LPP No.	Item No. 2
DA No.	**DA-2020/1342**
Proposal	Residential - demolition of existing structures, tree removals and construction of a residential flat building comprising 14 units with associated basement carparking, landscaping and services infrastructure
Property	Lot 11 DP 562677 404 Princes Highway, CORRIMAL NSW 2518
Applicant	Applicant - The View North Beach Pty Ltd
Responsible Team	City Planning - City Wide Team (BM)

Executive Summary

Reason for consideration by Local Planning Panel

The proposal has been referred to the WLPP **for determination** pursuant to part 2(b) of Schedule 2 of the Local Planning Panels Direction as the application is the subject of 10 or more unique submissions by way of objection and part 3 the proposal contravenes a development standard imposed by a Local Environmental Plan for building height by more than 10% at 14.9%.

Proposal

The proposal is for demolition of existing structures, tree removals and construction of a 3 storey residential flat building comprising 14 units with associated basement carparking, landscaping and services infrastructure.

Permissibility

The site is zoned R2 Low Density Residential pursuant to Wollongong Local Environmental Plan (WLEP) 2009. The proposal is categorised as a Residential Flat Building and is permissible in the zone with development consent.

Consultation

The proposal was exhibited in accordance with the Wollongong Community Participation Plan 2019 between 4 January 2021 and 9 February 2021. Eleven(11) submissions were received during this period. Upon submission of amended plans and additional information, the proposal was re-exhibited between 24 June 2021 and 8 July 2021 and no submissions were received at the time.

The submissions received are discussed at section 1.5 of the assessment report.

Internal

Details of the proposal were referred to Council's Stormwater, Traffic, Landscape, Environment, SCAT, Geotech divisions for assessment and Council's Design Expert for advice. Unsatisfactory referral advice was provided by Stormwater and Landscape officers and Council's Design Expert. Concerns related to SCAT matters and comments and/or recommended conditions were provided in other referral instances.

External

Details of the proposal were referred to Council's Design Review Panel (DRP), Natural Resources Access Regulator (NRAR) and Endeavour Energy. The proposal was reviewed by DRP on two occasions where issues identified included non-compliances with the ADG and SEPP 65. Final advice received from NRAR and Endeavour Energy provided satisfactory comments subject to conditions.

Main Issues

The main issues of the development application are,

- Non-compliance with State Environmental Planning Policy No. 65 Design Quality of Residential Apartment Development and the companion Apartment Design Guide
- Departure to Clause 4.3 Height of Buildings development standard of Wollongong Local Environmental Plan, 2009.
- Flood risk issues and potential flood affectation on other developments
- Impact on existing trees.
- Non-compliance with Wollongong Development Control Plan 2009 (WDCP2009) controls related to front and side setbacks.

Recommendation

DA-2020/1342 be **refused** for reasons detailed in Section 5 of this report.

1 APPLICATION OVERVIEW

1.1 PLANNING CONTROLS

The following planning controls apply to the development:

State Environmental Planning Policies:

- SEPP No. 55 – Remediation of Land
- State Environmental Planning Policy No 65 – Design Quality of Residential Flat Development
- SEPP (Building Sustainability Index: BASIX) 2004
- SEPP (Koala Habitat Protection) 2021
- SEPP (Coastal Management) 2018

Local Environmental Planning Policies:

- Wollongong Local Environmental Plan (WLEP) 2009

Development Control Plans:

- Wollongong Development Control Plan 2009

Other policies

- NSW Apartment Design Guide
- Wollongong City-Wide Development Contributions Plan 2021
- Wollongong Council Community Participation Plan 2019
- Biodiversity Conservation Act 2016

1.2 DETAILED DESCRIPTION OF PROPOSAL

The proposal is for the construction of a 3 storey Residential Flat development with basement car parking and associated landscaping. The initial design proposed 15 units including 2 adaptable units. The proposal was revised during the assessment period in response to Design Review Panel considerations and Council officer's referral comments resulting in a reduction to 14 units including 2 adaptable units.

