

File: PP-2017/6 Doc: IC21/240

ITEM 4 DRAFT PLANNING PROPOSAL PP-2017/6 – FORMER CORRIMAL COKE WORKS SITE - 27 RAILWAY STREET, CORRIMAL

On 26 October 2020, Council resolved to defer the draft Planning Proposal, draft Master Plan and draft Development Control Plan Chapter for the former Corrimal Coke Works site for six (6) months, to enable the plans to be revised to reflect a reduced development density. The resolution also called for a Councillor briefing within five (5) months.

Between January and March 2021, a revised Master Plan for the site and other information were submitted in response to Council's resolution. A Councillor Briefing was held on 1 March 2021.

It is recommended that Council resolve to exhibit a revised draft Planning Proposal, a draft Development Control Plan Chapter, a draft Planning Agreement Letter of Offer and associated supporting documentation for community feedback for a minimum period of 60 days.



RECOMMENDATION

- 1 A revised draft Planning Proposal be prepared for Lot 1 DP 795791, Lot 5 DP 749492, Lot 11 DP 749492 and Lot 126 DP 598190 known as the former Corrimal Coke Works, to amend Wollongong Local Environmental Plan 2009 as follows
 - a Amend the Zoning Map (Attachment 7)
 - i Rezone Lot 1 DP 795579 from IN3 Heavy Industrial to R3 Medium Density Residential
 - ii Rezone Lot 5 DP 749492 from RE2 Private Recreation to part R3 Medium Density Residential and part RE1 Public Recreation
 - iii Rezone Lot 11 DP 749492 from SP2 Infrastructure (Road) to RE1 Public Recreation
 - iv Retain Lot 126 DP 598190 as SP2 Infrastructure (Road).
 - b Amend the Height of Buildings Map (Attachment 7) to introduce heights between nine (9) metres and 15 metres.
 - c Amend the Floor Space Ratio Map (Attachment 7) to introduce FSRs between 0.75:1 and 2:1.
 - d Amend the Minimum Lot Size Map (Attachment 7) to introduce a minimum lot size of 449m² for the area proposed R3 Medium Density Residential zoning.
 - e Amend the Riparian Lands Map (Attachment 7) to identify the realigned riparian corridor.
 - f Amend the Natural Resource Sensitivity Biodiversity Map (Attachment 7) to identify significant native vegetation communities.
 - g Amend the Key Site Map (Attachment 7) to identify the site as a Key Site under clause 7.18 Design Excellence.
 - h Amend the Urban Release Area Map (Attachment 7) to identify the site as requiring the provisions of Part 6 Urban Release Areas, clauses 6.1 and 6.2.
 - i Include a new Part 7 Local Provisions for the site incorporating
 - i A "Sun Plane Protection" clause to protect the public open space identified in the Master Plan as "Heritage Plaza", "Central Park" and "Southern Park" from excessive overshadowing by restricting the height of buildings.
 - ii A clause to allow increased heights beyond the maximum height control for certain heritage items: C1 North Stack (37m); C1 Brick Chimney Stack (29m) and the C1 Fine Coal Bin (25m), in the event that they need to be rebuilt.
 - iii A clause to grant development consent to development for the purpose of rooftop plant, lift towers, lift motor rooms and or communal open space and access to any structures associated with such space, that would exceed or causes a building to exceed, the height limits set.
 - j Include a Schedule 1 Additional Permitted Use provision –

Development at ground level for the following purposes within the mapped area (Attachment 8)-

- Business premises.
- Neighbourhood shops with a maximum gross floor area of 150m2.
- Food and drink premises with a maximum gross floor area of 250m2.
- Neighbourhood supermarket with a maximum gross floor area of 500m2.

The combined total gross floor area (GFA) for the above uses cannot exceed 2,000m². The objective of the clause is to limit the size of shops to ensure that the Corrimal Town Centre remains the principal retail area.



k Include a Schedule 1 Additional Permitted Use provision -

Residential development (not including residential flat buildings) up to 11m in height on the mapped area (Attachment 8) that demonstrates appropriate design and construction measures to appropriately mitigate impact from the Grey Headed Flying Fox colony.

- 2 The updated draft Planning Proposal be submitted to the NSW Department of Planning, Industry and Environment for approval to exhibit.
- 3 The draft site-specific Development Control Plan chapter (Attachment 6) with the revisions outlined in this report and supporting documentation / technical studies be exhibited with the draft Planning Proposal.
- 4 The draft Planning Agreement Letter of Offer (Attachment 5) be exhibited with the draft Planning Proposal.
- 5 The draft Planning Proposal also make a housekeeping amendment to rezone the Cross Street Road reserve and part of the former Lot 12 DP 749492 Cross Street from SP2 Infrastructure (Road) and RE2 Private Recreation to R2 Low Density Residential with a Minimum Lot size of 449m², Floor Space Ratio of 0.5:1 and Height of Building limit of 9m (Attachment 7), consistent with the adjoining Cross Street residential properties.
- 6 The draft Planning Proposal, draft Development Control Plan chapter, draft Planning Agreement Letter of Offer and supporting documentation be exhibited for a minimum period of 60 days, in accordance with Council's resolution 3 April 2018, noting a community information session may not be possible given COVID-19 restrictions and hence alternative methods of community engagement will be utilised.
- 7 During the exhibition period, consultation be undertaken with the following agencies
 - a NSW Department of Industry Crown Lands and Water Division.
 - b NSW Environment Protection Authority.
 - c NSW DPIE Environment, Energy and Science.
 - d Heritage NSW.
 - e Endeavour Energy.
 - f Transport for NSW (includes former RMS and Sydney Trains).
 - g Sydney Water.
 - h Emergency response organisations (SES, RFS, NSW Fire and Rescue etc).
 - i Commonwealth Department of Agriculture, Water & Environment.
- 8 A post exhibition report be prepared for Council to consider. The report shall outline any proposed revisions to the draft Planning Proposal, Master Plan, draft DCP chapter and Letter of Offer.
- 9 Council note that the NSW Department of Planning, Industry and Environment will retain the authority and exercise plan making delegations.

REPORT AUTHORISATIONS

Report of:Chris Stewart, Manager City StrategyAuthorised by:Linda Davis, Director Planning + Environment - Future City + Neighbourhoods

ATTACHMENTS

- 1 Location Map
- 2 Executive Summary of Draft Planning Proposal and Revised Draft Master Plan 2021
- 3 Proponent's Proposed WLEP 2009 Maps Land Use Zoning, Floor Space Ratio, Maximum Building Height and Minimum Lot Size



- 4 Ecosure Submission
- 5 Letter of Offer
- 6 Draft Development Control Plan 30 March 2021
- 7 Proposed WLEP 2009 Maps Zoning, Height of Buildings, Floor Space Ratio, Minimum Lot Size, Riparian Lands, Natural Resource Sensitivity, Key Site Map and Urban Release Area
- 8 Additional Permitted Uses Mapped Areas

BACKGROUND

Subject Site

The former Corrimal Coke Works site is located at 27 Railway Street, Corrimal. The site consists of four (4) lots and has an area of approximately 18.167 hectares, as indicated in the table below. The site is bounded by the main southern railway line on the east, Memorial Drive and residential buildings on the west, Railway Street to the north and Towradgi Creek and residential buildings to the south (Attachment 1). The site is traversed by Towradgi Creek along the southern extent and North Corrimal Creek through the site.

The site was utilised as the Corrimal Coke Works which operated for over 100 years, ceasing operations in 2014. The site comprises coking ovens, stacks, two constructed dams for coke quenching, associated administration buildings, and coal and coke stockpiling areas in the central part of the site. Established vegetation is present across parts of the site.

The area and zoning of the site is summarised in the following table -

Lot	Area	Zoning
Lot 1 DP 795579	7.807 ha	IN3 Heavy Industrial
Lot 5 DP 749492	10.11 ha	RE2 Private Recreation
Lot 11 DP 749492 (located at the end of Cross Street)	30.1m2	SP2 Infrastructure (Road)
Lot 126 DP 598190 (adjacent to Railway Street at level crossing)	0.2467 ha	SP2 Infrastructure (Road)
Total	18.167 ha	

The site is surrounded by low and medium density residential zoning to the north, north-east and east, with some light industrial uses immediately to the north. Open space adjoins the site to the south. The maximum height limit for the site is currently nine (9) metres and the maximum height limit of the adjoining residential areas ranges from nine (9) metres to 13 metres. The site is located within a Low, Medium and High Flood Risk precinct, and includes a notation that the site may be contaminated due to past industrial land uses.

Draft Planning Proposal

In October 2017, a draft Planning Proposal request was lodged proposing the rezoning of the site to R3 Medium Density Residential and RE1 Public Recreation to facilitate the development of 190 lots, achieving 736 dwellings made up of 80 rear loaded terraces, 90 front loaded semi-detached dwellings, three front loaded detached dwellings, six manor homes in two manor house lots, and 556 apartments of between two to six storeys in height.

In addition, a minor housekeeping amendment was proposed to rezone the Cross Street road reserve and part of the former Lot 12 DP 749492 Cross Street from SP2 Infrastructure (Road) and RE2 Private Recreation to R2 Low Density Residential with a Minimum Lot Size of 449m², Floor Space Ratio of 0.5:1 and Height of Building limit of 9m, consistent with the adjoining Cross Street residential properties.



On 3 April 2018, Council considered a report on the preliminary assessment of the draft Planning Proposal request and resolved to -

- Commence the preparation of a draft Planning Proposal, subject to a number of recommendations.
- That a site specific Development Control Plan (DCP) be prepared prior to public exhibition, addressing building heights; floor space ratios; lot sizes; building envelopes; road widths; public spaces; streetscapes; housing types; connectivity and access; views and vistas; urban form design; and design excellence.
- To publicly exhibit the proposal for 60 days and to hold a community information session in Corrinal during the exhibition period.

On 20 August 2018, the then NSW Department of Planning and Environment issued a Gateway Determination. The Determination required a number of studies to be completed and Ministerial Directions relating to heritage and flooding to be satisfied, prior to the Planning Proposal being formally exhibited for community comment and feedback. An alteration of the Gateway Determination was issued 17 February 2020 to allow more time for the draft Planning Proposal to be completed.

The Design Review Panel attended a site visit on 16 July 2019 and provided independent feedback on a draft Master Plan and the draft DCP submitted post Gateway Determination in May 2019.

The studies required from the Gateway Determination were completed and submitted to Council on 23 May 2019 with a revised draft Planning Proposal request, incorporating an updated 2019 Master Plan. The applicant supplied additional information between June 2019 and September 2020 in response to Council Officer, State Agencies and Design Review Panel feedback and requests for information. The additional studies, including urban design and view analysis, have resulted in revisions being made to the 2019 Master Plan.

On 29 June 2020, Council resolved to progress a heritage amendment to Wollongong LEP 2009 as a separate process to the rezoning Planning Proposal. The heritage amendment (Amendment 46) was notified on 11 September 2020, listing part of the site as a Local Heritage Item in Wollongong LEP 2009.

A Final 2020 Masterplan and draft Planning Proposal, accompanying draft Development Control Plan (DCP) and updated draft Planning Agreement (VPA) Letter of Offer were subsequently submitted to Council during August/September 2020. The revised plan proposed the rezoning of the site to R3 Medium Density Residential and RE1 Public Recreation to facilitate the development of some 760 dwellings in largely apartment buildings. The revised draft Plans included a reduced development footprint to incorporate a 100m buffer to a Grey-headed Flying-fox colony (incorporating a southern park of 5,000m²), a 3,000m² central park, and 5% Affordable Rental Housing provision.

On 26 October 2020, Council considered a detailed report on the revised Master Plan, draft Planning Proposal and draft DCP Chapter (available on Council's website). Council resolved that -

- 1 The draft Planning Proposal, draft Development Control Plan chapter and draft Planning Agreement for the former Corrimal Coke Works site be deferred, to enable revised planning controls to be prepared that address the following key outcomes
 - a A maximum number of 550 dwellings, contained in a variety of housing types, as shown in the 2017 draft Master plan previously considered by Council.
 - b The Land Zoning Map continue to show a mix of R3 Medium Density Residential and RE1 Public Recreation.
 - c The Height of Buildings Map be amended to show a range of building heights reflecting the different housing types, with a maximum building height of 4 stories (or 15 metres) and having regard for adjoining development.
 - d The Floor Space Ratio Map be amended to reflect the outcomes of points a and c.
 - e The Schedule 1 Additional Use provision be amended to incorporate permitted use provision for development at ground level for the following purposes: business premises, neighbourhood



shops with a maximum gross floor area of 150m2, - food and drink premises with a maximum gross floor area of 250m2, - neighbourhood supermarket with a maximum gross floor area of 500m2, with a combined total gross floor area (GFA) for these uses cannot exceed 2,000m2.

- f 6.5% of the proposed dwellings be made available for Affordable Rental Housing, through a Planning Agreement, to be managed by a Community Housing Provider.
- g No amendment is required to the proposed Minimum Lot size Map, Riparian Lands Map, Key Site Map, Urban Release Area Map, Local Provisions and other Schedule 1 Additional Use provisions.
- 2 The draft Development Control Plan chapter, site master plan and draft Planning Agreement be updated by the applicant to reflect the above outcomes, and the issues identified in the Council officers report.
- 3 The revised draft Planning Proposal, draft Development Control Plan chapter, site master plan and draft Planning Agreement be reported to Council within 6 months for consideration and determination as to whether the matter should be progressed to exhibition. A Councillor briefing be held within 5 months.
- 4 The draft Planning Proposal also make a minor housekeeping amendment to rezone the Cross Street road reserve and part of the former Lot 12 DP 749492 Cross Street from SP2 Infrastructure (Road) and RE2 Private Recreation to R2 Low density Residential with a Minimum Lot size of 449m2, Floor Space Ratio of 0.5:1 and Height of Building limit of 9m, consistent with the adjoining Cross Street residential properties.

Gateway Determination

The Gateway determination for the draft Planning Proposal lapsed on 20 February 2021. Council officers have requested the NSW Department of Planning, Industry and Environment (Department) issue an extension, or a new determination. The Department has not provided formal advice to Council. Despite the timeframe lapsing, the current determination remains valid pending a new decision from the Department. The legislation does not indicate a consequence if a Gateway timeframe is not met.

The applicant also submitted legal advice suggesting that Council's resolution of 26 October 2020 triggered a requirement for a revised draft Planning Proposal to be submitted to the Department to consider the need for a new Gateway determination.

The revised draft Planning Proposal will be submitted to the Department prior to public exhibition, should the proposed planning controls be endorsed by Council for exhibition.

PROPOSAL

This report addresses the applicant's response to Council's resolution of 26 October 2020 and policy changes since that meeting. This report supplements the detailed analysis contained in the Council report of 26 October 2020.

On 29 March 2021, the applicant submitted an Executive Summary of draft Planning Proposal and their revised draft Master Plan 2021 (Attachment 2). The latest version and supporting documentation shows -

- 1 15 apartment buildings 4 storeys in height includes 1 apartment building for affordable rental housing.
- 2 55 townhouses (assumed 2-3 storeys in height).
- 3 A commercial building 2 storeys in height.
- 4 Affordable housing (35 dwellings) in addition to a 550 dwelling yield total 585 dwellings.
- 5 96.8% of the proposed dwellings setback a minimum of 100m from the core extent of the Grey-Headed Flying Fox (GHFF) camp. 19 townhouse dwellings (3.2%) are proposed to encroach to a minimum 62m setback.



6 3,000m² central park and 3,000m² south eastern park.

On 29 March 2021, revised Zoning, Maximum Height of Buildings, Floor Space Ratio and Minimum Lot Size maps were also submitted (Attachment 3).

The following comments are provided in relation to the various aspects of the October 2020 Council resolution –

Council Resolution 26/10/20	Response
Maximum 550 dwellings with a variety of housing types	The revised Master Plan 2021 illustrates a mix of housing types, including apartment buildings town houses / terraces. The total dwelling yield is 585 (including the Affordable Housing offer).
	The proposed R3 zoning permits a broad range of housing typologies. The ultimate mix will be developed through the DA process and is likely to be informed by market conditions over time.
Mix of R3 Medium Density Residential and RE1 Public	Mix of R3 Medium Density Residential and RE1 Public Recreation zones proposed in revised Master Plan 2021.
Recreation zones	The applicant's request to reduce the buffer to the Grey-headed Flying-fox core camp (from 100m to 62m), if supported, would result in an increase to the area of R3 zone by 2,572m ² to 9.21ha and a corresponding decrease in the area of the RE1 zone.
Amend Height of Buildings Map to show a range of heights reflecting different housing types, with a maximum height of 4 storeys (or 15 metres) and having regard for adjoining development	Revised Height of Buildings Map has been prepared by Council staff which include 15m (maximum 4 storeys) for proposed apartment buildings, 13m for the heritage plaza retail area, 11m for the town house / terrace locations, and 9m for the proposed RE1 public recreation areas and remainder of the heritage plaza.
Amend Floor Space Ratio Map to reflect yield and height outcomes above	Revised Floor Space Ratio Map provided by the proponent includes a FSR of 1.5:1 for apartments in the centre of the site; 1.2:1 for apartments on the periphery; and 0.75:1 for the heritage plaza and proposed town house / terrace location. Previously the maximum FSR sought was 2.5:1.
	These FSRs are considered appropriate for the proposed dwelling types / heights and are consistent with surrounding areas.
Amend Schedule 1 Additional Use provision:	Applicant accepted Council's resolution, which is reflected in the revised draft planning proposal.
Development at ground level – business premises and neighbourhood shops with max gross floor area 150m ² ; food & drink premises with max gross floor area 250m ² ; neighbourhood supermarket max gross floor area 500m ² - combined total gross floor area cannot exceed 2,000m ²	



1	20	21	

Council Resolution 26/10/20	Response
6.5% of proposed dwellings to be made available for	The revised Letter of Offer includes an arrangement to deliver 35 dwellings.
Affordable Rental Housing managed by a Community Housing Provider (VPA)	The total number of Affordable Housing dwellings is proposed in addition to the 550 dwelling yield / cap referred to in the October 2020 resolution.
Draft DCP Chapter be updated to reflect the above outcomes and the issues identified in the Council Officer report	An updated draft DCP Chapter has been submitted.
Draft site Master Plan be updated to reflect the above outcomes and the issues identified in the Council Officer report	Draft Master Plan layout submitted 5 January 2021 and revised versions submitted 11 February 2021, 22 March 2021 and 29 March 2021.
Draft Planning Proposal be updated to reflect the above outcomes and the issues	The applicant has submitted an Executive Summary of the revised draft Planning Proposal, updated Master Plan layout, Zoning, Height of Buildings, Floor Space Ratio and Minimum Lot Size maps.
identified in the Council Officer report	This information is sufficient for Council officers to update the draft Planning Proposal, for submission to the NSW Department of Planning, Industry and Environment.
Draft Planning Agreement be updated to reflect the above outcomes and the issues identified in the Council Officer report	A revised Letter of Offer was received on 30 March 2021 (Attachment 5). This is sufficient to progress to the next phase of the process.
A Councillor briefing be held within 5 months of the Council report date (26 October 2020)	A Councillor briefing occurred on 1 March 2021.
Council report to be submitted within 6 months of the Council report date (26 October 2020)	This Council report will be considered by Council on 19 April 2021, within 6 months of the previous resolution.

ISSUES FOR CONSIDERATION

Development Footprint

The revised Master Plan 2021 incorporates the following amendments requested by the applicant -

- A reduction in the buffer to the Grey-headed Flying-fox (GHFF) camp from 100 metres to 62 metres and straightening the southern road.
- The proposed southern park has shifted slightly east to be adjacent the rail corridor

The request to reduce the buffer is in response to Council's previous resolution to reduce overall building heights and housing density across the site. To achieve this outcome an increase in the development footprint is proposed from 9.46 ha to 9.90 ha an increase of 4,328m².

Otherwise the revised Master Plan 2021 is similar to that considered by Council on 26 October 2020. The main access point remains at the intersection of Harbinger and Railway Streets. The access road alignment will provide views to the Chimney stack. The proposed east–west roads remain aligned with the view corridors from the roads on the eastern side of the railway to the escarpment (eg Murray



Street), recognising the role that the site specific draft Development Control Plan (DCP) will play in ensuring these views are maintained through building design.

Built Form

The revised Master Plan 2021 built form is similar to that considered by Council on 26 October 2020, with the exception that the building typology in the southern precinct has changed from apartments to multi dwelling housing (ie town houses / terraces). The applicant has indicated that approximately 10% of the projected yield for the site will take the form of multi-dwelling housing of this type.

The revised Master Plan 2021 shows 15 apartment buildings and 55 town house/terrace typologies. The applicant has advised that the design accommodates 585 dwellings, including 35 dwellings for Affordable Rental Housing. The maximum building height has been reduced to 15 metres (4 storeys), consistent with Council's resolution.

The revised Master Plan 2021 doesn't contain details on site widths for the multi-dwelling housing, and hence the DCP will be important in ensuring appropriate access arrangements for these dwelling types (eg if proposed site widths are narrow, the need for rear lane access may be triggered).

Grey-Headed Flying-fox Colony

The revised Master Plan 2021 shows a proposed reduction in the buffer between the planned residential development and the existing GHFF core camp extent from 100 metres to a minimum 62 metres (as shown in the image below). The applicant suggests that the reduced buffer and corresponding increase in development footprint is required to accommodate a 585 dwelling yield whilst also complying with the previous Council resolution to reduce the building height from 6 to 4 storeys.

