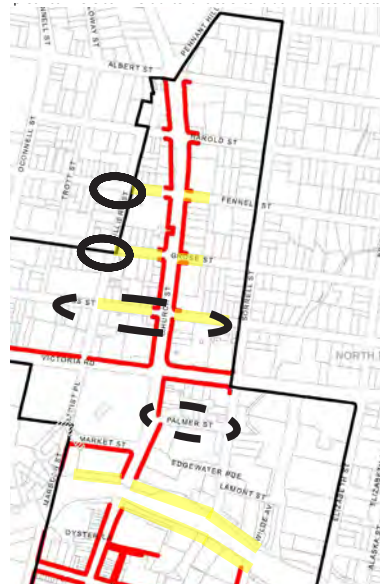
Character and vistas




Active street frontages and character

The CBD PP proposes limited active frontages north of the river. There is currently a significant amount of commercial offices and business premises along Church Street and along the E-W side streets. To minimise loss of employment and support a focus on restaurants and other retail uses along Church Street, future mixed use development on the E-W streets should be encouraged to accommodate those businesses.

The loss of smaller commercial frontages from de-activation of those streets is also a heritage concern identified in Hector Abrahams and Extent Heritage's advice.

In addition, the Parramatta CBD DCP specifies 0m setbacks for active frontages (commercial uses at the ground floor) and 6m setbacks for residential uses at the ground floor. Given the limited lot depth along E-W streets, developers will likely adopt the 0m setback. That could undermine the heritage values and the character of the streets as seen in the example below along Ross Street.



-  CBD PP active frontages
-  Additions to the active frontages map recommended by HAA
-  High concentration of existing employment uses on E-W streets

0m setback eroding the historical street character and impacting street amenity

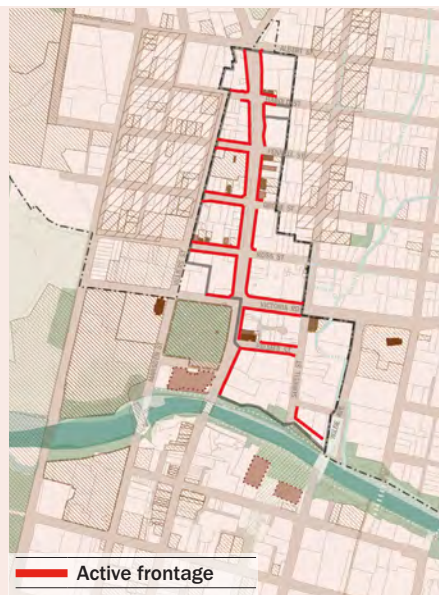
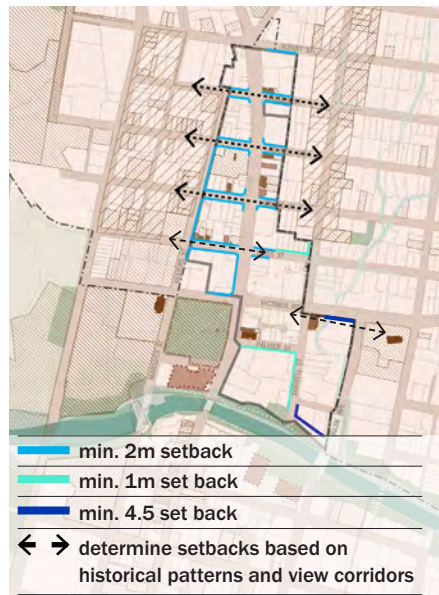


Ross Street



Church Street North





Consider

- 0m setbacks will likely undermine the heritage values and amenity.
- Decouple active frontage and setback requirements and ensure sufficient setbacks for retention of E-W views and street tree planting
- Specify generous setbacks along the river and to open up Sorrell Street towards the river
- Expand active frontages
- Update the DCP to reflect the views identified here and in S.1.5
- Prepare a public domain strategy that responds to the uniqueness of the place

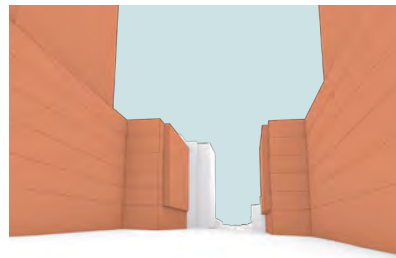
Setbacks

As detailed in section 1.4, narrow road reserves along the E-W streets currently preclude street tree planting. Existing footpaths are narrower than minimum standards currently adopted in outer suburban centres. If development is allowed to be built to 0m setbacks, the public domain is unlikely to be able to support the densities proposed.

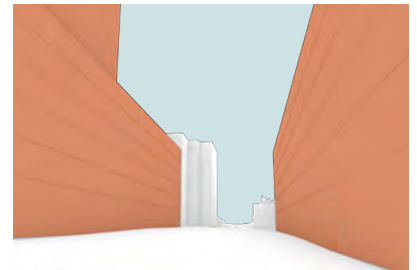
The E-W view corridors across Church Street between the two Heritage Conservation Areas are currently well preserved. New development built to the boundary along E-W streets is likely to significantly impact the heritage values of the broader North Parramatta.

Various special views and vistas could not be appropriately protected through LEP controls alone and should be reflected into a DCP, including the E-W view corridors, vistas to, and the relationship between the All Saints and St Patrick's Churches, and view corridors along the Parramatta River.

Along the edge of the precinct, the river provides a flat, broad surface that acts like a mirror capturing reflections of the sky. New buildings may not only block the sky but may appear to have their height amplified in the reflection. Podiums along the northern bank should have low height, be well separated and provide additional setbacks to all frontages.



Potential for significant loss of visual connections and vistas to heritage items and between the two heritage conservation areas



A minimum setback of 2m could help retain the view corridors, yet setbacks should be further considered to ensure an appropriate response to the individual character of each street

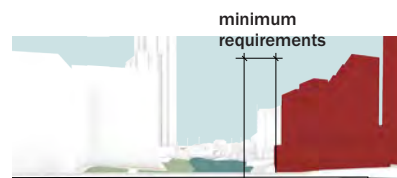


CBD PP Potential resulting built form



Looking east on Fennell Street, GoogleMaps

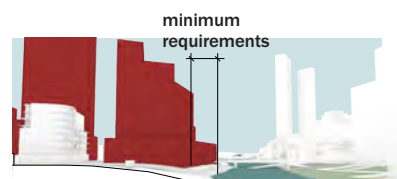
Fennell Street: existing setbacks provide for vistas to heritage items and down towards conservation areas



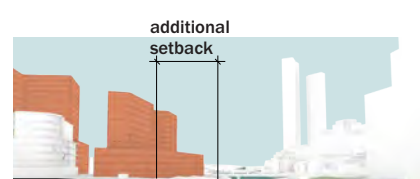
River corridor east to west (indicative, subject to further testing)



River corridor east to west (indicative, subject to further testing)



River corridor west to east (indicative, subject to further testing)



River corridor west to east (indicative, subject to further testing)

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