The revised plans were re-exhibited. The proposal includes the following:

Site preparation

- Demolition of existing dwellings
- Earthworks for the preparation of the building works and tree removal.

Works / Construction / building details

- construction of a 3 storey residential flat building containing basement car parking and fourteen (14) units.
- Removal of selected trees, with the provision of associated supplementary replacement plantings/landscaping and stormwater drainage.

The mixture of units proposed includes:

- 1 Bedroom – 3 units
- 2 Bedroom - 8 units
- 3 Bedroom – 3 units

Basement car parking comprising:

- 22 residential car parking spaces (including 2 spaces of capable of adaption for people with disabilities)
- 3 visitor car parking spaces
- 2 motorcycle spaces.
- 5 bicycle spaces.

Landscaped areas are to be managed adjacent the creek along the southern and eastern parts of the site with planter boxes on upper floor level.

Access for vehicles is via a driveway off the Princes Highway and a separate pedestrian entry.

Bin Storage area located towards the southern side on ground floor.

Architectural Plans are provided at Attachment 1.

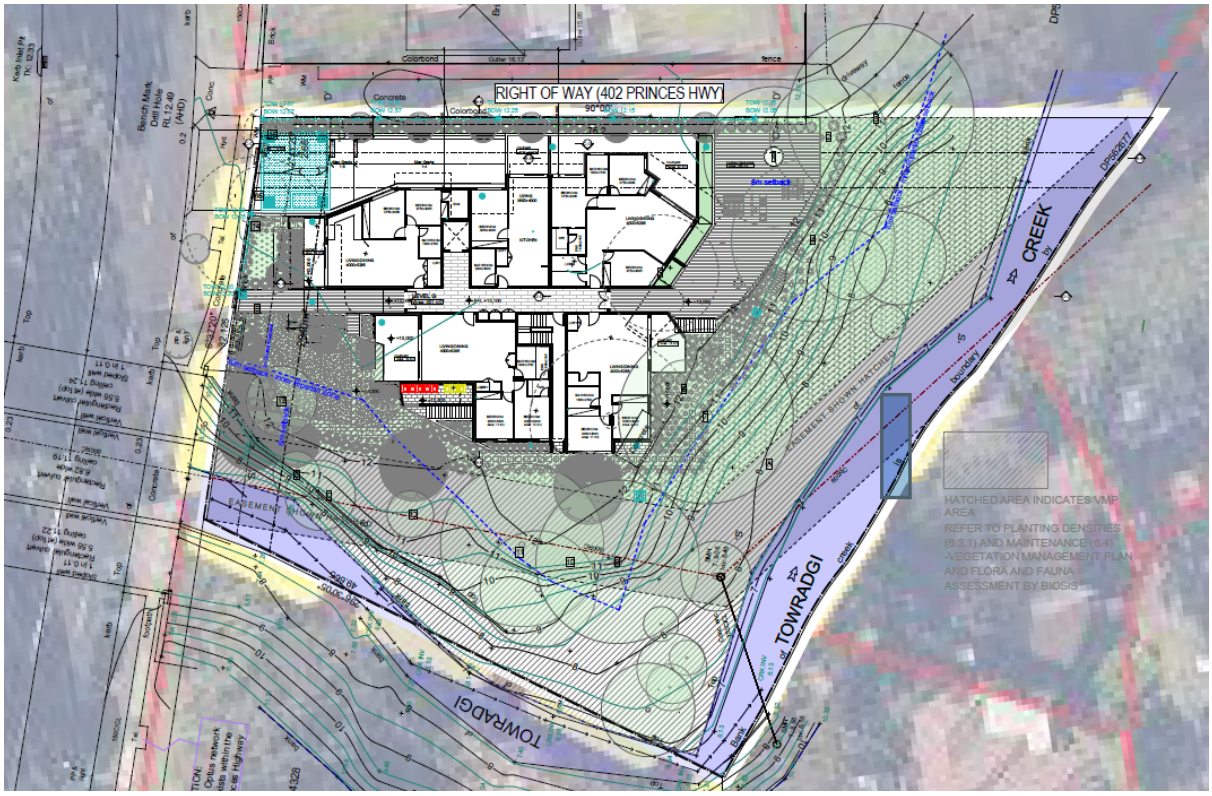

Figure 1: Site Plan

1.3 BACKGROUND

Application Number	Description	Decision	Decision Date
DA-1993/110	Dual Occupancy	Approved	19-Apr-1993
BA-1993/902	Proposed Single Storey Dual Occcupancy	Approved	28-Jun-1993
DA-2005/1169	Single storey dwelling house	None	12-Apr-2006
DA-2007/1453	Alterations and additions to dual occupancy	Approved	14-Mar-2008
PL-2016/129	Multi unit development with basement car parking	None	01-Nov-2016
DA-2018/777	Residential - demolition of existing structures, tree removals and construction of a residential flat building - 12 units, riparian land works and associated infrastructure	None	19-Nov-2018
PL-2020/10	Residential - multi dwelling housing	None	12-Mar-2020
DA-2020/1342	Residential - demolition of existing structures, tree removals and construction of a residential flat building comprising 15 units with associated basement carparking, landscaping and services infrastructure		