The applicant notes -

- The nearest dwelling façade is 62 metres
- The facades of the townhouses at the southern edge of the development range in distance from 62 metres to 83 metres
- The nearest private open space to the core camp extent is at a distance of just over 75 metres
- In total, there are 19 townhouses (plus an additional 2 rear yards) that fall within a 100 metre buffer plus one small corner of an apartment building





In support of the proposed buffer reduction, the applicant submitted the following record of site inspections and GHFF count data –

Date	Survey Method	Count
May – September 2020	Site inspection	Nil
October 2020	Site inspection	Bats present in low numbers
3 November 2020	Site inspection	Approx. 50, camp size reduced
Date	Survey Method	Count
11 November 2020	Site inspection	Approx. 50, camp size reduced
6 December 2020	Site inspection + fly out	Approx. 300
21 January 2021	Site inspection + fly out	Approx. 200
1 February 2021	Site inspection + fly out	Approx. 450-650

The applicant suggests that 'this ongoing monitoring data reinforces the view that the spike in numbers over December 2019 / January 2020 was linked to the unprecedented bushfire activity and climatic conditions and does not reflect the typical occupation pattern of the camp'.

The data collected over 18 months of regular monitoring is not a scientifically robust baseline to understand with any certainty the population dynamics and occupancy of a GHFF roost camp. It would appear however at this site there has been a steady increase in the regular camp numbers year on year since it was first observed in 2015.



The population dynamics of any GHFF roost camp can vary markedly based on local and regional emigration between roost camps, breeding events and a wide range of local and regional environmental variables. This observed spike in numbers over December 2019 / January 2020 highlights the unpredictability relating to the population dynamics of any GHFF roost camp caused by extreme weather events.

The Council Officer position that 100m is an appropriate benchmark for a buffer was stated prior to the large influx over the December 2019 / January 2020 period and continues to be the position of staff.

The applicant additionally submitted a letter from a consulting firm EcoSure (Attachment 4), which references the following points for considerations –

Submitted comments	Council Officer Response
There has been no new research findings, policies or recommendations in this area since last advice provided 1 June 2020.	The National Recovery Plan for the Grey-headed Flying- fox 2021 was recently released. The final Plan has dropped the specific distances referred to in the draft Plan which suggested <i>'limitations should be placed on</i> <i>developments that can occur within approximately 300m</i> <i>of flying-fox camps'.</i>
A recent survey of 8,000 residents within 300m of 31 camps across NSW, Qld and Vic showed that there is no clear distance effects	Council has been monitoring emerging policy from other councils and States to guide our position on an appropriate buffer.
when comparing the 'degree of bother' with distance to the camp. Impacts are generally attributed to a person's tolerances, background and social values	For instance, in October 2020, Campbelltown City Council release its revised draft Macquarie Fields (Bingara Reserve) Grey-Headed Flying-Fox Camp Management Plan. At Section 2.4 the document states that 'Council has received complaints in relation to the camp year-round with the highest frequency in August 2015 coinciding with the maximum recorded occupancy of the camp (approximately 17,000 GHFF). The majority of complaints have been received from residents living within 100 m of the camp.'
	A distance of less than 100m is generally considered to be a potential high conflict zone. (Flying-fox Roost Management Guidelines 2020 – Qld Govt; Chapter A19 of the Tweed Shire Council DCP)

Submitted comments	Council Officer Response
Using building materials such as double- glazing windows significantly reduced the external noise level measured inside a house adjacent to a roost, more so than buffers	Documented resident complaints tend to centre on amenity impacts including smell, noise, droppings associated with the fly in and fly out (on washing, balconies, cars), loss of property values and community fear of disease.
	Attenuation measures for development in close proximity (and therefore more significantly affected) to GHFF roost camps would add to the cost of dwellings and maintenance. This may include provision of cleaning services, sound attenuation measures, provision of covers over outdoor living areas / cars, installation of air conditioners to help when strong odours prevent windows and doors from being left open (odours are strongest in the breeding season and following rain).
Over-prescriptive controls can serve to demonise GHFF and inadvertently amplify public risk perceptions.	The OEH Flying-fox Camp Management Policy 2015 provides advice on creation of buffers around camps and recommends to "plan to prevent conflict", using land use planning instruments to reduce conflict. It is stated that camp site boundaries and buffers should cater for large seasonal influxes of GHFF, as these trigger greater community concern.
 The following measures were recently recommended to a Sydney Metro Council regarding planning provisions to protect a Flying-fox camp - Inclusion of camp location in property documentation Appropriate building materials and design Buffer of 50m between the maximum examp output perimeter and residence 	A 100 m buffer is supported as an appropriate benchmark by Council staff and DPIE – ESS, the peak State Government agency responsible for biodiversity policy development and the conservation and management of threatened biodiversity and its habitat. A buffer of less than 100m would require resource intensive management measures to safeguard future communities and the GHFF camp and may require enhanced Council resources -
camp extent perimeter and residence	 To develop engagement strategies and handle complaints, and ongoing Council marketing and communication actions to address resident concerns and educate about the GHFF camps.
	• On ongoing consulting services to develop Camp Management Strategies and Plans of Action (and then implement the Action Plans), monitor camp numbers and engage the community through surveys and education programmes to address community concerns and complaints.

Given that the Planning Proposal includes the proposed dedication to Council of the realigned riparian corridor, including the vegetation patch supporting the GHFF camp, Council officers remain of the view that a 100 metre buffer from the core camp to any future proposed residential development is appropriate, noting that the observed camp extent recorded to date covers an extensive area beyond the core camp.

If the limited number of townhouse dwellings proposed within the 100m buffer were to be supported, it would be appropriate that they be required to demonstrate suitable design and construction measures to mitigate impact from the GHFF colony.



Access and traffic

Extensive modelling was undertaken to better understand the likely impacts of the proposed development on the surrounding roads, including the rail level crossing.

Overall, the modelling revealed that the current intersection and link configurations will accommodate the additional traffic generated between 2018 and 2026 with most of the key intersections expected to retain a similar level of service in 2026 with or without the additional development. However, during the AM peak, the Memorial Drive / Railway Street intersection is the location most affected by the development's traffic, operating with a Level of Service (LoS) D and average delay of 55.7 seconds (i.e. operating at near capacity). The proposed access to the development site operates with a LoS C and delay of 42 seconds. During the PM peak, the Memorial Drive / Railway Street intersection is expected to operate at a LoS E and an average delay of 62.9 seconds (i.e. at capacity). The reduced development density resulting from the October 2020 resolution will have a corresponding reduction of pressure from the development on the surrounding local road network.

TfNSW has completed an assessment from a State road network perspective, has reviewed the Traffic Impact Assessment (TIA) and notes that the Planning Proposal would generate a significant number of vehicle movements. TfNSW has concluded that major upgrades will be required at a number of intersections on Memorial Drive in the future to accommodate the high traffic demands and has proposed a way forward involving a monetary contribution and other commitments from the proponent.

In terms of site access a consolidated single-lane roundabout at the intersection of Railway and Harbinger streets is the preferred and recommended approach. The option of a second access to the site either from Railway Street or an additional left in / left out access off Memorial Drive was investigated however not deemed appropriate.

A key vision for the site is the provision of shared paths to increase the attractiveness of walking and cycling to key locations including the railway station, bus stops, Corrimal Town Centre, schools, and recreation areas. Reduced on-site parking rates apply under Council's DCP in recognition of the proximity to public transport and the Town Centre.

Retail space

On 26 October 2020, Council resolved to retain the proposed 2,000m² of retail floor space, however reduce the size of the neighbourhood supermarket from 1,000m² to 500m². The applicant accepted Council's resolution, although noted that the reduced floor space yield may impact the viability of the neighbourhood retail precinct which needs to provide a sustainable framework for long term ownership and management of heritage assets.

At the Councillor briefing, Councillors sought information on the size of other supermarkets. The following table provides an indication of other supermarkets Gross Lettable Area Retail (GLAR) (excludes back of house and storage), north of Wollongong –

Supermarket	Gross Lettable Area Retail
Corrimal Coles	2,304m ²
Corrimal Woolworths	5,621m ²
Corrimal ALDI	1,700m ²
East Corrimal Foodworks	300m²
Woonona IGA	1,475m ²
Bulli Woolworths	3,689m²
Thirroul Coles (existing)	1,241m²
Thirroul Coles (DA-2020/363 under assessment)	2,820m ²

Supermarket	Gross Lettable Area Retail
Thirroul IGA	1,085m ²
Helensburgh Coles	1,950m²
Fairy Meadow ALDI	1,544m²
Fairy Meadow Woolworths	4,002m ²
Fairy Meadow Coles	3,008m ²
University of Wollongong IGA	423m ²
Wollongong ALDI	1,175 m²
Wollongong Woolworths	6,899m ²

Heritage

On 29 June 2020, Council resolved to progress a heritage amendment to Wollongong LEP 2009 as a separate process to the rezoning Planning Proposal. The heritage amendment (Amendment 46) was notified on 11 September 2020, listing a large part of the industrial site as a Local Heritage Item in Wollongong LEP 2009.

The NSW Heritage Council is separately considering whether the site warrants a State Heritage listing. It is unknown how long this assessment will take. The exhibition of the draft Planning Proposal will trigger the need for a formal response. Input from Heritage NSW will be essential in informing the appropriate future heritage management expectations for the site.

Draft Planning Proposal

In April 2017, the applicant submitted a draft Planning Proposal request. Council officers subsequently prepared a draft Planning Proposal to support Council's 3 April 2018 resolution and submitted it to the NSW Department of Planning, Industry and Environment.

Since the 26 October 2020 Council meeting, the applicant has submitted an Executive Summary of the revised draft Planning Proposal, updated Master Plan layout, Zoning, Height of Buildings, Floor Space Ratio and Minimum Lot Size maps.

This information is sufficient for Council officers to update the draft Planning Proposal, if supported by Council, for submission to the NSW Department of Planning, Industry and Environment.

Draft Development Control Plan Chapter

Council resolved on 3 April 2018 that the draft Planning Proposal for exhibition include the following additional information -

- A site specific DCP Chapter be developed and submitted in conjunction with the amended Urban Design Concept Plan addressing the following
 - o Building Heights
 - Floor Space Ratios
 - Lot Size
 - Building envelopes
 - Road widths
 - Public spaces
 - Streetscapes
 - Housing types
 - Connectivity and Access
 - Views and Vistas
 - Urban Form Design development



o Clause 7.18 Design Excellence of the Wollongong LEP 2009 (Key Site requirements)

Independent advice on the draft Master Plan and draft provisions for inclusion in the Wollongong Development Control Plan 2009 (DCP) was sought from the Design Review Panel (DRP) to assist in the evaluation of the Planning Proposal. The DRP attended a site visit on 17 July 2019 and provided independent feedback on the draft Master Plan and draft DCP. The DRP noted the importance of a site-specific DCP to provide the community with a level of certainty that the proposed Master Plan can be delivered and provide guidance in the assessment of future Development Applications on the site.

An updated Master Plan was subsequently submitted in August 2020, with an accompanying sitespecific DCP. The site-specific DCP is intended to supplement the land use planning controls contained in Council's DCP, to achieve the vision for this unique site or to reflect site constraints or opportunities. The Master Plan and DCP provides detailed planning and design guidelines (including diagrams) to ensure the resultant built form can deliver on the vision, respecting heritage elements, key views etc.

A draft DCP was submitted by the applicant on 31 March 2021 (Attachment 6). Much of the content is the same as the DCP reported to Council in October 2020. Changes to existing content have been made in response to Council comments (see below). The only totally new content is the inclusion of Section 5.2.3 for multi-dwelling housing, which is a direct consequence of the Council resolution.

2020 Draft DCP Issue	Officer Recommendation 26/10/20	Applicant Response 31/03/21
Table 1: Lists a number of WDCP 2009 Chapters (or part Chapters) that are not applicable to this site.	Delete table – WDCP 2009 applies to the site. The site - specific chapter should only include (and provide justification for) controls to supplement WDCP 2009, where departures to WDCP 2009 are sought.	Table retained
Desired Future Precinct Character expressed as a statement.	Further work required to develop Desired Future Character Objectives, and the development controls intended to deliver the distinct character of each precinct, ensuring the proposed height and FSR combinations deliver the intended character. Precinct controls to consider scale, material, landscaped area, setbacks, articulation zones and streetscape as well as key interfaces, views and connections. Required are images, cross sections, street sections and diagrams of built form typology, setbacks and maximum building length controls etc to support/deliver the diverse precincts envisaged.	Additional details added.

The applicant response to the issues raised is shown below -



2020 Draft DCP Issue	Officer Recommendation 26/10/20	Applicant Response 31/03/21
5.4 Proposed basement controls contrary to the Apartment Design Guidelines (ADG).	ADG control to be included – "protrusion of car parks should not exceed 1m above ground level. Design solutions may include stepping car park levels or using split levels on sloping sites".	Covered by ADG and hence not included in draft DCP
New controls proposed under the following heading: 7.3.3 Street Design and Road Widths	The B2 Residential Subdivision Chapter has recently been updated to include best practice road cross sections involving extensive consultation across Council divisions – these represent new development expectations and should be relied upon.	The proposed cross sections generally align with Council's new road types and hierarchy.
New controls proposed under the following heading: 8.2 Stormwater Management	Section 8.2 Stormwater Management be removed from the draft site-specific DCP and Council's current DCP Chapter (E14 Stormwater Management) be relied on to guide future development.	Section deleted
New controls proposed under the following heading: 8.3 Riparian corridor geomorphology and stability Flood management and riparian corridor geomorphology/stability objectives and controls to reflect flood studies and engineering design work submitted	The riparian design and geomorphology studies were required to provide confidence that a design solution could be achieved. These are not final designs. Further design work will be required at the DA stage in line with Council's current policies. Section 8.3 Riparian corridor geomorphology and stability be removed from the draft site-specific DCP and Council's current DCP Chapters (E13 Floodplain Management and E23 Riparian Land Management) be relied on to guide future development.	Section provides site specific outcomes for the riparian corridor that varies from some of Council's existing DCP controls.
New controls proposed under the following two headings: 8.4 Contamination and remediation 8.5 Earthworks	Sections 8.4 Contamination and Remediation and 8.5 Earthworks be removed from the draft site- specific DCP and Council's current DCP Chapters (E19 Earthworks – Land Reshaping and E20 Contaminated Land Management) be relied on to guide future development.	Sections contain site specific controls that reflect technical studies and other matters. Control 3 in contamination section relating to Coal Wash Reject deleted. Provision for containment cells is a matter for DA.



Additionally, there were a number of areas recommended for further exploration in the 26 October 2020 Council report (while recognising there may be other issues raised through the exhibition). The applicant has responded as follows -

Recommended for further exploration 26/10/20	Applicant Response 31/03/21
Additional site objectives to guide the future development (e.g. protection of the GHFF camp).	This is addressed in the objectives
Further development of appropriate active frontages and loading zones in the heritage precinct, and articulation zone and basement car parking / podium controls in relation to residential development	This is addressed in the relevant controls
Further consideration of the alternative parking rates proposed for specific land uses	No changes to proposed parking rates that have been justified in the traffic and transport assessment
Consideration of the DRP recommendation to include a Public Artwork section in the DCP, including objectives and controls involving the re- use of suitable heritage elements, salvage of heritage materials for integration into art works on site etc.	This has been included
Include residential development controls (as per the DRP recommendation) to reduce the level of disturbance to future residential buildings in the vicinity of the GHFF camp – measures such as orientation of buildings, material selection, noise attenuation etc.	This was already included in the October DCP, but has been expanded
Clarification that a Vegetation Management Plan (VMP) is required for the ecological restoration of the entire length of the realigned corridor (not just the ecological area in the southern part of the site as referenced in the draft DCP) and that landscaping and vegetation species within the realigned corridor must be designed to prevent the expansion of the GHFF camp further north near future planned residential development.	This has been included
Clarification that the solar access controls for the Village / Central Park and Southern Park are to include "at least 4 hours of continuous solar access to at least 70% of its area all year round".	This has been included

Council officers are satisfied that the site-specific DCP is appropriate to be placed on public exhibition in conjunction with the draft Planning Proposal subject to changes being made prior to exhibition to address -

- The matters noted in the above table relating to formatting, adequacy of additional detail and appropriateness of site-specific controls
- Clarification and justification for any controls that differ from commensurate controls within Wollongong DCP 2009, and
- Any updates that may be required to reflect the revised Master Plan 2021 as endorsed by Council



It is likely that further amendments and refinements to the draft DCP will occur prior to its finalisation as public exhibition feedback from the community, state agencies and internal specialist Divisions within Council are considered and addressed.

Development Contributions / Voluntary Planning Agreement

A revised Letter of Offer to enter into a Planning Agreement was received by Council on 30 March 2021 (Attachment 5). The value of some of the items were revised, and further information provided on the proposed future operation of the planning agreement. It should be noted that the applicant has stated that the Letter of Offer is subject to the Planning Proposal being made in the form considered to Council, and have stated that they may amend the Offer should the Planning Proposal be changed prior to finalisation. The Planning Agreement will exclude the levying of development contributions for the development in future.

The planning agreement proposes the handover of \$8,489,885 of land and \$14,121,209 worth of works to Council. Of these, the Letter of Offer is proposing \$4,041,243 to be valued as a development contributions offset, which is above the expected development contributions to be levied for future development which is in the realm of \$2.5-2.7 million based on the proposed cost of future development.

The applicant is proposing the sale of land to a registered housing provider to allow for 35 affordable rental housing dwellings to be provided in addition to the 550 dwelling cap imposed by resolution at the October 2020 Council meeting. These will have a restriction on title in accordance with the Affordable Rental Housing SEPP, which in respect to Residential Flat Buildings developed under the control, requires that the development must be used for affordable housing for at least 10 years from the date of issue of the Occupation Certificate. With respect to the affordable housing being provided on site, the Letter of Offer also proposes to exclude the application of any future contributions being required for affordable housing.

Council is further investigating and negotiating the Station Plaza Access item which proposes a contribution offset of \$767,009 as to whether it represents a true contribution offset. It should be noted that, if it is not ultimately included as a development contribution offset, the value of development contributions land and works will still exceed what is expected to be collected with the future development across the site.

Housekeeping Amendment

The review of the draft Planning Proposal undertaken by Council Officers has highlighted an anomaly with the current zoning of the Cross Street road reserve and cul-de-sac head.

It is proposed to address this anomaly by rezoning this section of land to align with the draft Planning Proposal and existing residential land in Cross Street (Attachment 7). Given this parcel of land currently functions as a road reserve, the proposed housekeeping amendment is minor and will not change the character of Cross Street. No additional development opportunity will result from these changes.

OPTIONS

The broad options available to Council concerning the draft Planning Proposal are -

- 1 Resolve to progress a draft Planning Proposal in the form recommended by this report to the NSW Department of Planning, Industry and Environment for approval to exhibit.
- 2 Resolve to progress a draft Planning Proposal in the form requested by the proponent to the NSW Department of Planning, Industry and Environment for approval to exhibit, incorporating the following changes to the recommendation in this report -
 - Delete recommendation 1(k).
 - Substitute the proponent's zoning map (Attachment 3) and amend all other maps to reflect the change in zone boundary.
 - Impose a restriction on the R3 Medium Density Residential zoned land within 100m of the Grey-Headed Flying-fox core camp extent to be developed for town house / terrace style housing only.



CONSULTATION AND COMMUNICATION

On 3 April 2018 Council resolved that any public exhibition should be for a minimum 60 days and include a public information session to be held in Corrimal in the first half of the exhibition period.

If Council resolves to support the revised draft Planning Proposal a formal exhibition period will commence, following the draft Planning Proposal being submitted to the Department of Planning, Industry and Environment.

The focus of the Engagement Strategy is to incorporate some flexibility in the exhibition arrangements to work with community groups and individuals to ensure the community continue to be able to access the documentation and be able to provide their feedback. The Engagement Strategy includes the following options -

- Ensure the exhibition is widely advertised through the media, social media, posters in key locations and in mail outs to surrounding residents and people who have made a submission/sent in correspondence on the Planning Proposal to date.
- Include the whole package of information, including technical studies, on Council's website and the Department's planning portal.
- Include in the mail outs and on the website, FAQ sheets that provide information on questions that have arisen from feedback to date.
- Assistance at libraries for people to make a booking to access the website documentation on exhibition.
- Make hard copies of some information available to the community to be managed by a nominated person acting as a librarian.
- Development of an interactive engagement hub on Council's website providing the opportunity to -
 - View the site on a map in the context of surrounding development, landforms and infrastructure.
 - Use an interactive map to drag a "topic" to a specific location on the map and provide a comment. Visitors to the web page will be able to view these comments and add to the conversation, including the option to upload photos.
 - Opportunity to leave comments/requests for further information on the web page that will be monitored and responded to by Council Officers.

The exhibition will commence as soon as possible following finalisation of the package of documents. If the exhibition period coincides with the holiday period, it will be extended as required under Council's adopted Community Participation Plan.

Any COVID 19 requirements applicable at the time of exhibition will be incorporated into the engagement plan.

PLANNING AND POLICY IMPACT

This report contributes to the delivery of Wollongong 2028 Objective "the sustainability of our urban environment is improved" under the Community Goal "We value and protect our environment". It specifically delivers on the following –

Community Strategic Plan	Delivery Program 2018-2022	Operational Plan 2020-21
Strategy	4 Year Action	Operational Plan Actions
Manage land uses to strengthen urban areas and improve connectivity to train stations and key transport nodes	1.3.1 Impacts from development on the environment are assessed, monitored and mitigated	Action 1: Assess new developments and planning proposals for environmental impacts.



Draft Illawarra Shoalhaven Regional Plan 2041

On 2 November 2020 the draft Illawarra Shoalhaven Regional Plan 2041 was released for exhibition until 17 December 2020. On 7 December 2020 Council considered a report on the draft Plan and resolved to make a submission.

The draft updated *Illawarra Shoalhaven Regional Plan 2041* will guide strategic planning and land use decisions in the region for the next 20 years. The draft Plan contains 30 objectives, supported by a mix of actions, strategies and collaboration activities. The draft Planning Proposal is consistent with the following -

Objective 11: Protect important environmental assets.

Objective 14: Enhance and connect parks, open spaces and bushland with walking and cycling paths.

Objective 18: Provide housing supply in the right locations.

Objective 19: Deliver housing that is more diverse and affordable.

Objective 23: Celebrate, conserve and reuse cultural heritage.