A Pre-lodgement meeting (PL-2020/10) was held on 28 February 2020. Design Review Panel meetings were held twice on 19 January 2021 and 4 August 2021 as part of the development application assessment process. A copy is provided at Attachment 7

A previous application (DA-2018/777) was withdrawn due to unresolved matters mainly related to flood risk, stormwater drainage and non-compliance to the Building Height development standard.

Customer service actions

There are no outstanding customer service requests of relevance to the development.

1.4 SITE DESCRIPTION

The site is located at 404 Princes Highway CORRIMAL NSW 2518 and the title reference is Lot 11 DP 562677.

The subject site is an irregular shaped allotment of land with the eastern and southern portions of the site adjoining Towradgi Creek, residential dwellings to the north, multi dwelling development to the south and Corrimal commercial centre located further south. The site has a total area of 2940sqm.

The site has a primary frontage to the Princes Highway of 32.125 metres, rear southern splayed boundary width of 49.665 metres, northern side boundary of 76.20 metres and eastern boundary along the Towradgi Creek. Existing dwellings on site are to be demolished.

The northern boundary bounds a Right of Carriage Way, that provides access to the multiple dwellings on the northern side. The site is relatively flat on the northern side and slopes moderately to the South and Eastern sides towards the creek.

Property constraints

Council records identify the land as being :

- Flood Risk Precinct
- Unstable land
- partly Ecological Sensitive land – NR Biodiversity
- Coastal Management - partly affected.
- Foreshore Building Line

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Restrictions on 88b instrument

Restrictions related to the site include an easement for sewage extending along the southern and eastern side. The site benefits from existing 15ft Right of Carriage Way adjoining the Northern boundary however, this is not proposed to be used to form access to the development.