Objective 28: Create connected and accessible walking and cycling networks.

The draft Regional Plan states the need to prioritise opportunities for new housing in strategic centres, given they are well serviced by utilities, public transport, walking and cycling, education, health and community infrastructure, and provide shopping, community and commercial services. The draft Plan Identifies Corrimal as a strategic centre.

Making more housing available in existing urban areas is identified in the draft Plan as a sustainable option as it takes advantage of existing investments into infrastructure and services - this could include higher densities in Metro Wollongong, Shellharbour City Centre and Nowra City Centre, and medium densities in strategic centres such as Corrimal.

The draft Plan highlights Corrimal as having capacity for housing growth, with its connections to public transport, public open space and cultural facilities. The 18-hectare former Coke Works site is specifically mentioned in the draft Plan as having the potential to be developed to better connect the town centre to the train station and to increase housing supply and diversity, noting the need for any proposed development to consider the site's ecological, historical, archaeological and cultural significance.

Draft Illawarra Shoalhaven Regional Transport Plan

On 30 November 2020 the draft Illawarra Shoalhaven Regional Transport Plan was released for exhibition until 29 January 2021 (Council received an extension till 14 February 2021). On 22 February 2021 Council considered a report on the draft Plan and resolved to make a submission.

The Draft Illawarra - Shoalhaven Regional Transport Plan (the "Transport Plan") outlines the strategic framework for how Transport for NSW will respond to changes in land use, population and travel demand across the region over the next 20 years.

Developed in conjunction with the Department of Planning, Industry and Environment's (DPIE) Draft Illawarra-Shoalhaven Regional Plan 2041, the Plan presents a transport vision for the Illawarra-Shoalhaven and identifies the necessary infrastructure, services and policy interventions required to articulate the vision at a local level.

The draft Regional Plan nominates five regionally-significant centres for the region – Metro Wollongong, Shellharbour City Centre, Kiama, Nowra City Centre and Milton-Ulladulla. The Plan contains the following four objectives, supported by initiatives and interventions, to contribute to improved multi-modal connectivity to, from and between these five regionally significant centres, as well as with Greater Sydney.



- Objective 1: increased population within a 30-minute public transport trip of a regionally significant centre.
- Objective 2: connectivity between Metro Wollongong and Greater Sydney by public transport is efficient, reliable comfortable and safe
- Objective 3: future residents of regionally significant growth areas are within a 30-minute public transport trip of a regionally significant centre
- > Objective 4: maintain reliable north-south, east-west transport spines.

The draft Planning Proposal for the Corrimal Coke Works site is consistent with these objectives of the Regional Transport Plan.

FINANCIAL IMPLICATIONS

The proponent intends to dedicate the land containing the GHFF camp into Council ownership. There are risks and financial and staff resourcing liabilities to consider in the decision to accept dedication of land which would effectively place stewardship of a State and Nationally listed threatened fauna species and its habitat with Council.

Implementation of GHFF Management Plans will require ongoing resourcing. The Planning Proposal, while outlining the need for a Management Plan, does not specify how the proposed ongoing management actions would be funded. Council will continue to work with the proponent to explore ongoing management options, including the possibility of establishing a Biodiversity Stewardship Agreement / BSS prior to finalisation of the Planning Proposal.

CONCLUSION

The draft Planning Proposal has been evaluated and deemed to have site and strategic merit.

Key planning considerations and outcomes are summarised as follows -

- Corrimal is identified in the Regional Strategy and Council's Strategic Plan as the major hub of the northern suburbs, capable of infill development given its location and supporting infrastructure and services.
- Site and strategic merit in this proposal to rezone for residential use proximity to public transport, town centre, jobs, schools, recreational facilities and related infrastructure.
- The proposal to rezone the site for residential and commercial use represents the most viable option in terms of enhancing the heritage values, by making the history of the site accessible to the wider community through adaptive reuse and interpretation.
- Sufficient supply of well located industrial land in the LGA and new industrial uses are not deemed viable on this site (land use conflict given surrounding residential development).
- Medium density housing typologies are under-represented in the Illawarra and opportunity to provide Affordable Rental dwellings.
- The proposed heights reflect the unique position of the site adjacent Corrimal Railway Station, within close proximity to the Corrimal Town Centre and related services and infrastructure, and size of the site.
- The proposed built form is appropriate and has been guided by extensive view analysis to ensure key views are created/preserved in relation to heritage items and the escarpment.
- Opportunity to deliver a number of distinct housing precincts to respond to market demand, supported by a neighbourhood scale retail offer and possible business start-ups, and a central and southern park.



- The modest convenience-based retail offer is supportable from an economic perspective, while not adversely impacting the existing retail hierarchy in the area.
- Traffic impacts have been modelled and can be managed to provide appropriate levels of service.
- Opportunity to make a financial contribution to area wide upgrades that TfNSW has identified are required at a number of intersections along Memorial Drive.
- Flooding outcomes on site and up/downstream are improved.
- The Grey-headed Flying-fox colony is provided with protection and habitat/EEC is enhanced.
- Contamination on site can be remediated to make the land suitable for urban use.

Issues that will continue to be refined and considered in more detail prior to exhibition and/or finalisation of the proposal include –

- The site-specific Development Control Plan.
- The Planning Agreement based on the Letter of Offer.
- The Funding mechanism for maintenance of the Grey-headed Flying-fox habitat.
- The Dual use opportunities of the proposed riparian corridor.

It is recommended that Council resolve to exhibit a revised draft Planning Proposal and associated supporting documentation for community feedback.







Executive Summary

1.1 Summary of the Planning Proposal

The site is well placed to support 'in-fill' development, given its adjacency to existing residential development in Corrimal, its location next to Corrimal train station and its proximity to the Corrimal town centre.

A summary table identifying the proposed outcomes of this PP are identified in Table 1 below.

Table 1 Summary of the Proposal

Property Details	The total site comprises 4 existing lots:
	» Lot 1 in DP 795791
	» Lot 5 in DP 749492
	» Lot 126 DP 598190
	» Lot 11 DP 749492
Area	18.18ha (181,754m²)
Proposal	Amend WLEP 2009 as follows:
	Land Zoning Map 024
	Remove the RE2 Private Recreation and IN3 Heavy Industrial zoning from the site and replace with:
	» R3 Medium Density Residential
	» RE1 Public Recreation
	The portion of the site zoned SP2 Infrastructure will be retained.
	Minimum Lot Size (MLS) Map 024
	Remove the 1.99ha MLS from the part of the site zoned IN3 and introduce a new MLS of 449 $\rm m^2$ for the land zoned R3 Medium Density Residential.
	Height of Building (HOB) Map 024
	Remove the 9m height control from part of the site zoned RE2.
	Insert a height control of 9m over all RE1 zoned land.
	Insert the following height controls over R3 zoned land - 9m, 11m, 13m and 15m
	Floor Space Ratio (FSR) Map 024
	No FSR control currently exists for the site.
	Insert the following FSRs over all R3 zoned land; 0.75:1, 1.2:1 and 1.5:1
	No FSR control is proposed for RE1 land
	Sun Plane Protection (SPP) Map 024
	Create a Sun Plane Protection Map to identify future development sites subject to
	sun plane protection control in accordance with Local Provisions Clause.
	Riparian Land Map 024
	Amend the location of the riparian corridor to reflect the creek re-alignment.
	Remove the foreshore building line from the map.
	Remove any land located below the foreshore building line from the map.



Natural Resource Sensitivity Map 024

Amend the Natural Resource Sensitivity map to include one area of biodiversity sensitivity in the southern area of the site.

Key Sites Map 024

Create a Key Sites Map to include the site as a key site in terms of Clause 7.18

Urban Release Area 024

Create a Urban Release Area Map to include the site and thus Part 6 of the LEP is to apply

Part 7 Local Provisions – General

Include four new local provisions clauses:

The following clause will be included in Part 7 to allow increased heights, beyond the maximum height control of 22m, for C1 North Stack, Fine Coal Bin, and C1 Brick Chimney Stack, which currently sit at heights of approximately 36.8m and 29m respectively:

7.20 Former Corrimal Coke Works

Height of Development

- (1) The height of any development on the former Corrimal Coke Works site may not to exceed the height limit shown on the Height of Buildings Map, with the exception of the following heritage items:
 - a) C1 North Stack
 - b) C1 Brick Chimney Stack
 - c) C1 Fine Coal Bin
- (2) The following height limits are permissible for the heritage items:
 - a) C1 North Stack: 37m
 - b) C1 Brick Chimney Stack: 29m
 - c) C1 Fine Coal Bin: 25m

The second local provisions clause will be included to provide certainty to the maximum building heights on the site, by allowing lift overrun or other ancillary uses to exceed the height outlined in the building heights map.

7.21 Height of buildings at Corrimal Coke Works site

- (1) The consent authority may grant development consent to development for the purpose of rooftop plant, lift towers, lift motor rooms, pergola and or communal open space and access to and structures associated with such space, that would exceed or causes a building to exceed, the height limits set by clause 4.3, but only if the consent authority is satisfied that the structures
 - a) are for the purposes of equipment servicing the building, plant rooms, lift towers, lift motor rooms, fire stairs and other areas used exclusively for mechanical services or ducting; or
 - b) are for the purpose of communal open space and access to, and structures associated with that space; or
 - c) for both (a) and (b); and
 - d) are not an advertising structure; and



- e) does not include floor space area and is not reasonably capable of modification to include floor space area; and
- f) will cause minimal overshadowing; and
- g) any such rooftop structure referred to in (1)(a) and 1(b) is fully integrated into the design of the building."

7.22 Integrated Housing at Corrimal Coke Works site

- (1) Despite Clause 4.1, a minimum lot size of 180m2 is permissible on lots if the proposed development is Integrated Housing.
- (2) Development consent for any development on land zoned R3 Medium Residential and having a minimum lot size of between 180m2 and 250m2, to which this clause applies, must be Integrated Housing. Integrated Housing includes a single development application that is both of the following:
 - a. the subdivision of land into residential lots, and
 - b. the erection of an attached dwelling or a dwelling house on each lot resulting from the subdivision, but only if the size of each lot is between 180m² and 250m².

7.23 Sun Plane Protection at Corrimal Coke Works Site

- (1) The objective of this clause is to protect the specified public open space from excessive overshadowing by restricting the height of buildings.
- (2) This clause applies to land coloured yellow on the Sun Plane Protection Map.
- (3) Development on land to which this clause applies is prohibited if the development results in less than 4 hours of continuous solar access to at least 70% of the public open space area all year round due to part of a building projecting above a sun access plane.

Schedule 1 Additional permitted uses

The following clause will be included in Schedule 1 Additional Permitted Uses to ensure that convenience neighbourhood retail facilities and commuter services near Corrimal train station can be provided:

Use of certain land at the former Corrimal coke works site:

- (1) This applies to land at the former Corrimal coke works site as mapped
- (2) Development at gorund level for the purposes of food and drink Premises, shops, business premises and neighbourhood supermarket is permitted with consent, but only if at ground floor and within 150m of the train station
- (3) Development for purposes of food and drink premises is to have a maximum GFA of 250sqm, shops with a maximum GFA of 150sqm, neighbourhood supermarket is permitted up to a maximum GFA of 500m², and business premises The combined gross floor area for the above uses cannot exceed 2,000sqm.





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Project Name Project Address 27 Railway Street, Corrimal, NSW 2518 Client Date August 2020

ks Project Number Drawing Name Scale Drawing Number Revision

11877 Option 2 - No Buffer I 1:2000 @ A3 SK110.3







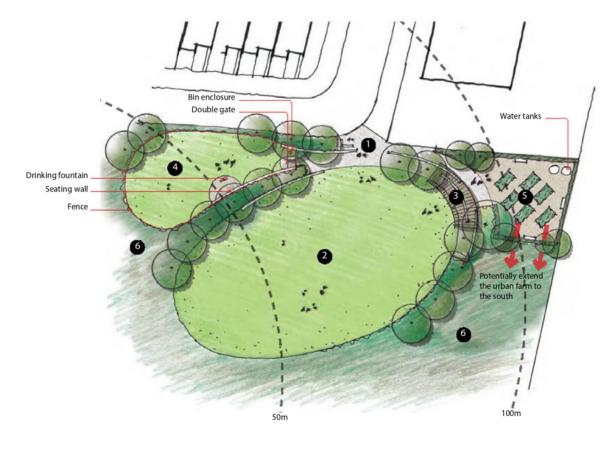
PARK ENTRY WITH SEATING

- 2 OPEN LAWN AREA3 SHELTER / PERGOLA
- 4 OFF LEASH DOG PARK

5 COMMUNITY GARDENS / URBAN FARM

6 NATIVE LOW SHRUBS AND GRASS





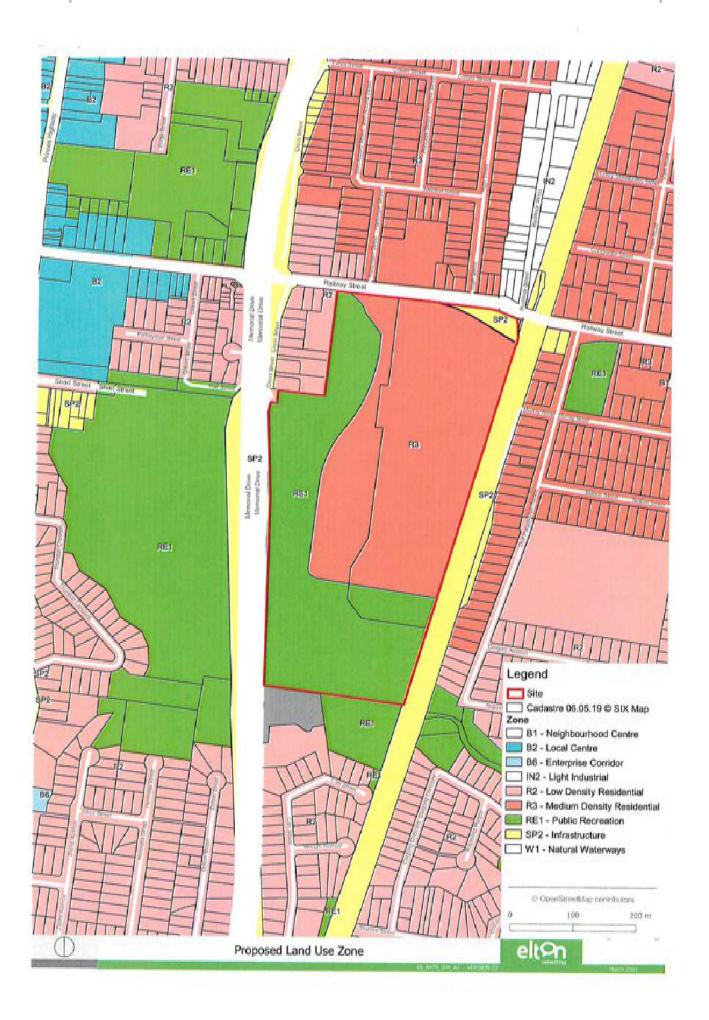
KEY MAP: (NTS)

4 2383305011 - LANDSCAPE MASTER PLAN. ISSUE 1 1500 @A3 0 5 10 15 25m 1500 @A3 1500



Ordinary Meeting of Council

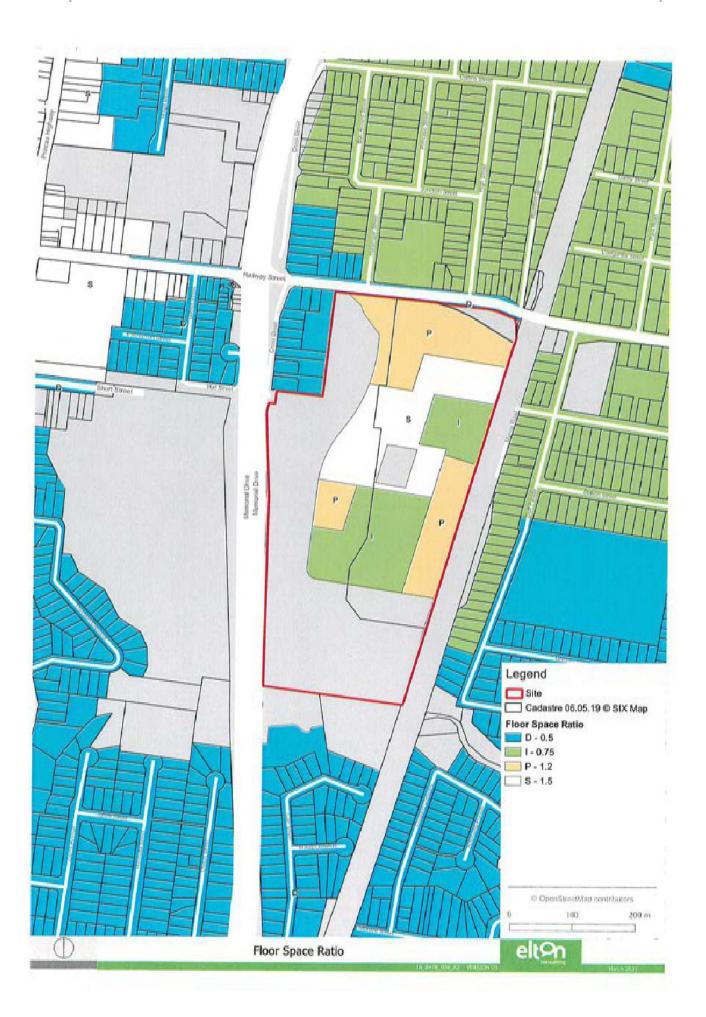
Item 4 - Attachment 3 - Proponent's Proposed WLEP 2009 Maps - Land Use Zoning, Floor Space Ratio, Maximum Building Height and Minimum Lot Size



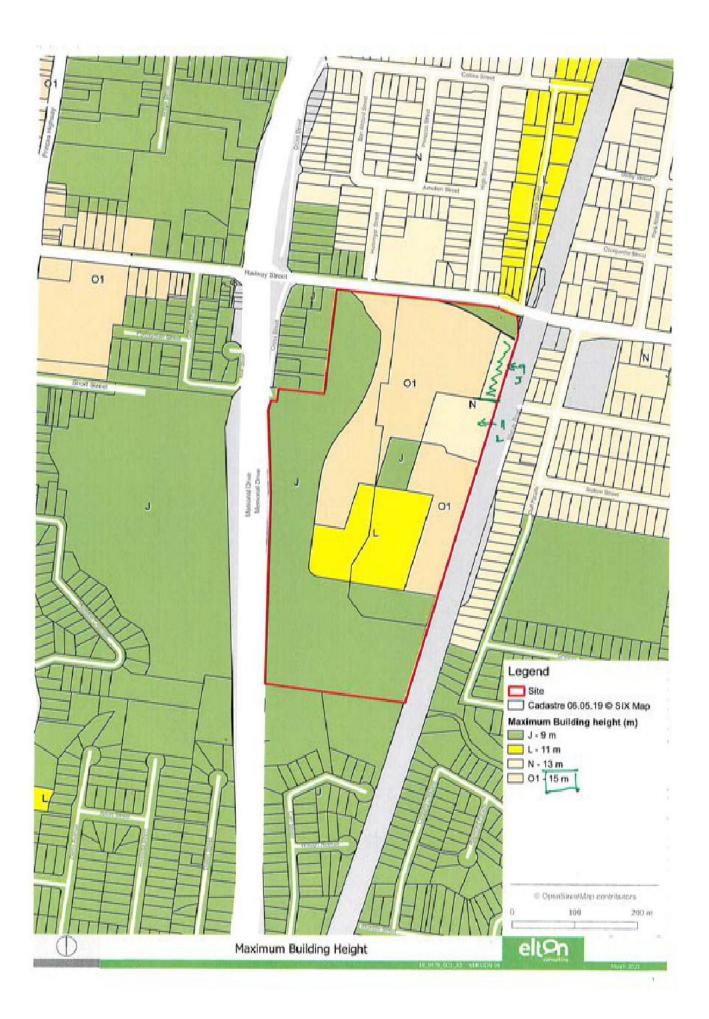


Ordinary Meeting of Council

Item 4 - Attachment 3 - Proponent's Proposed WLEP 2009 Maps - Land Use Zoning, Floor Space Ratio, Maximum Building Height and Minimum Lot Size















Project Name: PR5307 Corrimal Flying-fox Advice Date: 24 February 2021

Attn: Adrian Kilburn

Legacy Property Level 45, MLC Centre 19 Martin Place Sydney NSW 2000

Dear Adrian

RE: Recent advice relevant to Corrimal flying-fox camp

Legacy Property consulted with Ecosure regarding any new recommendations or research relevant to buffers from flying-fox camps to avoid human/flying-fox conflict.

To our knowledge there are no new research findings, policies or recommendations in this area. Since our last advice (dated 1st June 2020), Ecosure has been engaged by a council in Sydney to provide advice on appropriate planning provisions to protect flying-fox camps and avoid future human/flying-fox conflict. The scope included advice to inform:

- Council's Local Environment Plan (LEP) and Development Control Plan (DCP)
- conditions for potential lessees of land adjacent a camp for an Expression of Interest process
- building heights and buffers for a planning proposal to increase low density to medium rise residential.

Recommendations were provided on:

- · suitable buffer distances between the camp and residential dwellings
- building height limits
- setbacks
- building materials
- other controls.

Relevant recommendations included the following.

- 1. Inclusion of camp locations in property documentation.
- 2. Appropriate building materials and design (shown to be more effective than buffers).
- 3. Buffers of 50 m between the maximum camp extent perimeter and residences (in combination with other controls for new developments). Site-specific noise and odour

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modelling considering flight paths, topography and wind, potentially with additional building controls, could be considered to evaluate the suitability of 25 m buffers.

- 4. Undertake shadow modelling to determine height restrictions (preliminary assessment indicated up to four storeys may be appropriate at the 50 m buffer edge to avoid shadowing and maintain unrestricted flying-fox flight paths).
- 5. Any building height increases to consider wildlife friendly design to avoid collisions (e.g. avoiding large expanses of frameless grass).