Figure 2: Aerial photograph

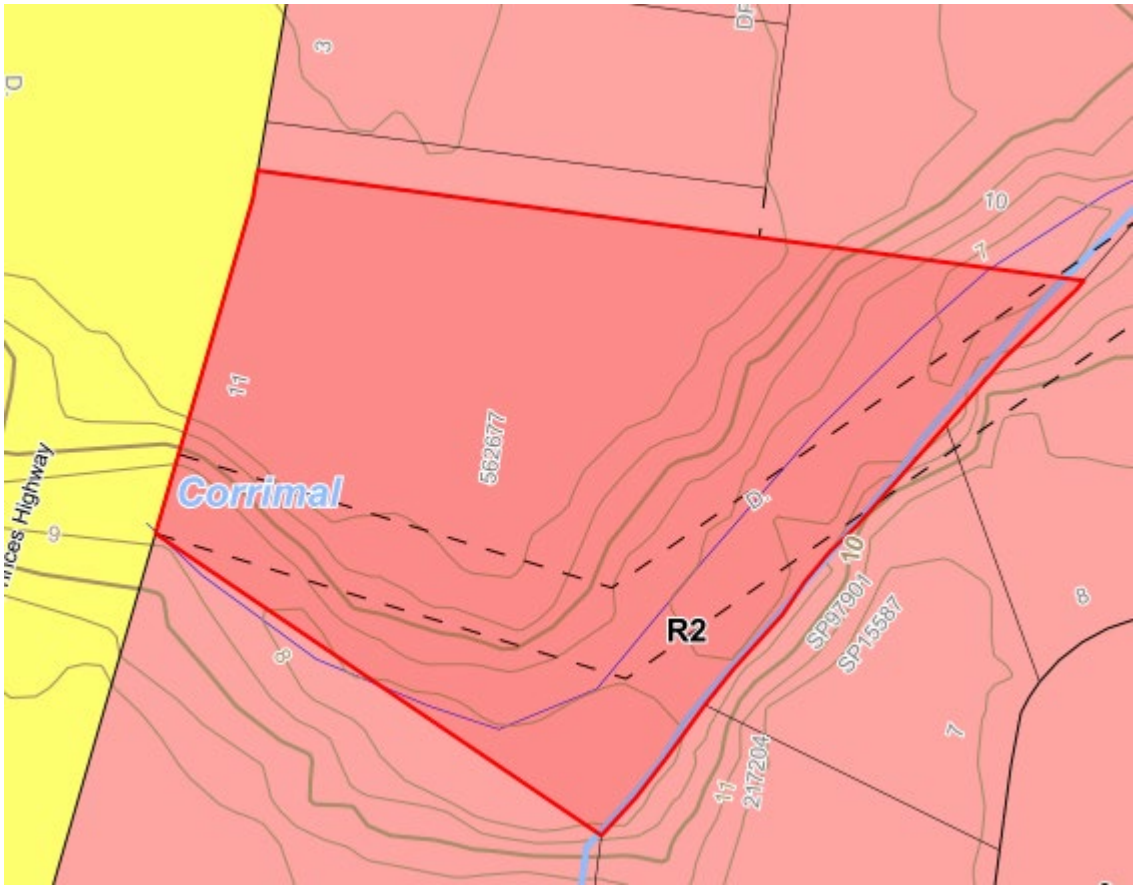

Figure 3: WLEP 2009 zoning map

1.5 SUBMISSIONS

The application was notified in accordance with Wollongong Community Participation Plan 2019 between 4 January 2021 and 9 February 2021.. Eleven(11) submissions were received.

Upon submission of amended plans and additional information, the proposal was re-exhibited between 24 June 2021 and 8 July 2021. No submissions were received during this period.

Table 1: Submissions

Concern	Comment
1. Non-compliance with Building Height	The proposed yield involving a departure to the Building Height development standard is considered excessive for the site and inconsistent with the existing character for the locality
2. Risk of Development in Flood Prone Land	Council's Stormwater engineer has undertaken a detailed assessment of the flood risk associated with the proposed development. The proposal is not supported
3. Traffic and Safety impacts	Council's Traffic engineer has reviewed the proposal and raised no significant concerns on traffic or parking related issues.
4. Building Design and accessibility	The development assessed against ADG principles is not found satisfactory.
5. Anomaly in the information within the Statement of Environmental Effects (SOEE)	Amended SoEE and information rectified most of the previous anomalies.
6. Tree loss / impact on Riparian corridor and waterway	Council's Landscape officer's review is not satisfactory in terms of the impact to the trees on site.

Table 2: Number of concerns raised in submissions

Concern	1	2	3	4	5	6
Frequency	7	*4*	*5*	*6*	*5*	*2*

1.6 CONSULTATION

1.6.1 INTERNAL CONSULTATION

Stormwater Engineer

Council's Stormwater Engineer does not support the proposal as the applicant failed to address the following matters and was given multiple chances for a revised submission.

- *It appears that there is flooding on adjoining properties in the PMF. In this regard Flood Impact Mapping for the PMF must be provided. It must be demonstrated that there is no increase flooding elsewhere on adjoining properties in accordance with Section 11.3.17 of Chapter E14 of the Wollongong DCP2009.*
- *It must be demonstrated how flood storage will be provided for the post developed condition to maintain the same flood storage as the pre-developed condition.*

- *It must be demonstrated that there no reduction in flood storage on the site and no detrimental increase in potential flood affectation of other development properties in events up to and including a Probable Maximum Flood (PMF) event.*

Landscape Architect

Council's Landscape Officer does not support the proposal and raised concerns on the impacts on trees and tree protection zones and lack of revised arborist report with the latest amended design.