Recommendations to avoid future conflict were based on contemporary research, including:

- a recent survey of 8,000 residents within 300 m of 31 camps across NSW, Qld and Vic which showed there were no clear distance effects when comparing 'degree of bother' with distance to the camp, with impacts attributed mainly to a person's own tolerances, background and social values (Lentini et al. 2020)
- using building materials such as double-glazing windows significantly reduced the external noise level measured inside a house adjacent to a roost, more so than buffers (Pearson and Cheng 2018) (see also ANE pers. comm. detailed in Ecosure 2020c).

We highlighted in our advice that over-prescriptive controls could demonise flying-foxes and inadvertently amplify public risk perceptions, and it is important to find acceptable measures which enable humans and flying-foxes to co-exist.

These recommendations are consistent with advice provided by Ecosure (Ecosure 2020a, 2020b, 2020c) and EcoLogical (Eco Logical 2020a, 2020b). Adopted measures and site-specific detail will be available as internal council processes progress.

It should also be noted that camps in this council area are more permanently occupied by a larger number of flying-foxes than the Corrimal camp.

Please do not hesitate to contact me on (07) 3606 1030 or jbracks@ecosure.com.au if you have any questions or would like to discuss.

Regards,

Jess Bracks Principal Wildlife Biologist Ecosure





References

Eco Logical 2020a, *Pteropus poliocephalus* (Grey-headed Flying-fox) Camp management advice – 27 Railway Avenue Corrimal (former Corrimal Cokeworks), Letter report to Legacy Property, dated 25 February 2020.

Eco Logical 2020b, Corrimal Coke Works Grey-headed Flying-fox Camp Proposed Management Actions, report prepared for Legacy Property, dated 19 March 2020.

Ecosure 2020a, Corrimal Flying-fox Strategy Peer Review (26th March 2020), letter report to Legacy Property, Ecosure, Brisbane.

Ecosure 2020b, Corrimal Flying-fox Strategy Peer Review, advice regarding flying-fox buffers – risk vs impact avoidance (28th April 2020), letter report to Legacy Property, Ecosure, Brisbane.

Ecosure 2020c, Corrimal Flying-fox Strategy Peer Review, supplementary advice for the Corrimal grey-headed flying-fox camp and proposed development (01 June 2020), letter report to Legacy, Ecosure, Brisbane.

Lentini, PE, Kendal, D, Currey, K and Williams KJH, 2020 "A large scale survey of residents living close to flying-fox camps to guide conflict management: preliminary report". University of Melbourne and University of Tasmania.

Pearson T, Cheng K (2018) It's not just noise. viewed 2/10/2019. https://ecosure.com.au/wpcontent/uploads/2018/11/Tim-Pearson-NFFF2018-Its-not-just-noise.pdf





Revision No.	Revision date	Details	Prepared by	Reviewed by	Approved by
00	23/02/2021	PR5307 Recent advice relevant to Corrimal flying-fox camp DR	Jess Bracks, Principal Wildlife Biologist	Emily Hatfield, Senior Wildlife Biologist	Jess Bracks, Principal Wildlife Biologist
01	24/02/2021	PR5307 Recent advice relevant to Corrimal flying-fox camp Fl		Adrian Kilburn, Legacy Property	Jess Bracks, Principal Wildlife Biologist

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30 March 2021

General Manager Wollongong City Council Locked Bag 8821 WOLLONGONG DC NSW 2500

Attention: Chris Stewart, Manager City Strategy

LETTER OF OFFER TO ENTER INTO A PLANNING AGREEMENT WITH WOLLONGONG CITY COUNCIL – CORRIMAL COKE WORKS

LegPro 70 Pty Ltd as trustee for LegPro 70 Unit Trust (Legacy) offers to enter into a Voluntary Planning Agreement (VPA) with Wollongong City Council (Council) under section 7.4 of the *Environmental Planning and Assessment Act 1979* (EP&A Act) in accordance with the terms of this Letter of Offer (Offer).

1 Operation and Application

The VPA will be entered into in connection with a Planning Proposal for the rezoning of the Corrimal Coke Works (**Planning Proposal**).

Legacy intends to lodge development applications for the residential and mixed-use redevelopment of the Land, subject to finalisation of the Planning Proposal (**Development**).

2 The Land

The VPA will apply to the land generally known as the Corrimal Coke Works comprising Lot 1 DP795791, Lot 5 DP749492, Lot 126 DP598190 and Lot 11 DP749492 (Land).

Illawarra Coke Company Pty Limited is the landowner and agrees to be a party to the VPA in its capacity as landowner. Legacy has rights in respect of the Land.

3 Application of sections 7.11, 7.12 and 7.24 of the EP&A Act

The VPA will exclude the application of sections 7.11 and 7.12 of the EP&A Act to the Development.

The VPA will not exclude the operation of section 7.24 of the EP&A Act to the Development.





4 Development Contributions

Legacy agrees to provide the public benefits in accordance with the Schedules **attached** as Annexure A to this Letter of Offer, subject to the Planning Proposal being made in the form as submitted to Council.

Legacy reserves the right to amend this Offer should the Planning Proposal be amended prior to its finalisation.

5 Affordable Housing Contribution

The affordable housing contribution in this Offer will fully satisfy the requirement to provide affordable housing as part of the Development. The VPA will exclude the application of any future contribution or additional requirements in relation to affordable housing.

The provision of the affordable housing contribution is conditional on affordable housing dwellings being excluded from any maximum yield on the Land.

6 Enforcement and security

Security will be provided through:

- registration of the VPA on title to the Land;
- inclusion of a clause allowing Council to compulsorily acquire land to be dedicated for \$1;
- restriction on the issue of relevant certificates under Part 6 of the EP&A Act prior to the relevant obligation(s) being satisfied.

7 Registration

The VPA shall be registered against all the titles comprised in the Land. However, a mechanism will be required which allows for the VPA to be released from the Land in stages as relevant obligations under the VPA are satisfied.

8 Limitation of liability clause

The VPA will contain the limitation of liability clause in Annexure B to this letter of offer.

Yours sincerely,

Matthew Hyder Chief Executive Officer





Annexure A Schedule of public benefits





Corrimal Coke Works: Schedule 1 – Defined Public Benefits and Contribution Offsets

Item	Overview	Description	Total Public Benefit		Contribution	Timing
Item	Overview	Description	Land	Works	Offset	Timing
Central Village Park	Provision of a neighbourhood scale park to provide amenity for future residents and the wider community.	 » Dedication of a minimum 3,000sqm of land » Embellishment works » 36 month maintenance period from practical completion 	\$1,365,000	\$1,268,919	n/a	Embellishment and dedication prior to an occupation certificate for any residential flat building in Stage 2
Southern Recreation Park	Provision of a neighbourhood scale park to provide amenity for future residents and the wider community.	 » Decision of a minimum of 3,000sqm of land » Embellishment works » 36 month maintenance period from practical completion 	\$1,365,000	\$1,084,394	n/a	Embellishment and dedication prior to an occupation certificate for any residential flat building in Stage 3
Riparian corridor	Establishment of green riparian corridor providing a range of passive recreation, active transport and ecological functions.	 » Dedication of approximately 77,290sqm of land » Landscape embellishment works » Improving and enhancing retained ecological communities under Vegetation Management Plan » 5 year maintenance period from practical completion 	\$4,637,400	\$6,076,144	n/a	Embellishment and dedication prior to an occupation certificate for any residential flat building in Stage 3
Riparian Corridor shared pedestrian / cycle path	Provision of a regional pedestrian/cycling connection through the North Corrimal Creek riparian corridor	 2.5m shared path from Railway Street to Council reserve south of Towradgi Creek (including bridge crossings) within riparian corridor 	n/a	\$1,485,275	\$1,485,275	Embellishment prior to an occupation certificate for any residential flat building in Stage 3
Railway Street shared pedestrian / cycle path	Provision of shared path on Railway Street for site frontage	 2.5m shared path along the site frontage on Railway Street 	n/a	\$187,500	n/a	Embellishment prior to an occupation certificate for any residential flat building in Stage 1.



30 MARCH 2021

[tem	Overview	Description	Total Pub	Total Public Benefit		Timing
ltem	OVERVIEW .	Description	Land	Works	Offset	Timing
	This land is zoned SP2 Road Widening and is identified on Wollongong City Council's Land Reservation Acquisition Map.	 » Dedication of approximately 2,467sqm of land (Lot 126 DP598190) for road widening (Railway Street) (facilitates future rail overpass bridge by Council) 	\$1,122,485	n/a	\$1,122,485	Transfer prior to issue of an occupation certificate for any residential flat building in Stage 1
Railway Street/ Harbinger Street roundabout	Roundabout on Railway Street	 Construction of new 4 way roundabout at intersection of Railway Street and Harbinger Street (contribution offset amount represents the differential between constructing a channelised 'T' intersection and the proposed roundabout) 	n/a	\$950,943	\$666,474	Prior to issue of an occupation certificate for any residential flat building in Stage 1
Station Plaza bublic access	Provision of permanent public access through the development to Corrimal station, delivering improved connectivity and promoting increased public transport use.	 Creation of public easement/right of way across Station Plaza providing public access to railway station Embellishment works (excluding cost of major heritage restoration and interpretation elements) Contribution offset represents 25% of the total embellishment cost reflecting broader public benefit Any connection through rail corridor subject to approval of RailCorp 	n/a	\$3,068,035	\$767,009	Prior to issue of an occupation certificate for the final residentia flat building in Stage 1
Affordable Housing	Facilitating the delivery of affordable housing within the site to meet Wollongong City Council's 5% target.	 Sale of land to a registered Community Housing Provider to allow delivery of a minimum of 35 affordable rental housing dwellings. Restriction on title for affordable housing use in accordance with Affordable Rental Housing SEPP. 	n/a	n/a	n/a	Prior to issue of an occupation certificate for any residential flat building in Stage 2



Notes:

- The Offer is conditional of finalisation of the Planning Proposal as submitted to Wollongong City Council. Legacy Property reserves the right to amend the Offer is the Planning Proposal is amended.
- The VPA will exclude the application of any further contributions under Section 7.11 and 7.12 for development of the site.
- The affordable housing contribution proposed in the VPA will fully satisfy any requirement for affordable housing in the project and will exclude the application of any future affordable housing contribution to the project (including but not limited to any contribution proposed under SEPP 70).
- The affordable housing contribution is subject to these dwellings being excluded from any maximum yield on the site.
- The current scope and costs for proposed VPA items are based on concept plans at the rezoning stage. It may be necessary to review and amend the scope and associated costs as the design is developed through the development application process.
- The early handover and completion of maintenance periods may be considered in future, subject to negotiation of appropriate arrangements such as the provision of a monetary contribution in lieu of ongoing maintenance by the developer.
- Adopted land values, based on MMJ valuation (April 2019), as follows:
 - Road widening, central park, southern park and active/fully usable riparian corridor land \$455/sqm
 - Ecological areas and passive riparian corridor land \$60/sqm

(updated valuation to be prepared prior to execution of VPA)



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Corrimal Coke Works: Schedule 2 – Scope of Embellishment Works

The scope of embellishment works will be generally in accordance with existing landscape concept plans (prepared by Clouston Associates) subject to future development applications, and as outlined below:

Item	Scope
1	Central Village Park
	Site Preparation/earthworks - minor preparation for construction, trim and compact sub-grade
	of pathways
	Hardworks – 1.2m concrete path, Paving, Soft fall
	Soft works – turf zone, native grasses and shrubs (6/sqm), advanced trees 48 off
	<i>Play equipment</i> – Suitable for 0-6 years
	<i>Furniture & fixtures</i> – Shade structure to play equipment, seating, bollards, tactile indicators
	Services – Lighting as required to Australian Standard, 1 x waterpoint, signage
	Maintenance – Planting establishment and maintenance 36 months
6	Southern Recreation Park
Γ	Site Preparation/earthworks – minor preparation for construction, trim and compact sub-grade
	of pathways
	Hardworks – 1.2m concrete path, Paving, Soft fall
	Soft works – turf zone, native grasses and shrubs (6/sqm), advanced trees 25 off
	<i>Furniture & fixtures</i> – Pergola structure, seating, bollards, tactile indicators
	Services – Lighting as required to Australian Standard, 2 x waterpoints, signage
	<i>Community gardens</i> – raised planting beds, 1 x water point, storage shed
	Off-leash dog park – fencing and gate access
	Maintenance – Planting establishment and maintenance 36 months
	Manitemance Flanding establishment and manitemance 50 months
3	Riparian Corridor
F	Site Preparation/earthworks – Trimming and grading, sediment and erosion control during
	preparation, topsoil blend assumed salvaged on site, topsoil for planting assumed salvaged, trim
	and compact subgrade of pathways and landscaped areas
	Hardworks – Concrete footpaths varying widths 1.2m, Concrete stage area, sandstone logs as
	seating to amphitheatre, Amphitheatre stairs and handrail, stacked sandstone block to rip rap zone,
	drop structure
	<i>Walls</i> – Creek edge wall, gabion retaining wall to Northwest corner (max 1.5m high), Retaining
	wall to footpath edge
	<i>Softworks</i> – Native grasses, shrubs and small trees (9/sqm), Turf zones, Mass planting of shrubs
	(6/sqm), Wetlands planting, Trees planting 50 x 45ltr, Jute mesh to creek
	<i>Furniture and fixtures</i> – Seating, balustrades, bollards, tactile indicators
	Services – Lighting as required to Australian Standard, Power to Stage area, water points x 4,
	signage
	Vegetation restoration and management – in accordance with future Vegetation Management
	Plan for retained Endangered Ecological Community area
	Maintenance – Planting establishment and Maintenance 5 years
5	Shared Pedestrian and Cycle Path
	Site Preparation/earthworks – Trimming and grading, trim and compact subgrade of pathways
	Hardworks – Concrete footpaths 2.5m
	Bridges – 2 off 2.5m wide x 20m long timber and steel bridge over creek
	Services – Lighting as required to Australian Standard
	<i>Other</i> – Signage and line marking, note path terminates on the southern bank of Towradgi creek
	adjacent to bridge crossing.



30 MARCH 2021

Corrimal Coke Works: Schedule 3 – Additional General Public Benefits

Revitalisation of the Corrimal Coke Works will deliver a broad range of additional public benefits that have not been quantified in monetary terms and/or do not represent offsets to s7.11 or s7.12 contributions.

These additional public benefits include:

- Preservation and restoration of various heritage structures
- Interpretation of existing heritage structures and general history of the site, including Aboriginal heritage
- Substantial retention of existing mature vegetation along Railway Street
- Reduction in flood levels in selected locations upstream and adjacent to the site
- Increased accessibility and permeability for the Corrimal community
- New housing opportunities
- Significant restoration of environmental and biodiversity values
- Provision of neighbourhood retail services at Corrimal station





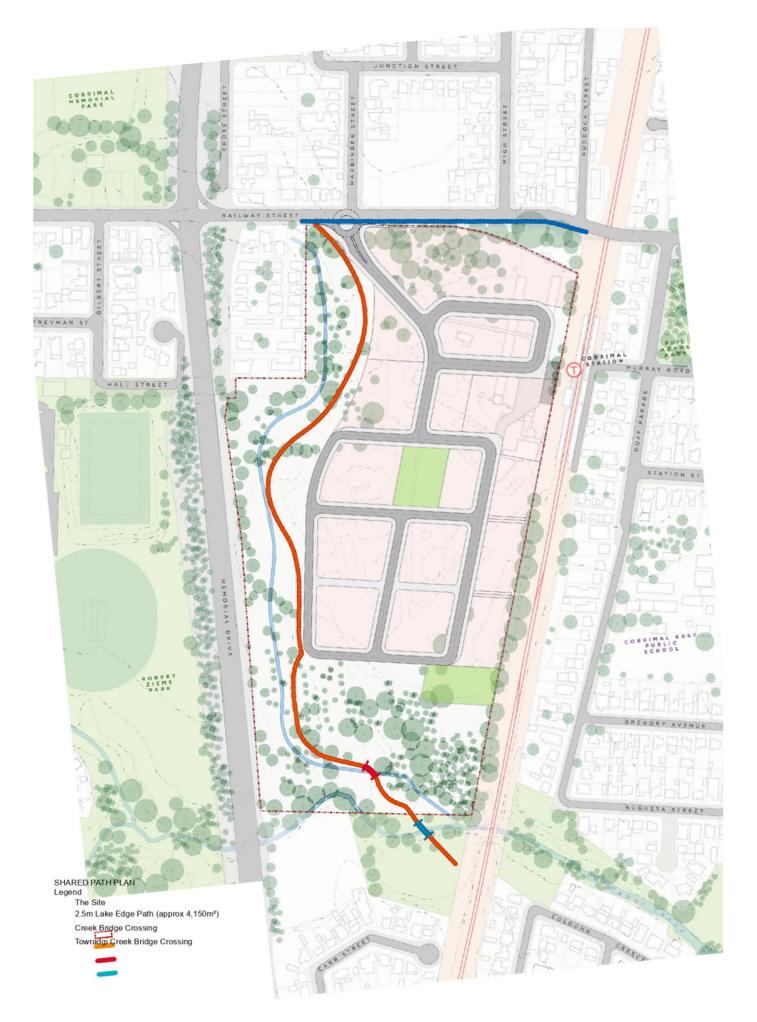
















Annexure B

(1) Definitions

In this clause:

- (a) Trust means the Legacy Property Unit Trust (ABN 75 600 144 578); and
- (b) Trust Deed means the trust deed establishing the Trust.
- (2) Limitation of Liability
 - (a) The Developer warrants that:
 - (i) it enters into this deed in its capacity as trustee of the Trust and in no other capacity; and
 - (ii) it is empowered by the terms of the Trust Deed or any other instrument constituting the Trust to enter into this deed in accordance with its provisions; and
 - (iii) it is entitled to be indemnified out of the assets of the Trust in respect of the obligations and liabilities assumed by it under the terms of this deed.
 - (b) The Council acknowledges and agrees that, despite any other provision of this deed, any liability or obligation of the Developer arising under or in connection with this deed can only be enforced to the extent to which they are entitled to be, and are in fact, indemnified for that liability or obligation out of the assets of the Trust. This includes without limitation any representation, warranty or conduct by the Developer.
 - (c) Clause 1(b) does not apply to any liability or obligation of the Developer to the extent there is a reduction in their ability to be indemnified for that liability or obligation out of the assets of the Trust as a result of the Developer's fraud, negligence or breach of trust.





Corrimal Coke Works

Draft Development Control Plan

Client: Legacy Property & Illawarra Coke Company **Date:** 30 March 2021



Contact:

SYDNEY 02 9387 2600

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Prepared by		
Reviewed by		
Date	30 March 2021	
Version	Final	



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1 Introduction

1.1 Introduction

This locality Chapter is intended to supplement the land use planning controls applied by Part B of the WDCP 2009 to guide any future development at the former Corrimal Coke Works. This Chapter of the DCP should also be read in conjunction with Part A, B, C, D and E of WDCP 2009 and the relevant Local Environmental Plan and SEPPS.

This chapter recognises the unique qualities of the Corrimal Coke Works, and the ability to deliver unique character precincts, local retail facilities heritage preservation and interpretation, and new, high quality open spaces.

1.2 Aims and objectives

The aim of this chapter is to provide planning controls to facilitate urban renewal of the Corrimal Coke Works site in a manner that is consistent with the Wollongong Local Environmental Plan 2009 (as amended) and the Corrimal Coke Works Master Plan.

The key objectives of this chapter are to:

- 1. Provide site specific subdivision and built form controls to guide future development of the site.
- 2. Ensure that development of the site results in an open and welcoming urban environment to facilitate integration and connection between future residents and the wider community.
- 3. Create a diverse, liveable and sustainable residential precinct that provides quality housing with contemporary built form and materials to respond to the character.
- 4. Ensure that future development respects and celebrates the heritage of the site.
- 5. Deliver a transport-oriented development adjacent to Corrimal station that promotes increased public transport use.
- 6. Provide for a neighbourhood scale retail precinct to meet the convenience retail needs of local residents and to activate Corrimal station and the Heritage Plaza.
- 7. Create a high quality, safe and accessible public domain that provides a range of recreational and community benefits.
- 8. Define the subdivision structure, character and built form controls for the site.
- 9. Provide a permeable network of streets in order to integrate the site with the wider Corrimal area and Corrimal train station.
- 10. Encourage walking and cycling by providing high quality walking and cycling paths, including a broader regional connection through the site.
- 11. Manage and where appropriate, enhance, the important environmental attributes of the site to ensure future sustainability and management of the site.
- 12. Provide an appropriate management framework for the future preservation and development interface to the occasional grey-headed flying fox camp located on the site.
- 13. Ensure that development of the site is sensitive to surrounding areas, including the protection of key view corridors to the Illawarra Escarpment.



1.3 **Definitions**

For all definitions refer to Appendix 4: Definitions of the Wollongong Development Control Plan 2009 (WDCP).

1.4 Relationship to Other Chapters of the DCP

This chapter of the WDCP provides the development controls for the site. This Chapter of the DCP should also be read in conjunction with Part A, B, C, D and E of WDCP 2009, the relevant Local Environmental Plan and State Environmental Planning Policies (SEPPs). In the event that the provisions contained in this chapter are inconsistent with the provision of WDCP 2009, the provisions of this chapter shall prevail.

In essence, this DCP overrides the DCP chapter as outlined in **Table 1** below, in order to reflect the specific aspects of the site.

Current chapter	Controls that will not apply to this site
B1 – Residential Development	The entire chapter
D1 – Character Statements	The entire chapter
E3 – Car Parking Access Servicing Loading facilities	7.1 Car Parking, Motor cycle, Bicycle Requirements and Delivery /Servicing Vehicle Requirements
	1. The car parking, motorcycle and bicycle requirements for specific land uses / developments are contained in Schedule 1 to this chapter of the DCP.
	7.7 Car Parking Layout and Design
	7.8 Basement Car Parking
	7.13 Car Parking and Access Requirements
E23 – Riparian Land Management	Section E23 Section 6

Table 1 DCP Chapters that are not applicable to this site



2 Land to which this DCP applies

This chapter applies to land identified as the Corrimal Coke Works site, located off Memorial Drive and Railway Street, Corrimal (Lot 1 DP 795791, Lot 5 DP 749492, Lot 126 DP 598190 and Lot 11 DP749492), as identified in the figure below.

Figure 1 Land to which this plan applies





3 Vision and Development Concept

A concept master plan for the Corrimal Coke Works has been prepared to demonstrate the holistic vision, key outcomes and principles that will guide the future development of the site.

Figure 2 Corrimal Coke Works Master Plan





3.1 Vision

Corrimal Coke Works will become a community born of diverse people, places and stories that respects the site's past while showcasing Wollongong's future as the city of innovation.

The site will be revitalised as a place for people that provides a mix of housing choices within a landscape and heritage setting, while leveraging its accessibility to services and public transport.

3.2 Key planning and design principles

The key principles can be interpreted in the following way:

- » Deliver a public open space network that establishes the character of the site and provides a range of recreational opportunities.
- » Provide diversity in the design of built form and public realm to ensure the character of the site reflects a varied cohesive group of design elements and different character precincts.
- » Integrate the site's heritage through the retention, interpretation and adaptive re-use of key elements so to respect the history of the site.
- » Design a safe and functional road network within the site including the provision of adequate on street parking and opportunities to access the station.
- » Establish a new access to the site from Railway Street to connect with the surrounding Corrimal community and facilitate improved access to Corrimal station.
- » Deliver a site that is highly permeable to pedestrians and cyclists, linking the precinct to surrounding amenities, services and facilities, public transport, recreational opportunities and beach and broader regional pedestrian/cycle path network.
- » Create a residential community with housing diversity, neighbourhood hub and commuter services near the train station for added convenience, but at a scale that does not detract from the Corrimal town centre.
- » Conserve, manage and improve existing native vegetation and biodiversity located in the south of the site, as well as facilitate a new realigned riparian corridor.
- » Allow for earthworks to improve and manage the drainage across the site, and realign North Corrinal Creek to improve flood management and ultimately enhance the biodiversity values on the site.
- » Deliver serviced development with appropriate infrastructure services.
- » Maintain key views to the escarpment from the east, particularly the ridgeline and along key streets
- » Establish key view corridors through the site, in particular along the Murray Street alignment and views towards the iconic brick chimney.
- » Locate higher buildings away from the station area in order to ensure the heritage character and significance around the brick chimney is respected.
- » Ensure that public spaces receive appropriate levels of solar access, are not excessively overshadowed, and are safe and accessible.
- » Manage flooding and stormwater, and incorporate water sensitive urban design principles
- » Enable the built form and the natural environment to co-exist, including appropriate buffers from the core of the occasional flying fox camp.
- » Ensure that future development complies with universal design and Crime Prevention Through Environmental Design (CPTED) principles.



3.3 Elements of the Master Plan

The key elements that have been incorporated into the indicative master plan include:

- » Delivering a diversity of housing with the potential for various multiple dwellings (townhouses should comprise around 10%), secondary dwellings and low-scale apartment buildings, including affordable housing and the potential for seniors living/aged care.
- » Providing approximately 9 hectares of open space to offer a range of community and recreational resources, including a 3,000sqm Village Park, 3,000 sqm Southern Recreation Park and riparian corridor promoting walking and cycling.
- » Ensuring architectural diversity, including articulation and modulation of built form, that responds to the local context through creation of a five character precincts within the site.
- » Maintaining key views to the escarpment, including a significant view corridor along Murray Street, while also establishing new views within the development to key heritage features.
- » Maximising access to Corrimal train station and delivery of a public plaza adjacent to the station with retention of key heritage structures and interpretive heritage elements.
- » Activating Corrimal train station and the heritage precinct with neighbourhood scale retail uses at a scale that does not detract from Corrimal Town Centre and East Corrimal shops.
- » Providing flexible community and business space within the heritage precinct, including the potential for tele-working and start-ups.
- » Realignment and rehabilitation of North Corrimal Creek to establish a new riparian corridor with enhanced biodiversity outcomes, while providing a large area of PMF-free contiguous developable area.
- » Providing a regional walking and cycling path through the site, connecting Railway Street in the north across Towradgi Creek to the south.
- » Retention of key ecological areas within the southern section of the site and integrated with the riparian corridor, including provision of a suitable buffer to the occasional grey-headed flying fox camp.
- » Providing a suitable buffer distance from the rail and state road corridors and appropriate landscaping adjacent to the site for noise attenuation.
- » New site access from Railway Street with a proposed roundabout at the intersection of Harbinger Street.



4 Character statement

4.1 Existing character

The site currently contains areas of derelict industrial structures, large former stockpiling areas and more natural areas of native and exotic vegetation to the south. The site is not accessible to the public and presents as a derelict former industrial site.

Existing industrial structures are clustered in the north-east corner of the site and reflect the site's past industrial character. There has been widespread vandalism across the site since industrial operations ceased and many of the existing buildings and structures are in poor condition.

The site is highly modified as a result of its past industrial uses, including realignment and damming of North Corrimal Creek to supply water for the coke works, and establishment of many large berms often containing discarded building materials.

The southern part of the site is less disturbed by industrial activities and has a more natural, vegetated character including an area of Illawarra Lowlands Grassy woodland.

The site is generally characterised by mature trees that present a natural green buffer on the boundaries of the site.

4.2 Desired Future Character

4.2.1 Overview

Corrimal Coke Works will be developed as a contemporary urban village, providing a diversity of medium density housing within a high quality public domain and reflecting the unique heritage of the site.

Built form is distributed around the site to preserve and create key view corridors, as well as providing appropriate scale interfaces to the heritage precinct.

Corrimal train station and the adjacent heritage precinct will be activated with neighbourhood scale retail uses, as well as flexible community and business space. This will create a high quality environment with improved accessibility that promotes public transport use. Provision for a bus loop through the site will further encourage reduced car use.

The development will encourage walking through "green" streets and the provision of key off-road shared paths, to Corrimal Station and also connecting through the site to the Towradgi Creek corridor. Importantly, the site will be open and permeable to invite the broader community to use its public spaces and facilities.

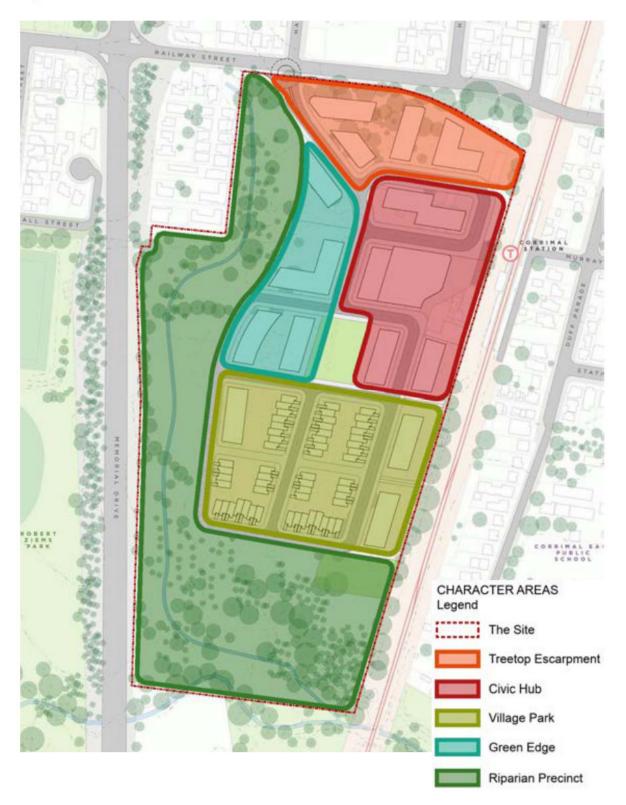
The environmental values of the site will be restored and enhanced, including establishing a new riparian corridor with increased biodiversity, and management of retained vegetation areas.

4.2.2 Character Precincts

Corrimal Coke Works will be developed with five character precincts that relate to key features of the master plan and are intended to ensure diversity and interest in the future built form.



Figure 3 Character Areas





Treetop Escarpment

- » The Treetop Escarpment precinct forms the entrance to the site from Railway Street, with buildings screened by the established green buffer that is retained in a generous landscape setback.
- » The landscape character will extend with new trees planted between building forms and within private courtyards of residential apartment buildings.
- » The built form is designed with strong vertical elements to emphasise the pattern of surrounding trees, while rooflines vary in order to reflect the character of the Illawarra Escarpment. A simple palette of materials complements the natural context of this precinct, as outlined in section 5.2.2. of this DCP.

Civic Hub

- » The Civic Hub will provide an urban and active character due to its proximity to Corrimal station. Buildings are built to the street boundary to activate the street, while the architecture will reflect the industrial history of the site through extensive use of masonry combined with finer grain metal elements.
- » The Heritage Plaza will provide a high quality public domain at Corrimal station and a focal point for the retention, interpretation and adaptive re-use of key heritage structures.
- » Retail uses are located within the Civic Hub to activate the Heritage Plaza, Corrimal station and provide amenity for local residents. Retail buildings are of lower scale to respect the views and prominence of the heritage items.

Green Edge

- » The Green Edge precinct fronts the riparian corridor and green open space at the west of the site, providing a key interface between the natural and built elements of the site.
- » New buildings will respond to this natural interface, providing a sense of openness and characterised by a lightweight materiality including fine grain timber elements and screens. This is further outlined in section 5.2.2 Buildings will promote passive surveillance, while creating appropriate privacy for residential dwellings.
- » Buildings will orientate to the green edge, the internal road and Village Park as relevant.

Village Precinct

- » The Village precinct provides for a mix of the lower scale and finer grain buildings comprising more multiple dwellings/townhouses, interspersed between apartment buildings on the western and eastern side that provide appropriate scale to interface with the riparian corridor and rail corridor.
- » The Village precinct provides a transition and connection from the Village Park to the Southern Recreation Park and ecological, promoting permeability through the site.
- » The built form reflects an urban village character utilising more contemporary materials and architecture, while promoting human scale architecture.

Riparian Precinct

- » The Riparian precinct provides a natural and functional green edge to the site, providing a significant connection with the natural environment.
- » Its natural biodiversity qualities will be retained, restored and enhanced, while offering opportunities for passive recreation and providing a significant walking and cycling connecting through the site. These outcomes are achieved while satisfying functional flood management and engineering requirements.
- » Environmental values, particularly the vegetation community and flying fox camp in the southern portion of the site, are protected and balanced with open space functions.
- » The Southern Recreation Park provides a dedicated recreation space for community enjoyment, while providing an appropriately defined interface to more ecologically sensitive areas.



5 Development controls and guidelines

This chapter of the DCP provides the subdivision and built form controls for the Corrimal Coke Works.

Objectives

- 1. Provide design controls that define setbacks and articulation to create an appropriate street interface.
- 2. Ensure good quality and innovative architectural designs that reflect the character precincts across the site and avoid a bland and monotonous architectural style.
- 3. Provide for adequate amenity and services for the residential dwellings.
- 4. Support activation of Corrimal station and the adjoining Heritage Plaza with appropriate retail/business uses.
- 5. Provide for adequate car parking on the site for various uses, while reflecting the opportunity for transport-oriented development because the site is directly adjacent to the Corrimal railway station.
- 6. Ensure appropriate access is provided for each of the buildings on the site whilst minimising the impacts on the public domain from parking structures.
- 7. Minimise on street parking for residents in order to allow visitors to use on street parking.

5.1 Views and Vistas

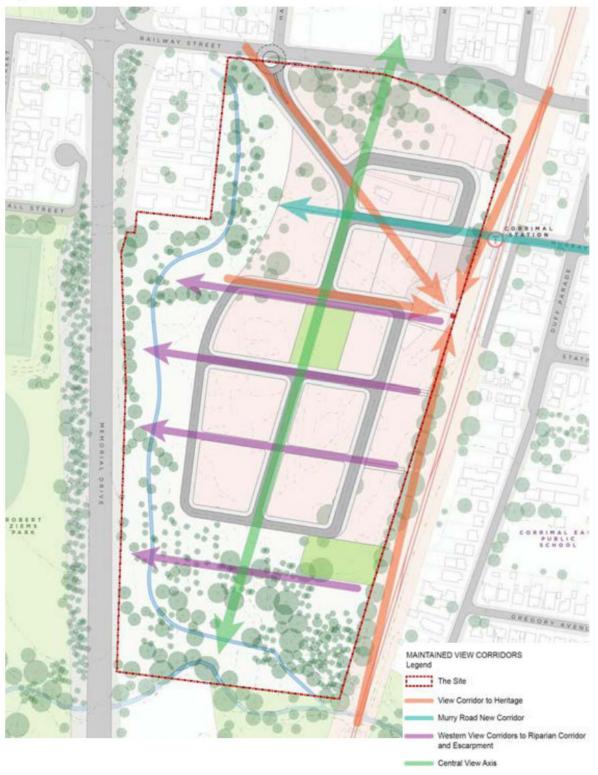
Development Controls

New development will establish or maintain key view corridors as indicated in Figure 4.

- The Brick Chimney is of significance and a landmark and therefore views to and from the stack should be conserved or prominently seen from Corrimal Railway Station, Railway Street and Towradgi Road overpass.
- 2. Ensure key view axis from Railway Street to the Brick Chimney are retained to ensure heritage items are prominent, as well as visual axis aligned with Murray street (to the east) and a new east west road within the site to view the Brick Chimney as shown in **Figure 4**.
- 3. New development (not in existing structures) adjacent to the Brick Chimney within the heritage curtilage should be stepped back in its form, or have an appropriate setback/buffer zone
- 4. Buildings adjacent to the rail corridor shall utilise a natural colour and material palette to blend into the backdrop of the Illawarra Escarpment when viewed from East Corrimal.
- 5. Create a green link corridor through the site in order to link the southern Park to the northern tree lined edge.
- 6. New commercial buildings should be positioned and be of a two level scale or set back so to ensure views along the visual axis from Railway Street to the Brick Chimney



Figure 4 Views and vistas





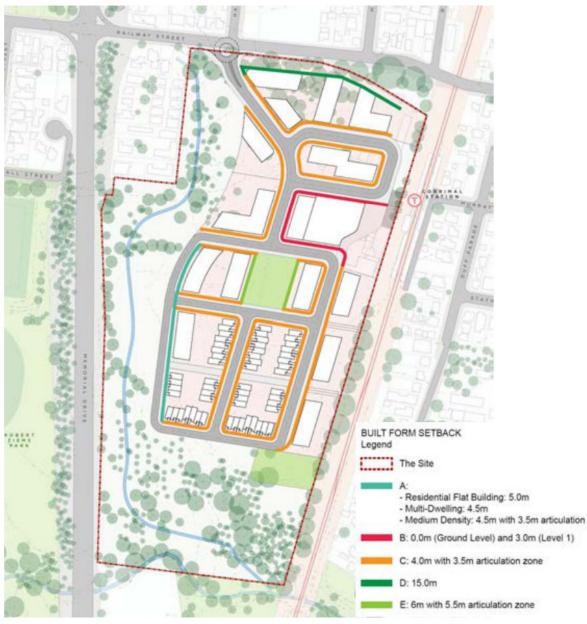
5.2 **Residential Development**

5.2.1 Residential Apartments - Setbacks

Development controls

- 1. Building setbacks are to comply with Figure 5.
- 2. Up to 70% of the articulation zone can be occupied by architectural elements. Articulation zone means a zone forward of the Main façade line that may include architectural features such as pergolas, roofs elements, bay windows, sun shading and verandahs.

Figure 5 Built Form Setback





5.2.2 Architectural Diversity and Building Design

Development controls

 The design of new residential buildings is to achieve architectural diversity reflecting the character precincts in accordance with Table 2.

Table 2 Building design

	Treetop Escarpment	Civic Hub	Village	Green Edge
Primary Façade	Render	Masonry	Render / cladding	Cladding
Base Element	Masonry	Masonry	Masonry / render	Masonry / render
Feature Elements	Timber / metal	Metal	Timber / cladding elements	Metal screens / Façade greening
Balustrade	Glass	Metal / masonry	Glass / solid	Glass
Roof Form	Varied	Flat	Flat	Varied
Rhythm	Vertical	Horizontal	Vertical	Horizontal
Colour Palette	White / Neutral	Brown / Grey	Natural / colour highlights	Natural

- 2. The design of new development must have particular regard to the topography of the site to minimise the extent of cut and fill associated with building construction.
- 3. Retained heritage items must be integrated into the design of the built form. Any retained coke ovens and the remnant wall of the powerhouse, in particular, must be incorporated into the overall design.
- 4. Design of new buildings should minimise the overall sense of bulk and scale, with maximum building length to comply with the Apartment Design Guide. The use of landscaping, articulation, balconies, sun shading devices and awnings will help reduce the apparent bulk of buildings.
- 5. Provide for a mix of built form styles, whether north south orientated, courtyard type style or L-shaped, or articulation in the built form in order to reduce monotony in built form.
- 6. Entrances must be visible at eye level from the street and well lit.
- 7. Buildings directly adjoining open space, such as the Village Park or Riparian Corridor, must be designed with an appropriate interface and frontage to the open space.
- 8. Establish a variety of built form heights, with lower heights closer to the railway station, and higher towards the creek corridor, and varying heights within the northern and southern parts of the site.
- Buildings adjoining the rail corridor are to be designed with consideration of their presentation to the rail corridor. The use of landscaping to screen these buildings and create a green edge to the rail corridor is encouraged.

5.2.3 Multi-dwelling and Attached Housing

Development controls

- 1. Torrens title subdivision of multi-dwelling housing is permissible as integrated housing.
- 2. Multi-dwelling housing sites are to have direct frontage to a public road (i.e. not on battleaxe lots).
- 3. A landscape plan is to be submitted with every application for multi-dwelling housing.
- 4. Front, rear and side setbacks provided for each dwelling shall comply with the following:



Minimum	Max Longth of	Front Setback	Side setback	Rear setback
Minimum Lot Frontage	Max Length of building on a zero lot boundary	Front SetDack	SIDE SELDACK	Rear Selback
>4.5m	15m (excl garage)	As per setback plan	Om	0.5m
7m-9m	15m	 – Figure 5 	0.9m or 1.2m adjacent to zero lot boundary.	4m to façade line (Ground level) and 6m to façade line (Upper Level)
			Zero lot dwellings: 0m (zero lot line)	
>9m - >15m	11m		Zero lot dwellings: 0m (zero lot line) or 1.2m	4m to façade line (Ground Level) and 6m to façade line (Upper Level)
			0.9m or 1.2m adjacent to zero lot boundary	

Front, rear and side setbacks Table 3

5. Private open space must be provided for each dwelling within a multi-housing development in the form of a balcony, courtyard, terrace and/or roof garden, to comply with the following:

lable 4	Private open space and landscaping				
Min lot frontage	Landscaped Area	Principle Private Open Space (PPOS)	Solar access		
>4.5 m lot	15% of the lot area	Minimum 16m ² with a minimum dimension of	At least 3 hours of sunlight between		
width		3m	9 am and 3 pm at the winter solstice		
		PPOS allowable in front setback	(21 June) to at least 50% of the		
7m – 9m lot width	15% of the lot area	Minimum 16m2 with a minimum dimension of	required PPOS of both the proposed		
		3m	development and the neighbouring — properties		
		PPOS allowable in the front setback			
9m – 15m Lot	t 25% of the lot area	Minimum 20m ² with a minimum of 4m	· properties		
Width		PPOS allowable in front setback			

Table 4 Detects an encoder and lands are in a

- 6. The design of front fencing is to integrate with the proposed housing design and comply with the following:
- Maximum 1.2m in height >
- > Combination of solid brick and black metal palisade (minimum 50% of fence to be open)
- Dense hedges can also be incorporated >

5.2.4 **Rail and Road Noise**

Development Controls

1. Acoustic treatments shall be provided, where required, in accordance with the Environment Noise and Vibration Assessment (Renzo Tonin, 2019) to address noise impacts from the rail corridor and Memorial Drive. Site specific acoustic assessments may be undertaken for any development application where alternative measures or treatments are proposed.

5.3 Non-residential development

Development Controls

1. Non-residential land uses, primarily retail and business uses, are to be located in close proximity to Corrimal station and the Heritage Plaza, as in accordance with Figure 6.



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- 2. Buildings fronting the Heritage Plaza shall comprise of predominantly non-residential uses on the ground floor to ensure activation and surveillance of the public space.
- 3. Non-residential uses may spill out into the Heritage Plaza as generally shown in **Figure 7** and be managed by the owner.
- 4. Any neighbourhood supermarket should be located and designed to minimise the extent of blank and non-active frontage to public streets and open space. The indicative location for a neighbourhood supermarket is shown on **Figure 6**.
- 5. Development within the Heritage Plaza shall integrate with the heritage of the site, through the interpretation of the heritage buildings as well as through landscaping.
- Awnings should be included in developments associated with the proposed retail uses, however are not necessary when a current heritage structure is being interpreted and adapted for retail and business purposes.
- 7. Signage on heritage structures adapted for the reuse should integrate and reflect the heritage character of the structure.
- 8. Access areas into buildings, including for loading, shall be generally in accordance with that shown on **Figure 8**.
- 9. All loading and unloading activities shall take place wholly within the designated loading bay, at all times, except for the uses associated with the adaptive re-use of heritage structures within the Heritage Plaza.
- 10. The designated loading / unloading area for the local retail use shall be kept free for that purpose, at all times.
- 11. All loading dock facilities must satisfy on-site manoeuvring areas for trucks in accordance with the Australian Standard AS 2890.2 Design Vehicular and Turning templates.
- 12. Loading / unloading facilities shall be located or screened so they are not directly visible from the adjoining residential area and do not transmit excessive noise onto any adjoining residential area.
- 13. An acoustic assessment report may be required at the discretion of Council with a Development Application where loading dock facilities are proposed to be positioned in proximity to any adjoining noise sensitive land uses including residential dwellings.