Additional information submitted by the applicant has been reviewed and was not considered satisfactory.

Design Expert

Council's Design expert reviewed the recent amendments and does not support the proposal as it has not achieved previous DRP comments in terms of Built Form & Scale, Density, Landscape and Amenity.

SCAT

Council's Community Development officer raised concerns on the Bin storage room location and the long accessway that could be an area of potential entrapment.

Traffic Engineer

Council's Traffic Engineer has reviewed the proposal and considered it satisfactory subject to conditions.

Environment Officer

Council's environment officer provided satisfactory referral comments on the information submitted with the latest revision subject to conditions.

Geotech

Council's Geotech officer has raised no concerns subject to conditions.

1.6.2 EXTERNAL CONSULTATION

DRP

The application was reviewed by Council's Design Review Panel (DRP) on 19 January 2021 and 4 August 2021. A copy of the DRP note from 4 August is provided at Attachment 7.

Council has considered the applicant's final proposed revised scheme and assessed the scheme against the previous DRP advice. It is considered the revised plans and information do not satisfactorily address the prior issues raised. The revised scheme is shown in detail on the plans provided at Attachment 1.

An assessment of the application against the Apartment Design Guide (*ADG*) is provided at Attachment 3. The revised scheme was also reviewed by Council's Design Expert and unsatisfactory referral advice was received.

NRAR

Initial referral advice was unsatisfactory, however, General Terms of Approval for works in support of the final amended submission have been issued.

Endeavour Energy

Endeavour Energy raised no objection to the proposal assuming the requirement of a padmount substation.

2 OTHER LEGISLATION

2.1 NSW BIODIVERSITY CONSERVATION ACT 2016

Section 1.7 of the *Environmental Planning and Assessment Act 1979* (EP&A Act) provides that Act has effect subject to the provisions of Part 7 of the *Biodiversity Conservation Act 2016* (BC Act).

Part 7 of the BC Act relates to Biodiversity assessment and approvals under the EP&A Act where it contains additional requirements with respect to assessments, consents and approvals under this Act.

The site is not identified as being of high biodiversity value on the Biodiversity Values Map.

Council's Environmental Officer has concluded that the proposed development including tree removals is not expected to impact threatened species or ecological communities, or their habitats.

The development would therefore not be considered to result in adverse impacts on biodiversity and is consistent with the provisions of the *Biodiversity Conservation Act 2016*.

3 ENVIRONMENTAL PLANNING AND ASSESSMENT ACT 1979 – 4.15 EVALUATION

3.1 SECTION 4.15(1)(A)(1) ANY ENVIRONMENTAL PLANNING INSTRUMENT

3.1.1 STATE ENVIRONMENTAL PLANNING POLICY NO. 55 – REMEDIATION OF LAND

7 Contamination and remediation to be considered in determining development application

(1) A consent authority must not consent to the carrying out of any development on land unless:

(a) it has considered whether the land is contaminated, and

(b) if the land is contaminated, it is satisfied that the land is suitable in its contaminated state (or will be suitable, after remediation) for the purpose for which the development is proposed to be carried out, and

(c) if the land requires remediation to be made suitable for the purpose for which the development is proposed to be carried out, it is satisfied that the land will be remediated before the land is used for that purpose.

(2) Before determining an application for consent to carry out development that would involve a change of use on any of the land specified in subclause (4), the consent authority must consider a report specifying the findings of a preliminary investigation of the land concerned carried out in accordance with the contaminated land planning guidelines.

(3) The applicant for development consent must carry out the investigation required by subclause (2) and must provide a report on it to the consent authority. The consent authority may require the applicant to carry out, and provide a report on, a detailed investigation (as referred to in the contaminated land planning guidelines) if it considers that the findings of the preliminary investigation warrant such an investigation.