If required, the acoustic assessment report must address predicted maximum noise levels from loading and unloading activities conducted within the loading dock facility of the development and provide recommendations on acoustic attenuation measures required to mitigate any unacceptable noise impacts. The noise impact assessment report should apply the NSW EPA's "Noise Policy for Industry" maximum noise level assessment when assessing sleep disturbance.



Figure 6 Indicative Land Use

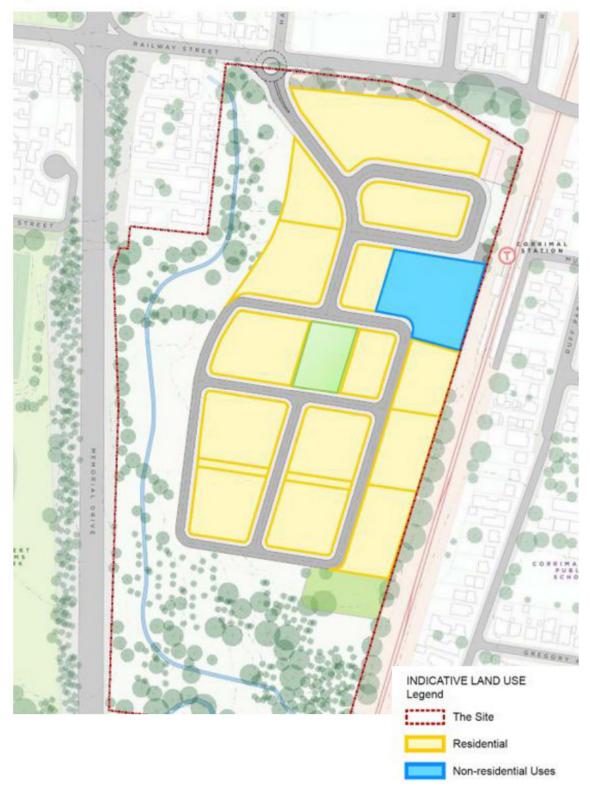
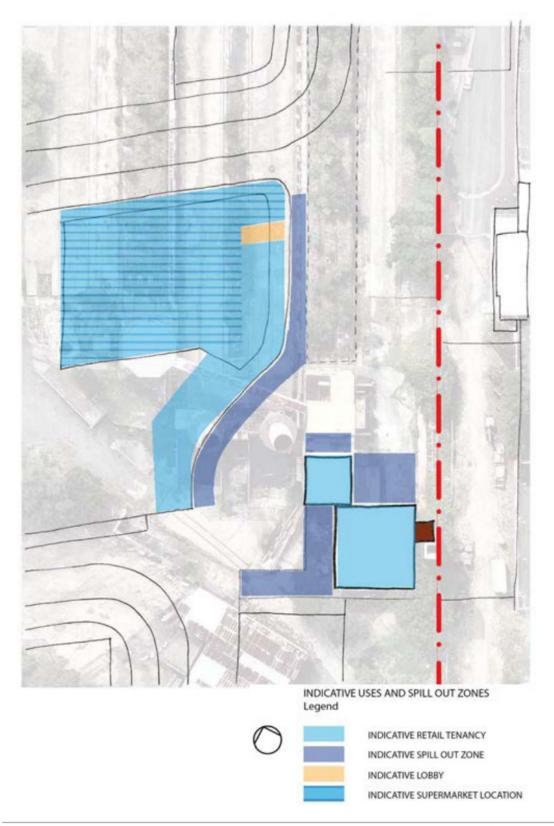




Figure 7 Indicative Uses and Spill out zone





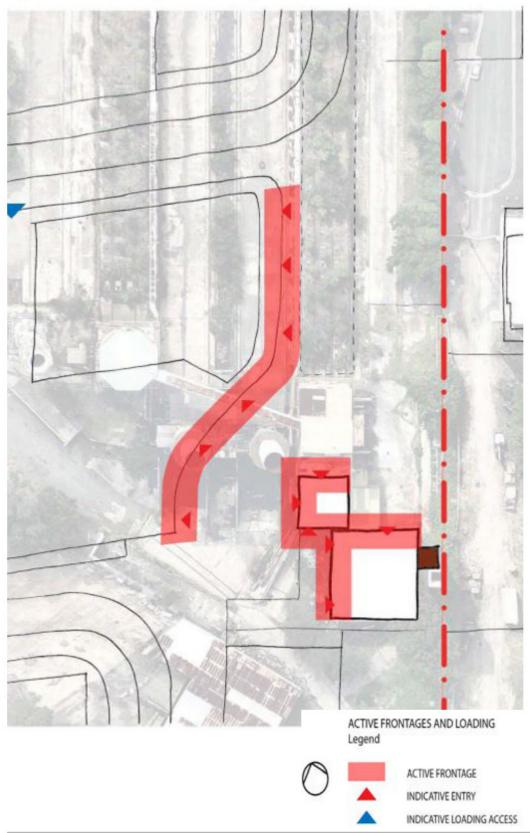


Figure 8 Active frontages and loading



5.4 Car parking and vehicular access

Development Controls

- 1. Vehicular access to development lots should be integrated with the design of the building and located to minimise impacts on adjoining streets.
- 2. Car parking for residential flat buildings may be provided in the form of a full basement, 'half in half out' basement or sleeved above ground.
- 3. On site car parking must be positioned to minimise impacts on the streetscape. Car parking must be located behind the building setback and be screened from view with well-designed structures and vegetation.
- 4. Car parking in residential flat buildings areas should be designed to conveniently, efficiently and appropriately serve residents and visitors of the site. This can be achieved in the following ways:
 - a) Ensuring that car parking areas are located close to entrances and access ways.
 - b) Car parking areas to be secure yet easily accessible for all residents.
 - c) Have clearly defined areas for visitor parking and disabled parking.
- Parking for cars, motorcycles and bicycles other than outlined in Table 5 must be provided and designed in accordance with the requirements contained in Traffic, Access, Parking and Servicing Chapter contained in Part E of the DCP.
- 6. Parking is to be provided for the site in accordance with **Table 5** below.

Land use		Car Parking Rates	Motorcycle Parking	Bicycle spaces	
Residential Flat Building, and shop top housing and multiple dwelling housing	1 bedroom	1 space per dwelling (<70m2)	1 motorcycle space per	1 bicycle space per 3 dwellings	
	2 bedroom	1.5 car space per dwelling (70- 110m2)	15 dwellings		
	3 bedroom	2 car spaces per dwelling (>110m2)			
	visitors	0.2 spaces per dwelling for visitors	N/A	1 bicycle space per 12 dwellings	
Retail		1 space per 25m ²	1 motorcycle space per 25 car parking spaces	1 bicycle space per 750m ² GFA for staff plus 1 space per 1,000m ² GFA for shoppers	
Restaurant		1 space per 25m ²	-	-	
Food and drink premises		1 space per 25m ²	-	-	

Table 5 Parking Controls

- 7. The layout of all residential flat building and non-residential car parking areas shall be in strict accordance with Australian Standard AS 2890 and the following additional requirements:
 - a) Parking areas must be designed so any vehicle which uses the area will be able to enter and leave the site in a forward direction.
 - b) Stacked or tandem parking may be permitted in residential flat building or non residential buildings in the following circumstances:
 - i. The applicant must demonstrate that there is a need for stacked parking and that the provision of stacked parking will not adversely affect the safe, efficient and effective use of the site;
 - ii. No more than two cars are parked in a stacked arrangement;
 - iii. Stacked parking should be limited to a maximum of 50% of all parking
 - iv. Provision shall be made on site for shifting cars without the movement of vehicles onto public streets;



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- v. Residential: only permitted where both spaces are utilised by the same dwelling and such spaces do not interfere with common manoeuvring areas;
- 8. On street parking should be subject to time restrictions in accordance with **Figure 9 and 10.** This is intended to avoid the potential for all-day commuter parking and promote the turnover of on street parking spaces for visitors.

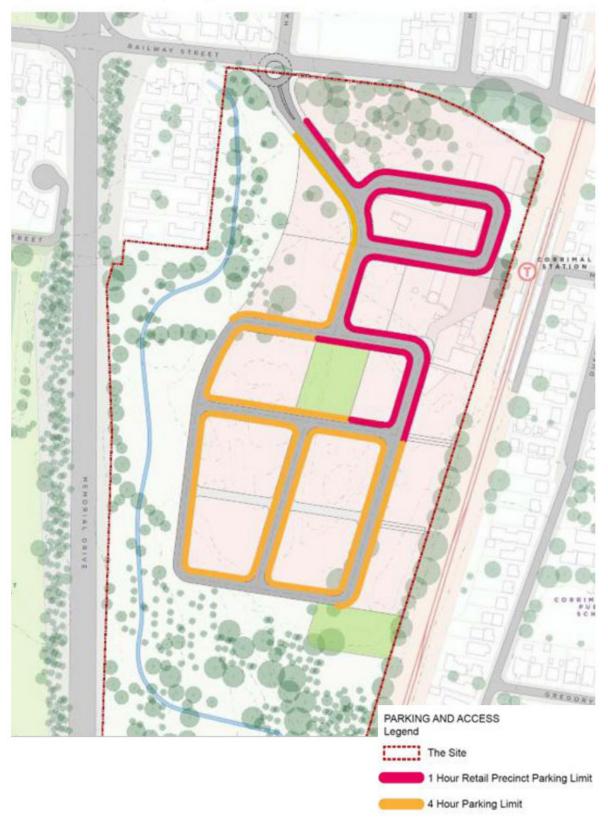


Figure 9 Parking





Figure 10 On street car parking





- 9. The design of basement car parking should support the use of natural ventilation where possible.
- 10. The design of basement car parking should be integrated with the overall design of the development and limiting the extent to which the podium extends beyond the building footprint will minimise the impact of the basement parking areas on the streetscape.
- 11. Protrusion of basement car parks should not exceed 1m above ground level. Design solutions may include stepping car park levels or using split levels on sloping sites
- 12. The following setbacks from side and rear boundaries apply to basement podiums:
 - a) Where the height of the basement podium (measured to the top of any solid wall located on the podium) is less than 1.0m above natural or finished ground level (whichever distance is greater), the basement podium may extend to the property boundary. A minimum 1.5m wide landscaped planter must be provided on the perimeter of any section of the basement podium which is located on a side or rear property boundary. Such planter must prevent direct access to the outer edge of the podium, to minimise direct overlooking of adjacent dwellings and open space areas.
 - b) Any portion of the basement (measured to the top of any solid wall located on the podium) which exceeds 1.0m above natural or finished ground level (whichever distance is greater) must be setback from the property boundaries by a ratio of 1:1 (height: setback). A minimum setback of 1.5m applies in this instance, with this area to be landscaped.
- 13. Ventilation structures/openings/exhausts for basement parking and air-conditioning units must be orientated away from windows of habitable rooms and private open space areas on the subject site as well as adjoining sites. They must be designed to minimise any visual or amenity impacts on adjoining public domain. Ventilation grills must be integrated into the design of the façade of the building to minimise their visual impact.
- 14. The visual impact of all basement walls must be minimised through the use of various design techniques including well-proportioned ground level articulation and relief, mixed finishes and materials, terracing and/or dense landscaping.
- 15. Any above-ground parking is to be sleeved behind the building so it is not visible from the public domain. It is expected that any above-ground parking will be covered in the form of a landscaped podium.
- 16. Waste collection vehicles may enter building basements from rear lanes to collect waste and/or recyclables subject to the following requirements:
 - a) Compliance with Australian Standard AS 2890.2 Parking Facilities: Off-Street Commercial Vehicle Facilities;
 - b) The height to the structural members and upper floor ceiling should allow for collection vehicle travel height/operational height, consistent with the type of vehicle nominated as the waste collection vehicle;
 - c) Adequate provision of space clear of structural members or vehicle parking spaces to allow a typical three-point turn of collection vehicles or alternatively, provision should be made for a truck turn table within the basement car parking area; and
 - d) The basement floor should be of industrial-type strength pavement and designed for a maximum wheel loading of seven tonnes per axle to accommodate garbage and recycling collection vehicles.



6 Heritage

This chapter should be read in conjunction with Chapter E11 of the DCP.

Objectives

- 1. Integrate and reflect the heritage significance of the site through conservation, interpretation and management within the planning and development of the curtilage area of the site.
- 2. Ensure that any development undertaken within the heritage curtilage is undertaken in a manner that is sympathetic and responds to the heritage character of the site.
- 3. Celebrate and interpret the heritage significance of the site in the design of buildings and open space in a manner that contributes to a broader understanding of the site's history and function.
- Provide opportunities for public access to, and appreciation of, retained heritage items within the curtilage.
- 5. Create opportunities for adaptive reuse or re-purposing of significant heritage items.
- 6. Encourage innovative approaches to the conservation and interpretation of the heritage items on the site.
- 7. Maintain and establish significant views to the Brick Chimney, and ensure the Brick Chimney is a key built form on the site.
- 8. Provide for interpretation of Aboriginal heritage values in development of the site.

Development Controls

- 1. Retention, interpretation and removal of existing structures on site shall generally be in accordance with the Conservation Management Strategy and Heritage Interpretation Strategy (Urbis 2019).
- Retention and re-use of existing structures will have regard to the condition of those structures and their suitability within a residential context in relation to safety, visual and physical connectivity and potential vandalism.
- 3. The salvage and re-use of materials from existing structures shall be included in future development outcomes, where possible.
- 4. The physical remains of the remnant tramway do not need to be retained, however interpretation of its historical value should be considered in the design.
- 5. A Heritage Impact Statement shall be submitted with development applications within the heritage curtilage area. The Heritage Impact Statement should be accompanied by a structural engineering report on the condition of items being addressed.
- 6. The existing industrial structures on the site shall be recorded through a photographic archival recording in accordance with NSW Heritage Council guidelines.
- 7. Identified Aboriginal heritage shall be managed in accordance with the Aboriginal Cultural Heritage Assessment (Kelleher Nightingale Consulting, 2019). Interpretation of identified Aboriginal heritage is encouraged and should occur in consultation with Registered Aboriginal Parties.
- 8. Further archaeological assessment associated with existing industrial structures may be required as part of future Development Applications where relevant.



7 Public Domain

The Corrimal Master Plan provides a range of new parks and open spaces for the community, integrated with the riparian corridor, biodiversity, cycle and pedestrian connections, proposed residential development and local retail hub.

These open spaces and public realm will cater for a variety of informal recreational areas, community activities and spaces for people, including older and younger residents and visitors.

Objectives

- 1. Provide a range of open space as identified in the master plan to create a high quality public domain and cater for a wide range of user needs.
- 2. Establish attractive and safe walking and cycle links across the site that also provide opportunities for regional linkages.
- 3. Incorporate heritage interpretation or public art to enhance place making.
- 4. Retain the existing tree line character along Railway Street as a green buffer to the development.
- 5. Establish a new riparian corridor that provides a significant natural edge to the development and provides a range of passive recreational opportunities.
- 6. Ensure that new public spaces are safe and accessible.
- 7. Provide for appropriately managed access to the site from Railway Street
- 8. Define a fine grain network and hierarchy of streets, lanes and pedestrian links to ensure connections within and out of the site.
- 9. Facilitate the potential for transport-oriented development and interchange at Corrimal train station, including providing a high quality public domain at the station.
- 10. Provide a conservation outcome for the occasional Grey Headed Flying Fox camp that avoids and minimises the potential for conflict with future residential development on the site

7.1 **Public open space areas**

Development Controls

1. New open spaces are to be provided in accordance with Table 6:

Table 6 Proposed park typologies

Open Space	Total Area (ha)	Ownership
Heritage Plaza	0.3ha	Private
Village Park	0.3ha	Council
Southern Recreational Park	0.3ha	Council
Riparian Corridor	7.7ha	Council

2. A landscaping plan is to be submitted with the development application for any of the open space and public realm areas, and generally be consistent with the landscape concept plan below.

3. The landscaping plan is to detail any proposed public art. Public art should be considered at selected locations within the public domain, and particularly consider opportunities for salvage and re-use of the



existing industrial elements. Any public art should be robust and low maintenance, and designed with consideration of public safety.

- 4. The design of new open spaces shall have regard to ongoing maintenance requirements, universal design and CPTED principles.
- 5. Locational and interpretive signage, and appropriate lighting shall be provided as part of the open space system.
- 6. All open spaces shall provide high quality and robust park furniture to allow the functional use of the open space by the community.
- Ensure that any servicing facilities are located to minimise impacts on the public domain. Any substation located within the public domain is to be positioned to minimise its functional and visual impact, and appropriate screened.



Figure 11 Indicative Landscape Plan





7.1.1 Heritage Plaza

The Heritage Plaza is intended to have an urban character and function. The primary functions of the Heritage Plaza are to:

- » Create a safe and accessible public domain that provide connectivity to Corrimal train station
- » Provide a community space that can be activated by adjoining neighbourhood retail uses
- » Celebrate existing heritage features through appropriate retention and interpretation

Development Controls

Key design controls for the Heritage Plaza include:

- 1. The design of the Heritage Plaza shall generally be in accordance with the concept provided in Figure 12.
- The design of the Heritage Plaza is to be appropriately integrated and reflects key heritage elements, in particular retaining and interpreting elements of the former industrial use and materials as part of the public realm in accordance with the Conservation Management Strategy and Heritage Interpretation Strategy (Urbis, 2019).
- 3. Provide a high level of physical and visual permeability to facilitate access to Corrimal station and activation of the Heritage Plaza, generally in accordance with **Figure 13**.
- 4. Facilitate direct access to Corrimal train station, noting that any works within the rail corridor will require the approval of RailCorp.
- 5. Provide appropriate lighting to promote a sense of safety.



Figure 12 Indicative concept design – Heritage Plaza

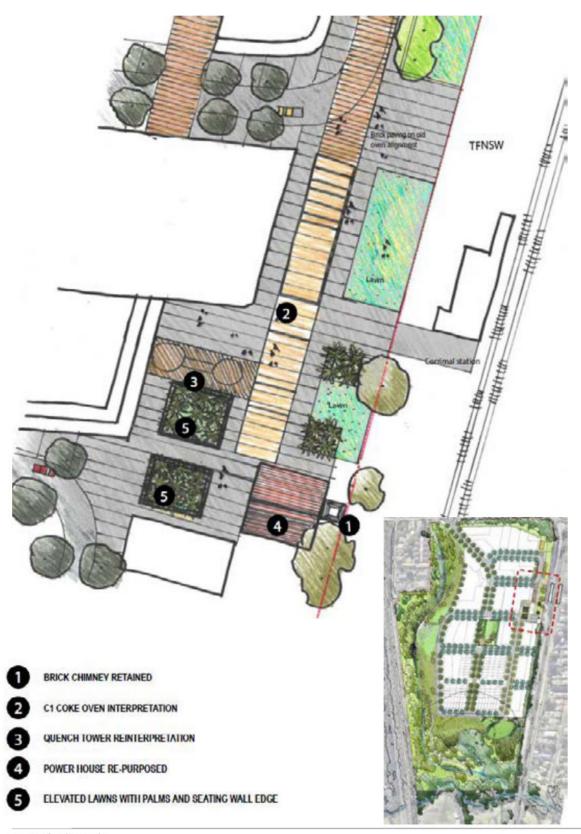
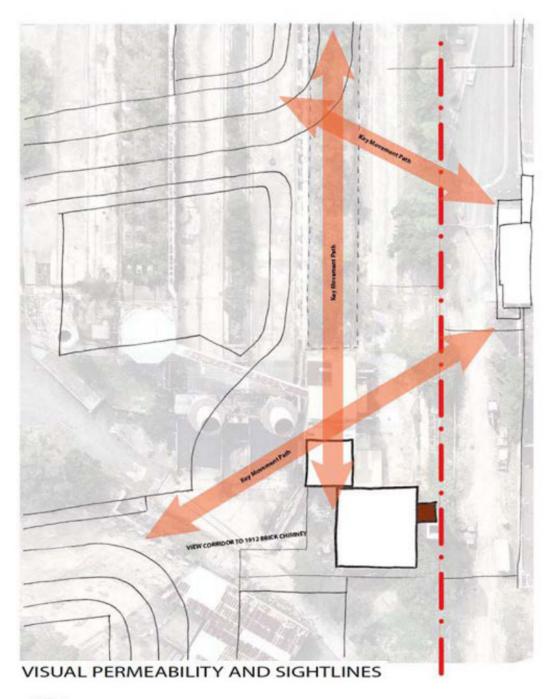




Figure 13 Permeability







7.1.2 Village Park

The Village Park is a neighbourhood scale recreational space that is intended to encourage community interaction and facilitate unstructured recreation activities for a range of demographics. The key functions of the Village Park are to:

- » Provide open lawn areas suitable for unstructured recreation activities and encourage community interaction
- » Incorporate a defined play space

Development Controls

- 1. A minimum 50% of the park is to be provided as open lawn area.
- 2. Incorporate a designated playground area with an appropriate range of equipment as well as formal seating areas, as generally indicated in **Figure 14**.
- 3. Provide a separate access path for any residential dwellings that front onto the park, with appropriate landscape screening to create appropriate privacy but simultaneously ensuring surveillance of the park.
- 4. The Village Park shall receive at least 4 hours of continuous solar access to at least 70% of its area all year round. Solar Access Studies showing the extent of overshadowing on the Southern park between 9am and 3pm on 21st June are to accompany all development applications.