(4) The land concerned is:

(a) land that is within an investigation area,

(b) land on which development for a purpose referred to in Table 1 to the contaminated land planning guidelines is being, or is known to have been, carried out,

(c) to the extent to which it is proposed to carry out development on it for residential, educational, recreational or child care purposes, or for the purposes of a hospital—land:

(i) in relation to which there is no knowledge (or incomplete knowledge) as to whether development for a purpose referred to in Table 1 to the contaminated land planning guidelines has been carried out, and

(ii) on which it would have been lawful to carry out such development during any period in respect of which there is no knowledge (or incomplete knowledge).

The application has been reviewed by Council's Environmental Officer in this regard. A desktop audit of previous land uses does not indicate any historic use that would contribute to the contamination of the site.

A Detailed Site Investigation report (Reditus, 30 August 2021) has been submitted indicating the site is suitable for the proposed development (residential units with basement carparking and access to soils)**.**

Council's Environment Officer considers that the report is satisfactory and no further contaminated land site assessment or remediation is considered as required beyond a potential draft condition for the development of an unexpected finds protocol. As such cl 7 is considered as satisfied.

3.1.2 STATE ENVIRONMENTAL PLANNING POLICY NO 65—DESIGN QUALITY OF RESIDENTIAL APARTMENT DEVELOPMENT

SEPP 65 aims to deliver a better living environment for the residents within residential apartment developments and enhance the streetscapes and neighbourhoods in which these buildings are located.

The development meets the definition of a 'residential flat building' because it is 3 storeys and comprises more than 4 dwellings. As such, the provisions of SEPP 65 apply. The proposal has been considered by Council's DRP in accordance with Clause 28 and Schedule 1.

A Design Statement has been submitted by the applicant's Architect addressing the requirements of SEPP 65 as provided at Attachment 2.

Schedule 1 of SEPP 65 sets out the design quality principles for residential apartment development.

These must be considered in the assessment of the proposal pursuant to clause 30(2)(a) of the Policy and are discussed below.

Principle 1: Context and neighbourhood character

The built environment in the locality is characterised by a mixture of building types of dwellings, multi dwellings and commercial premises undergoing transition consistent with the height restrictions.

The site is flood prone located along the banks of Towradgi Creek. Residential Flat Building is permissible on the lot. However the non-compliance in Height to address the flood issue will cause obvious impact on the streetscape and skyline when compared to the surrounding developments.

The DRP also raised concern in relation to the Building Height and considered a two-storey development more suitable for the site.

Principle 2: Built form and scale

The built form is not consistent with some of the key elements of height and setbacks. This has resulted in a building which is well above the LEP height and inconsistent with neighbouring development of one and two storeys. No articulated design response to the proposal's three storey context has been demonstrated which was raised by the DRP and the built form is not considered responsive to it's context.

Principle 3: Density

The density of the development complies with the maximum FSR permitted for the land. However, the gross floor area constitutes residential floor area within the building with non-complying building height for the R2 zone.

Principle 4: Sustainability

A BASIX Certificate has been provided indicating minimum requirements are met. However, concerns raised with regard to water sensitive design under the ADG which are considered not to have been satisfactorily met.

Principle 5: Landscape

The proposal does not satisfactorily meet suitable landscaped areas and communal open space for appropriate amenity to the occupants.

Principle 6: Amenity

Concern is raised on the accessibility to the front door and solar access to the south-western unit, location and accessibility with the bin storage area.

Principle 7: Safety

The open plenum is still unresolved and poses safety issues in regard to its open nature.

Principle 8: Housing diversity and social interaction

A total of 14 units are proposed comprising 3x1b/r units, 8 x 2b/r units and 3x3b/r units.

Principle 9: Aesthetics

The new proposal appears not to have responded to previous DRP comments.

3.1.3 STATE ENVIRONMENTAL PLANNING POLICY (BUILDING SUSTAINABILITY INDEX: BASIX) 2004

The proposal is BASIX affected development to which this policy applies. In accordance with Schedule 1, Part 1, 2A of the Environmental Planning and Assessment Regulation 2000, a BASIX Certificate has been submitted in support of the application demonstrating that the proposed scheme achieves the BASIX targets.