Figure 14 Indicative concept design – Village Park



7.1.3 Southern Recreation Park

The Southern Recreation Park provides a second park providing additional recreation opportunities as well as supporting the transition between residential built form and the occasional flying fox camp core and the riparian corridor. The primary functions of the park are to:-

- » Provide an open lawn area suitable for unstructured recreation activities
- » Incorporate a community garden / urban farm
- » Provide a fenced, off-leash dog area

Development Controls

- 1. The proposed off-leash dog area shall be fully fenced.
- 2. Provide appropriate facilities to support the operation of the community garden, including water supply and shed for storage of equipment.
- 3. Provide informational / education signage to facilitate community awareness and understanding of the occasional flying fox camp located on the site.
- 4. There shall be a southern edge defining element, whether a fence, a pathway or the like, to provide adequate distance to the natural bushland and respond to the topography of that part of the site. A viewing platform may be incorporated on the park edge.
- 5. The Southern park shall receive at least 4 hours of continuous solar access to at least 70% of its area all year round. Solar Access Studies showing the extent of overshadowing on the Southern Park between 9am and 3pm on 21st June are to accompany development applications.



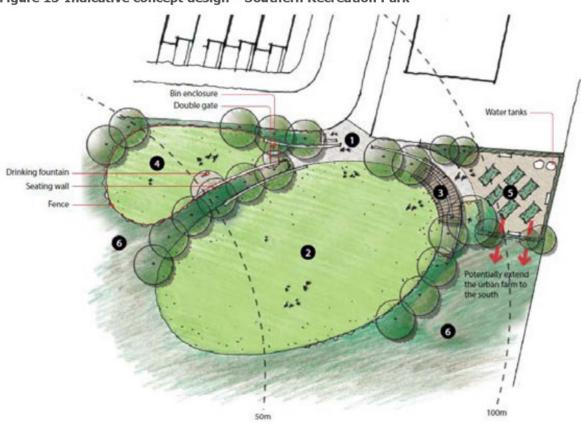






Figure 15 Indicative concept design – Southern Recreation Park



7.1.4 Riparian Corridor

The Riparian Corridor is established through a realignment of North Corrimal Creek to create an opportunity to establish a new green corridor with improved ecological, flooding and recreation outcomes. The primary functions of the re-aligned Riparian Corridor are to:

- » Provide a continuous green corridor from Railway Street to Towradgi Creek that reflects the natural qualities of the area
- » Appropriately manage ecological and flooding considerations on site, and not impact downstream properties
- » Improve regional connectivity through the provision of a continuous shared path
- » Provide appropriate passive recreational opportunities.
- » The Ecological Area provides for the conservation and enhancement of the Illawarra Lowlands Grassy Woodland located in the southern part of the site.

Development Controls

- 1. North Corrimal Creek is to be realigned to provide a connected riparian parkland and environmental outcome from Railway Street down to Towradgi Creek.
- Opportunities for passive recreation should be incorporated along the eastern bank of the riparian corridor, without comprising the flood management and stability requirements contained in Section 9 of this DCP.
- 3. A community event space may be included in the riparian corridor, and should include appropriate power and services to support community events.
- 4. The riparian corridor must be naturalistic in character and planting to support its ecological function, while still providing appropriate recreation opportunities and connectivity to deliver a regional asset.
- 5. Landscaping along the western embankment shall be designed to establish a natural bushland context to provide a visual buffer to Memorial Drive while also minimising maintenance requirements.
- 6. A shared pathway shall be provided along the riparian corridor from Railway Street and link with bridges (or as otherwise determined by Council) across the realigned North Corrimal Creek and Towradgi Creek, connecting to the Council owned reserve south of the site.
- 7. Prevent flooding impacts on site (and up and downstream) through the realignment of the riparian corridor, and creation of a flood free area suitable for residential development.
- The design of the riparian corridor shall be intended to establish a stable riparian environment that minimises ongoing maintenance requirements. Access requirements for maintenance shall be incorporated as part of the design.
- Retain and manage the Illawarra Lowlands Grassy Woodland EEC in the southern part of the site (see Figure 16) and other native plant communities according to the Vegetation Management Plan and GHFF Camp Management Plan.
- A Vegetation Management Plan for the riparian corridor is required to be submitted with the development application for the realignment of North Corrimal Creek, and is to incorporate measures that are consistent with the flying fox camp management plan (see Section 7.2).
- 11. Access to the Ecological Area is to be generally restricted except as required for maintenance.
- 12. The site stormwater management strategy should provide flows to the gully through the Ecological Area to maintain the existing hydrology of the area.





Figure 16 Retained Illawarra Lowlands Grassy Woodland



7.2 Flying Fox Management

Development Controls

- 1. A final Camp Management Plan is to be submitted at the development application stage and shall address ongoing management outcomes, including:
 - > Vegetation outcomes and management within the buffer area
 - > Community education
 - > Provision of aquatic habitat within the riparian corridor
 - Any proposal for supplementary habitat to support expansion of the camp away from the residential development
 - > Construction management measures to minimise potential disturbance to flying foxes
- 2. The flying fox buffer shall be treated generally in accordance with the following approach:
 - > An inner buffer of approximately 50 metres. This area will be primarily ecological in function with limited public access, except as required for specific functions contemplated by this DCP.
 - > An outer buffer of a further 50 metres. This area should be used for recreational purposes to support community amenity and roads, as well as limited residential development.
- 3. Limited residential development may occur within the 50-100 metre buffer zone, consistent with the master plan, and subject to implementation appropriate management and design measures, including:
 - > Building orientation to minimise potential for any land-use conflict
 - > Private open space should be located as far as practically possible from the flying fox camp
 - > Acoustic treatment is to be provided as required (subject to acoustic assessment at DA)
 - > Robust material selection
 - > Landscape selection is to avoid use of species that could attract flying foxes
- 4. Landscaping and vegetation within the buffer area will be designed to prevent the expansion of the camp further to the north.
- 5. Provide a shared path through the riparian corridor and within the flying fox buffer.
- 6. Encourage community interaction and facilitate unstructured recreation activities.
- 7. Retain and manage the Illawarra Lowlands Grassy Woodland EEC and other native plant communities according to the Vegetation Management Plan and GHFF Camp Management Plan.
- 8. The occasional flying fox camp is to be protected, retained and managed according to the GHFF Camp Management Plan. To prevent the flying foxes migrating into the newly planned built-up areas the following landscape principles should be considered in the landscape design:
 - > A treeless buffer between the existing occasional flying fox camp and the planned built infrastructure
 - > Additional open lawn recreational spaces to be provided directly north of the occasional flying fox camp
 - > Reducing permanent built structures inside the landscape in this area
 - > Recreational spaces will be surrounded by native grasses
 - > Designing of a "belly dip" area inside the realigned riparian corridor (in the south) relating specifically to the occasional flying fox camp.





Figure 17 Flying Fox Management buffer



7.3 Public Domain and Streets

7.3.1 Access to the site

Development Controls

1. Access to the site is to be provided from Railway Street with a new roundabout constructed at the intersection with Harbinger Street. The associated removal of vegetation is to be assessed through a Biodiversity Assessment Report (BDAR) as part of the development application

7.3.2 Streetscape character

Development Controls

- 1. The hierarchy of streets should be generally in accordance with **Figure 17**, and character as included in Table 6, and be integrated with the public transport railway station, kiss and ride and bus loop.
- 2. The Landscape Concept Plan for the streets and public domain should incorporate all positive streetscape elements including:
 - a) Street trees.
 - b) Remnant stands of trees.
 - c) Links and relationships to the heritage buildings and
 - d) On street car parking
 - e) Linkages with other open space areas in the locality
 - f) Street furniture, fences, and gates
- 3. The location and selection of street trees should have regard to requirements for utility services within the street verge.
- 4. Landscaping should reflect the character areas of the site and be used to soften the impact of buildings and to assist in providing visual relief to buildings.
- 5. Where the developer is responsible for the construction of footpath paving:
 - a) the type of paving is to be determined by Council according to the location
 - b) A nominal two percent (2%), minimum one percent (1%), maximum two and a half percent (2.5%) cross fall to be provided from property line to back of kerb.
 - c) The driveway entry threshold finish from the property boundary line to the face of the kerb must match the footpath and be designed to withstand predicted traffic loadings.
- 6. A change in driveway pavement is required at the entrance threshold within the property boundary to clearly show to motorists they are crossing a pedestrian area. Between the property boundary and the kerb, the developer must construct the driveway pavement in accordance with the conditions, technical specifications and levels to be obtained from the Council's Manager of Works. This requirement shall be reflected on the Construction Certificate plans and any supporting documentation.



Figure 18 Road Hierarchy

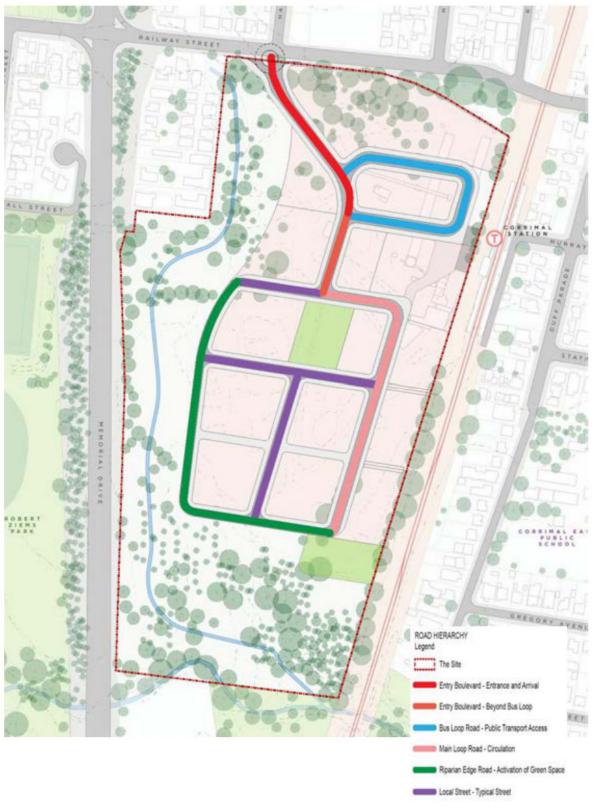




Table 7

7.3.3 Street Design and Road widths

Development controls

Street Design

Streets within the precinct are to be designed generally in accordance with Table 7 and cross sections below.

rubic /		Design							
Road Segment ID	Road Location	Street Type	Carriageway		Verge				
			Kerb Lane (m)	Centre Lane (m)	Total (m)	Verge (m)	Total Reserve (m)	Footpa th (m)	Share d Path (m)
1	Entry Boulevard	Type 5 (modified) Parking on one side	2.6 & 1.5	3	10.1	9.75 (5.25m one side, 4.5m other side)	19.85	1.5	3
2	Entry Boulevard (beyond bus loop)	Type 5 (with parking)	2.1	2.8	9.8	9.0 (4.5m each side)	18.8	1.5	3
3	Bus access loop	Type 4 (with parking and with bus stops as needed)	2.6	3	11.2	9.75 (5.25m one side, 4.5m other side)	21.0	1.5	3
4	Main Loop road	Type 5 (with parking)	2.1	2.8	9.8	9m (4.5m each side)	18.8	3m (1.5m each side)	N/A
5	Riparian Edge Road	Type 6 (modified) parking one side	2.1	3	8.1	4.5m one side	12.6	1.5m each side	N/A
6	Local Street (Typical Street)	Туре 6	2.3	3.5	8.1	9m (4.5m each side)	17.1	3m (1.5m each side)	N/A
7	Shared Zone Road	Type 7 (modified)	0	6	6	8 (4m each side)	14.0	N/A	N/A

An explanation and controls relating to each street are outlined below.



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Entry Boulevard

The Entry Boulevard reinforces the entrance and sense of arrival to the site.

Figure 19 Entry Boulevard Section





CharacterLandscapeParkingGrand entrance feel providing
clear, direct access to the station
and Civic Plaza for vehicles,
pedestrians and cyclistsMature trees in rows with
understorey planting in verge.No dedicated parking



Bus Loop Road

Bus access road allows for the circulation of public transport route.

Figure 20 Bus Loop Road Section

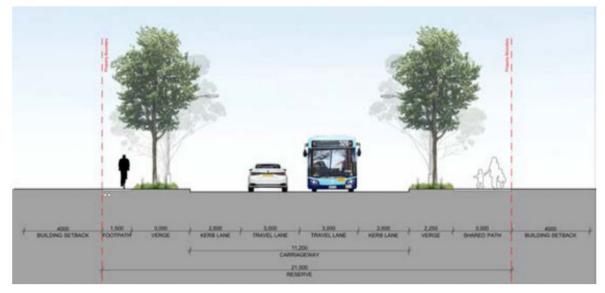
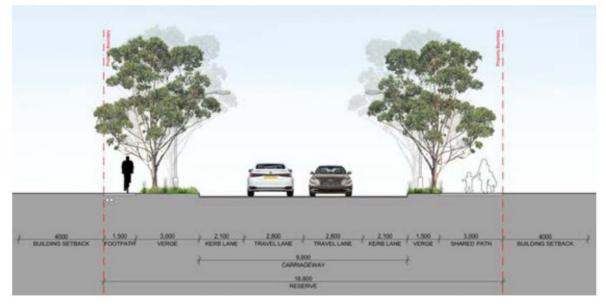


Figure 21 Boulevard Beyond Bus Loop









Character

Landscape

A clearly defined route for quicker circulation in and out of the Precinct and reinforcing the link between the Civic Plaza and larger useable open space in the Riparian Corridor Mature trees in rows with understorey planting in verge.

Parking

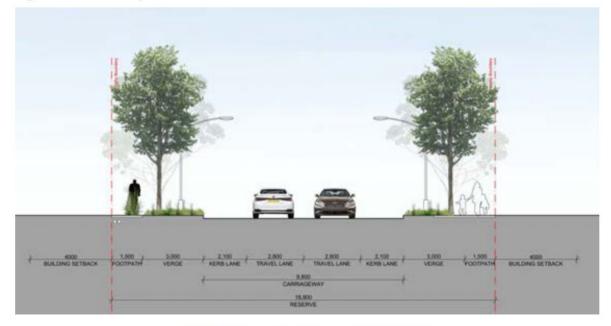
Dedicated parking on one side of the carriageway



Main Loop Road

The main loop road clearly defines the main circulation loop around the precinct.

Figure 22 Main Loop Road Section





Character

Clearly defined main circulation around the site for visitors and residents with flexibility to accommodate differing ground level interfaces Mature trees in rows with understorey planting in verge.

Landscape

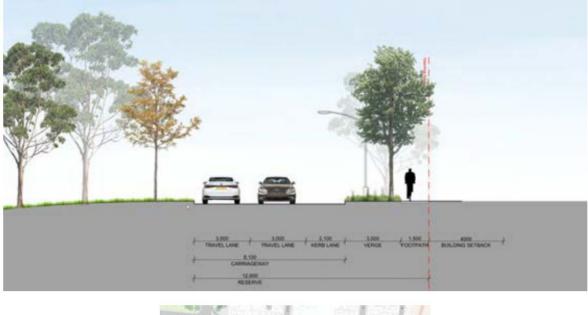
Dedicated parking lanes on both sides of the carriageway

Parking



Riparian Edge Road

Figure 23 Riparian Edge Medium Density





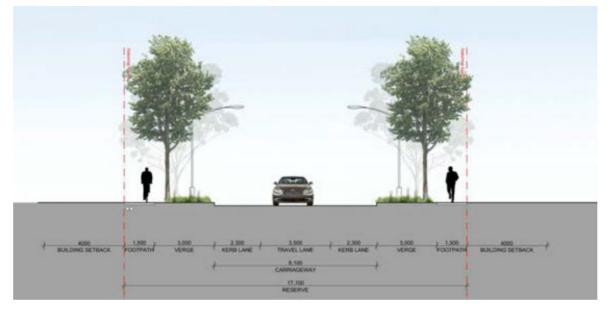
Character	Landscape	Parking
Provides interface to public open spaces.	Mature trees in rows with understorey planting in verge.	Single side of dedicated parking on the opposite side to the open space



Local Street

Local Streets within the Precinct cater to everyday use and provide pedestrian amenity. Street verges are to include mature trees in rows with complimentary understorey planting to act as a buffer for residential buildings.

Figure 24 Local Street Section





Character

Landscape

Provide local connections between more major streets and public open space within the Precinct Mature trees in rows with understorey planting in verge.

Parking

Dedicated parking lanes on both sides of the carriageway.



8 Other controls

Objectives

- 1. Manage the potential flood hazard and risk associated with the use and development of land within the floodplain
- 2. Provide for appropriate management of flooding to ensure that there is no increase in flood impacts around the site
- 3. Incorporate water sensitive urban design measures in the management of stormwater.
- 4. Establish a riparian corridor that supports a range of biodiversity, hydraulic and recreational outcomes.
- 5. Ensure that the realignment of North Corrimal Creek provides for the long-term stability and functioning of the creek.
- 6. Ensure that the land is suitable for its intended use
- 7. Ensure that earthworks are managed in an appropriate manner.

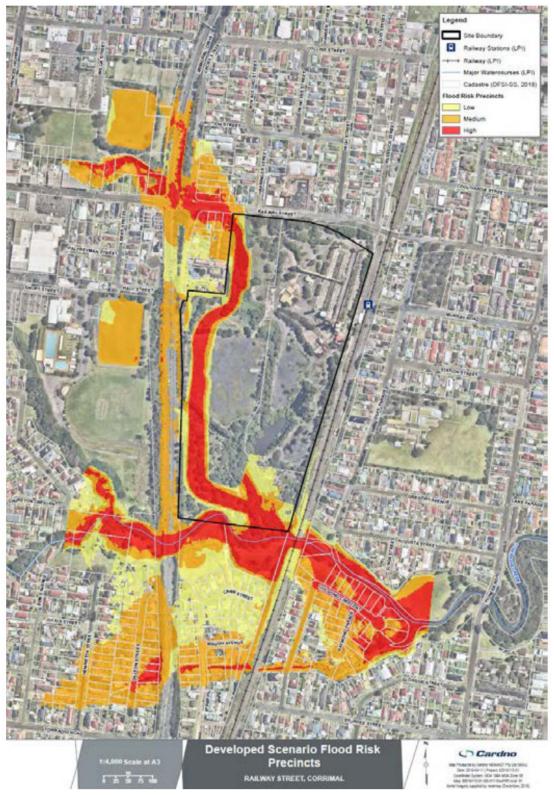
8.1 Flood management

Development Controls

- 1. An updated Flood Study is to be submitted with the development application for realignment of North Corrimal Creek to demonstrate that the design complies with the general parameters and flood outcomes from the Corrimal Coke Works Flood Study (Cardno, May 2019) as demonstrated in **Figure 25**.
- 2. Development should not detrimentally increase the potential flood affectation on other development or properties either individually or in combination with the cumulative impact of development
- 3. The development shall not result in any net loss of floodplain storage.
- 4. Provision of on-site stormwater detention (OSD) will be determined at development application stage and is to generally comply with Council's requirements
- 5. Vegetated Riparian Zones (VRZ) offset areas can be utilised for water quality treatment.
- 6. The 10m width requirement from top of bank, as outlined in Chapter E23 Clause 6.2 Table 2 and Clause 6.2.2 can be varied on the site, in cases where the realigned creek adjacent to Cross Street Residential dwellings will not result in any adverse impact upon the functions of the riparian corridor or any adverse flood hazard risk or other hazard risk, and in this situation Council may consider a variation to the minimum property offset.



Figure 26 Flood Management





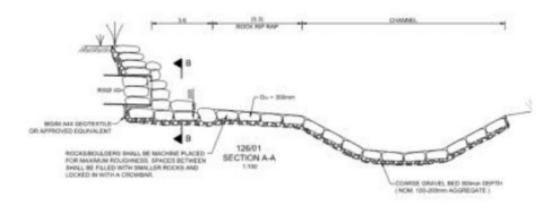
8.2 **Riparian corridor geomorphology and stability**

Controls

- 1. An average longitudinal grade of 1% (generally ranging from 0.5-1.1% and allowing for features such as riffle zones and drops)
- A micro channel ranging in width from 1-15m and wherever practical the low flows channel shall concentrate on either side of that channel, and be generally consistent with Figure 30. The micro channel should meander and include options to:
 - Establish a pool rock step morphology with rock steps constructed of large sandstone boulders.
 Where appropriate, the rock steps should be designed to provide opportunities for community access to the creek during low flows
 - Provide alternating mini retaining rock structures or low rock benches along the low flow channel. Retaining rock structures should be approximately 500mm below the current design level of the macrochannel base and grade up gently in a downstream direction. These should be vegetated with dense plantings of native ground cover grasses/sedges and shrubs
 - > On outside bends, during establishment and stabilisation of all channel banks, vegetation will be used as part of the stabilising techniques.
 - > Where outside bends of the low flow channel are close to the bank of the macro-channel, there should be rock protection at the bend to prevent scour at the toe of the macro-channel bank.
- 3. Provide rock pitching or other hard scour protection measures where soft scour protection is inappropriate measures (e.g. stepping stones).
- 4. The riparian corridor shall generally have, and generally shown in Figure 26-31 :
 - > A macro channel ranging in width from 20-80m wide
 - > An offset from top of bank (varying in width from 5-10m) along the western bank to Memorial Drive and private property
 - > The PMF shall be contained within the newly formed creek channel.
 - > Batter slopes no steeper than 1V:2H throughout, while allowing for landscape elements with an aesthetic or amenity value (eg sandstone blocks/seating walls) that are not structural or load bearing
- 5. All structural retaining walls to be located above PMF level. All retaining solutions would be designed by a structural engineer, comply with Council specifications and utilise natural materials (e.g. sandstone blocks or similar) to achieve the desired landscape character
- 6. Western embankment to be planted with a range of native grasses, understorey shrubs and tree species with deep root structures and to be relatively low maintenance
- 7. For the Western Bank it is envisaged that the modified channel will have rock retaining walls and meander the centre line of the creek to create access on the western bank and cut in graded access to the channel. Retaining walls such as those shown in the below figures should be developed.



Figure 27 Design of retaining walls



- 8. Eastern embankment to combine areas of native planting with spaces and paths for creek-oriented recreational uses
- 9. Landscape plans to provide the specification for appropriate planting and establishment to support bank stability, riparian outcomes and compatible recreation uses.
- 10. All stormwater discharge from the site will be directed in a controlled manner to the creek system, limiting discharge over creek banks and directly into the micro channel.
- 11. The creek tie in and confluence point should avoid major disturbance and reinstate connectivity to Towradji Creek, as it creates a formed channel to an existing water course. Detailed design shall address how the tie in to the existing channel will minimise impact at the confluence and the adjacent Endangered Ecological Community (EEC).
- 12. The riparian land within a subdivision will be subject to a Vegetation Management Plan (VMP) to assist in establishing an ongoing management process. This VMP will include ownership, maintenance and management arrangements.



Figure 28 Riparian Corridor stabilisation design

NOTE: new plan to be inserted to reflect the revised urban design

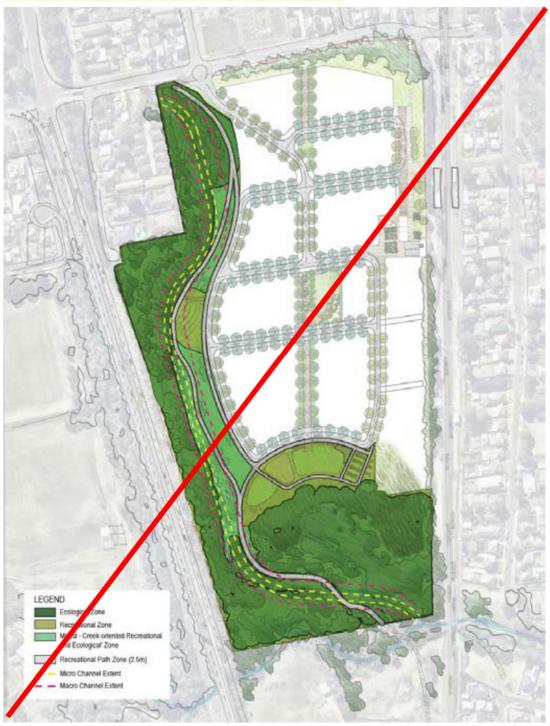




Figure 29 Creek section – Amphitheatre

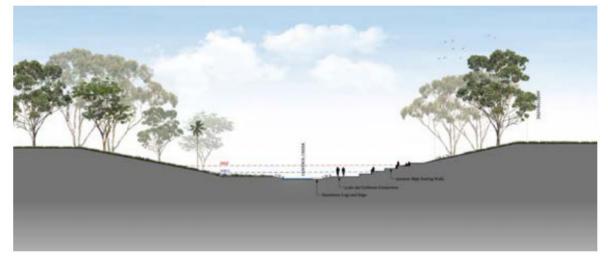
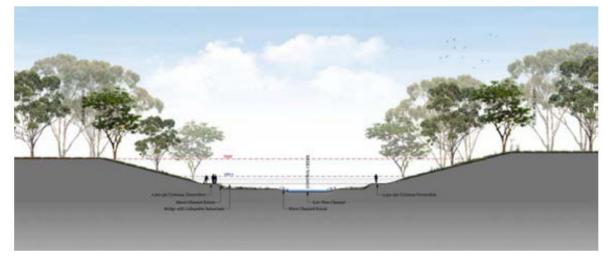


Figure 30 Bridge Section



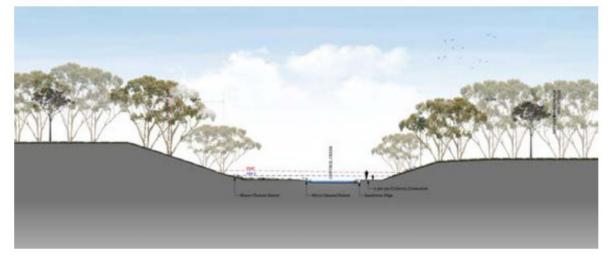


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Figure 31 Southern Park Section



Figure 32 Illawarra Lowlands Grassy Woodland Area Section – North West



8.3 Contamination and Remediation

Controls

- 1. Remediation on the site should be undertaken generally in accordance with the Remediation Action Plan (Arcadis, May 2019) and under the oversight of an EPA accredited Site Auditor.
- 2. A Site Audit Statement is to be provided following the completion of remediation works and prior to the occupation of any residential dwelling.



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8.4 Earthworks

Controls

- The design of bulk earthworks should result in appropriate interfaces to existing site boundaries including Railway Street, the rail corridor and Memorial Drive. Earthworks should also have regard to generally maintaining existing ground levels in the vicinity of retained heritage items.
- 2. Bulk earthworks should be undertaken in a manner that seeks to achieve a balance of cut and fill as reasonably possible in order to reduce the extent of fill import or export.
- 3. The extent of cut and fill associated with bulk earthworks should be minimised, except where associated with:
 - > Realigning North Corrimal Creek, including the new creek corridor and filling the existing creek
 - > Filling existing dams
 - > Removing substantial earth berms/bunds across the site
 - > Remediation of contaminated areas.
- 4. All earthworks are to be undertaken under appropriate Level 1 geotechnical supervision.
- 5. A waste classification shall be undertaken for any fill material to be disposed off-site.
- 6. Imported fill must be free from any soil contamination and accompanied by an appropriate waste classification prepared in accordance with the requirements of the NSW EPA Waste Classification Guidelines (2014) and with consideration of the Protection of the Environment Operations (Waste) Regulations (2014). All imported material must be classified as virgin excavated natural material (VENM). In restricted circumstances where deemed appropriate Excavated Natural Material (ENM) may also be accepted as long as it is in keeping with the requirements of any regulatory bodies and the proposed site use.
- 7. Where earthworks involve land known or suspected to be contaminated, the provisions of the Contaminated Land Management Chapter in Part E of this DCP will also apply.



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9 References

Table 7 References

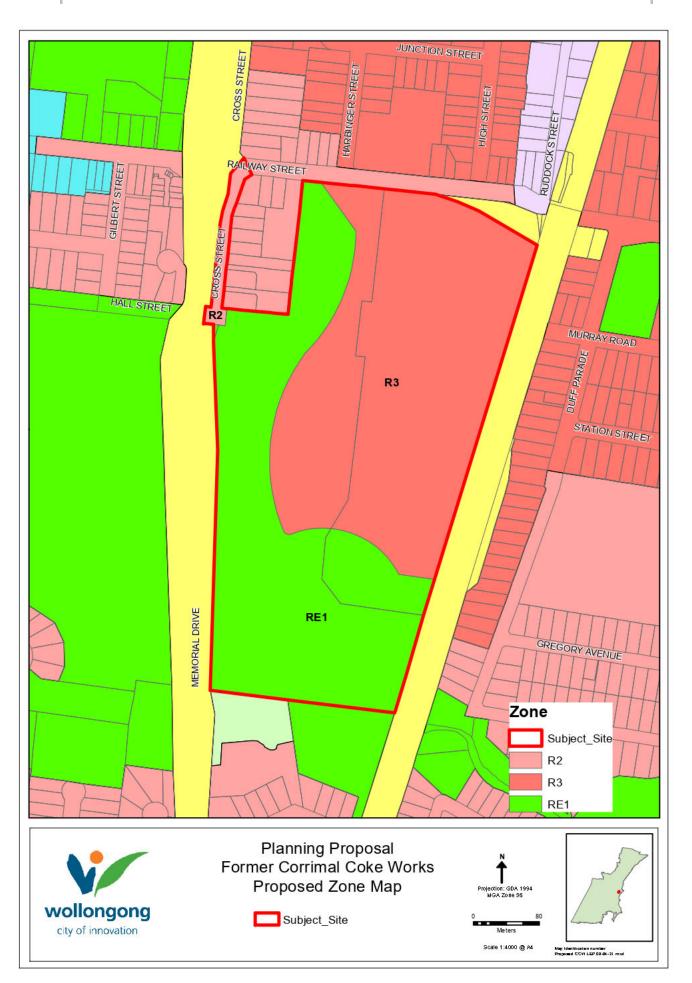
Report	Prepared by/author	Date
Aboriginal Cultural Heritage Assessment	Kelleher Nightingale Consulting Pty Ltd	17 May 2019
Conservation Management Strategy	Urbis	30 July 2019
Creek Realignment Stability Assessment	BG&E	19 March 2019
Supplementary information regarding creek realignment	BG&E	2 August 2019
Heritage Interpretation Strategy	Urbis	7 May 2019
Historical Heritage Assessment	Biosis	1 August 2017
Noise and Vibration Assessment	Renzo Tonin & Associates	20 May 2019
Structural Assessment of Existing Structures	BG&E	21 June 2019







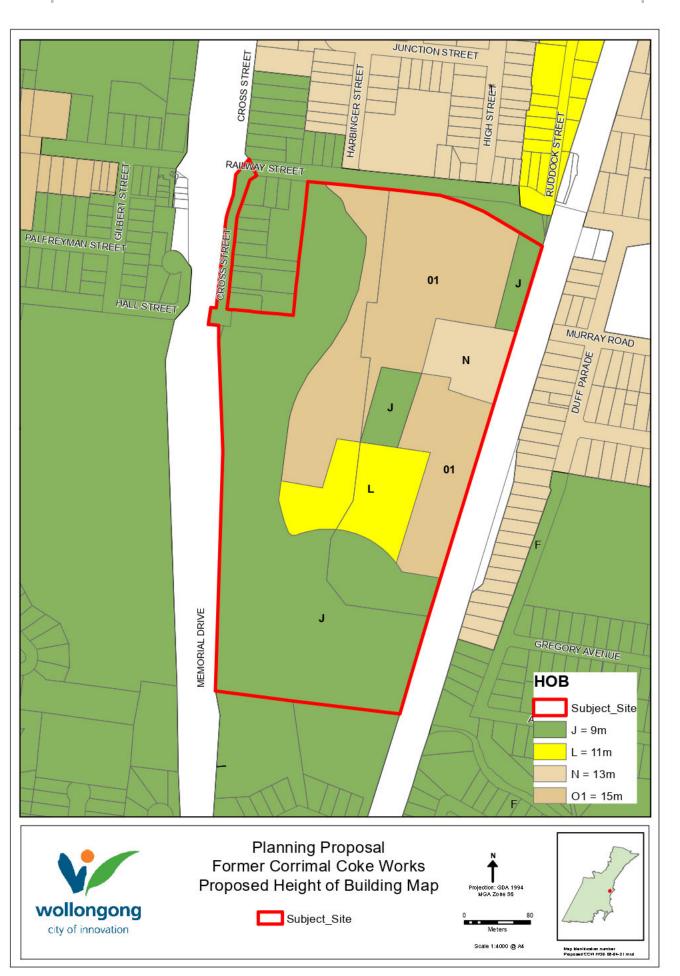
Item 4 - Attachment 7 - Proposed WLEP 2009 Maps - Zoning, Height of Buildings, Floor Space Ratio, Minimum Lot Size, Riparian Lands, Natural Resource Sensitivity, Key Site Map and Urban Release Area



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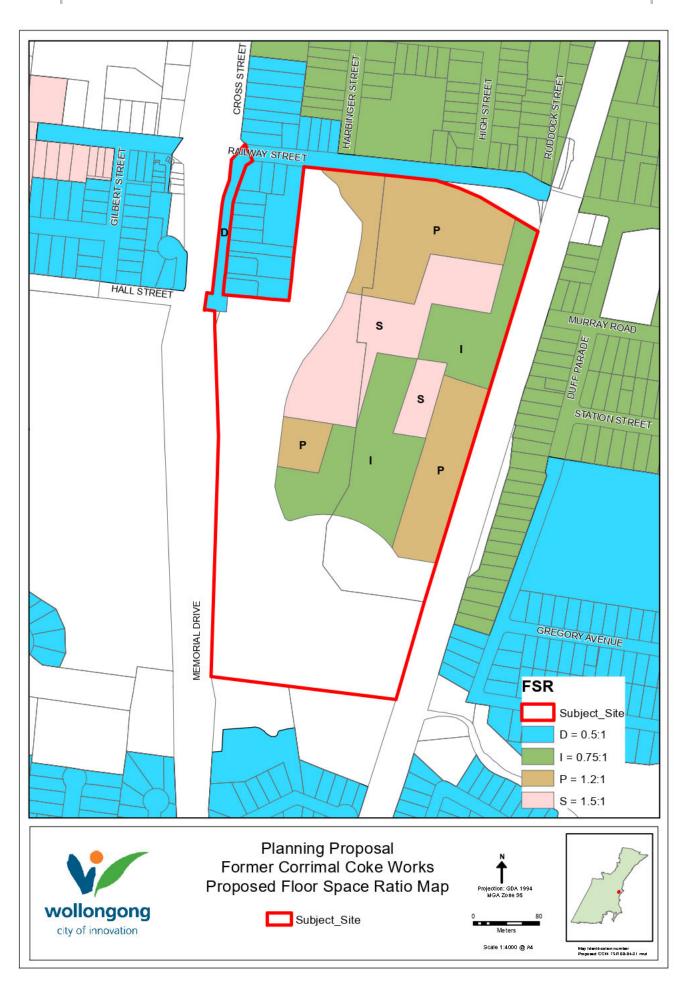


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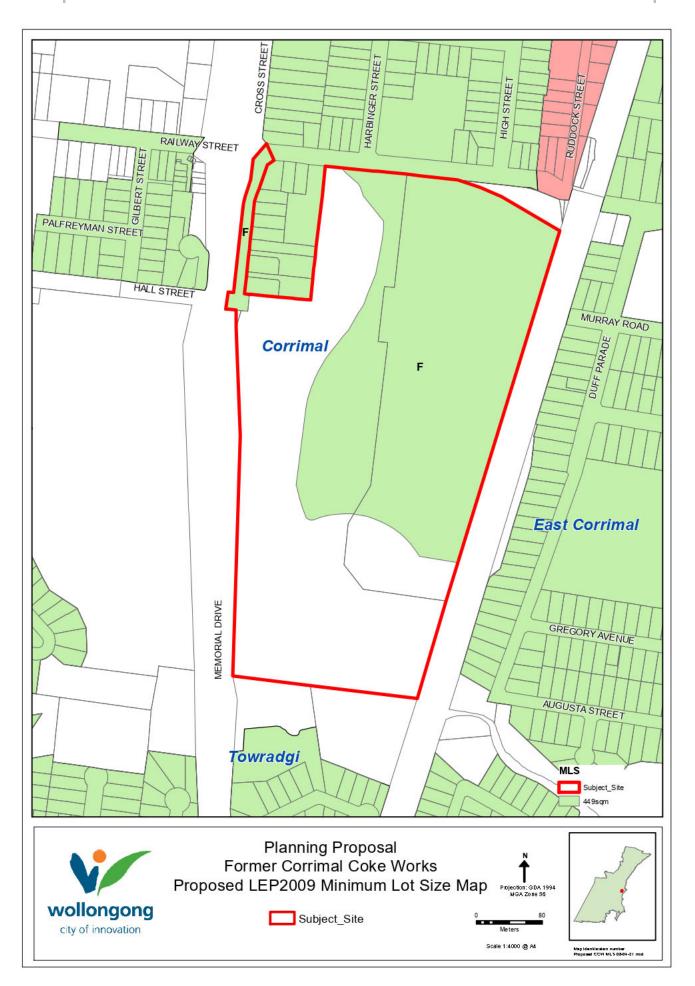


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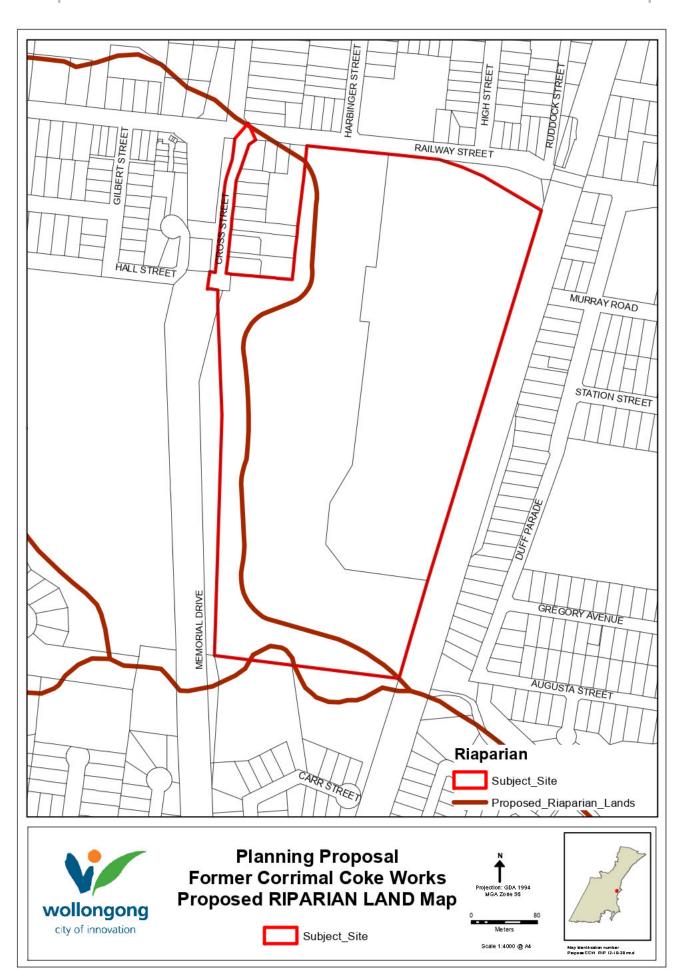


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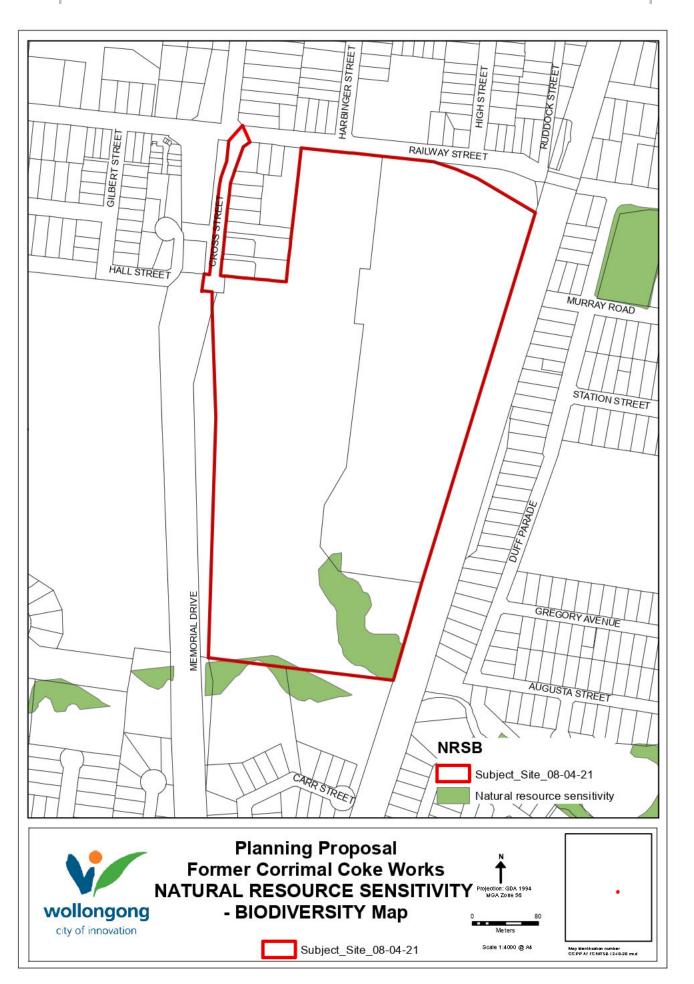


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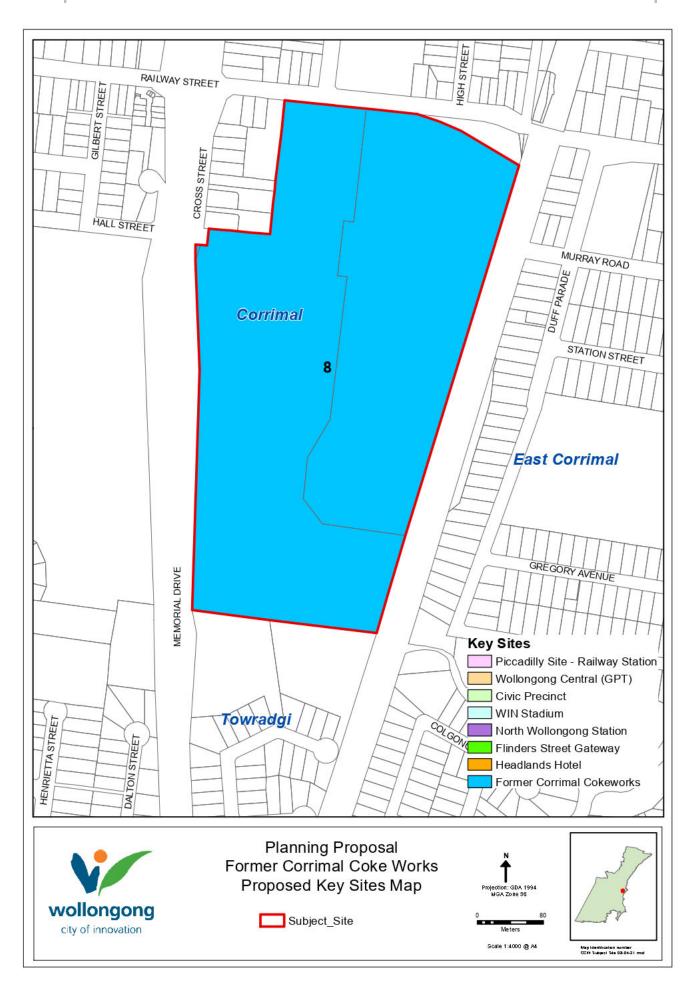
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Item 4 - Attachment 7 - Proposed WLEP 2009 Maps - Zoning, Height of Buildings, Floor Space Ratio, Minimum Lot Size, Riparian Lands, Natural Resource Sensitivity, Key Site Map and Urban Release Area



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