The BASIX certificate was issued no earlier than 3 months before the date on which the development application was lodged.

3.1.4 STATE ENVIRONMENTAL PLANNING POLICY (COASTAL MANAGEMENT) 2018

3. Aims of Policy

The aim of this Policy is to promote an integrated and co-ordinated approach to land use planning in the coastal zone in a manner consistent with the objects of the Coastal Management Act 2016, including the management objectives for each coastal management area, by:

(a) managing development in the coastal zone and protecting the environmental assets of the coast, and

(b) establishing a framework for land use planning to guide decision-making in the coastal zone, and

(c) mapping the 4 coastal management areas that comprise the NSW coastal zone for the purpose of the definitions in the Coastal Management Act 2016.

Division 1 Coastal wetlands and littoral rainforests area

10 Development on certain land within coastal wetlands and littoral rainforests area

Comment: The subject site is not identified within the SEPP maps as containing coastal wetlands or littoral rainforest areas. As such, this part does not apply to the subject development.

11 Development on land in proximity to coastal wetlands or littoral rainforest

(1) Development consent must not be granted to development on land identified as "proximity area for coastal wetlands" or "proximity area for littoral rainforest" on the Coastal Wetlands and Littoral Rainforests Area Map unless the consent authority is satisfied that the proposed development will not significantly impact on—

(a) the biophysical, hydrological or ecological integrity of the adjacent coastal wetland or littoral rainforest, or

(b) the quantity and quality of surface and ground water flows to and from the adjacent coastal wetland or littoral rainforest.

(2) This clause does not apply to land that is identified as "coastal wetlands" or "littoral rainforest" on the Coastal Wetlands and Littoral Rainforests Area Map.

Comment:

The subject site is not located within the Coastal wetlands proximity area, therefore this clause does not applies to the proposal.

Division 2 Coastal vulnerability area

Comment: At the commencement of this Policy, no Coastal Vulnerability Area Map was adopted and therefore no coastal vulnerability area has been identified. As such, this part does not apply to the subject development.

Division 3 Coastal environment area

13 Development on land within the coastal environment area

(1) Development consent must not be granted to development on land that is within the coastal environment area unless the consent authority has considered whether the proposed development is likely to cause an adverse impact on the following:

(a) the integrity and resilience of the biophysical, hydrological (surface and groundwater) and ecological environment,

(b) coastal environmental values and natural coastal processes,

(c) the water quality of the marine estate (within the meaning of the Marine Estate Management Act 2014), in particular, the cumulative impacts of the proposed development on any of the sensitive coastal lakes identified in Schedule 1,

(d) marine vegetation, native vegetation and fauna and their habitats, undeveloped headlands and rock platforms,

(e) existing public open space and safe access to and along the foreshore, beach, headland or rock platform for members of the public, including persons with a disability,

(f) Aboriginal cultural heritage, practices and places,

(g) the use of the surf zone.

Comment: The site is partially mapped as Coastal Environment Area in the east of the site. There does not appear to be any encroachment into this mapped area by the proposed development.

The development is not expected to result in adverse impacts on the integrity and resilience of the ecological environment, the coastal environmental values, natural processes, water quality, marine vegetation, habitats or headlands or rock platforms, public open space and access to that public open space, aboriginal cultural heritage or the use of the surf zone.

(2) Development consent must not be granted to development on land to which this clause applies unless the consent authority is satisfied that:

(a) the development is designed, sited and will be managed to avoid an adverse impact referred to in subclause (1), or

(b) if that impact cannot be reasonably avoided—the development is designed, sited and will be managed to minimise that impact, or

(c) if that impact cannot be minimised—the development will be managed to mitigate that impact.

Comment: The proposal generally is sited to avoid potential impacts to the coastal environment.

(3) This clause does not apply to land within the Foreshores and Waterways Area within the meaning of Sydney Regional Environmental Plan (Sydney Harbour Catchment) 2005.

Comment: The subject site is not located within the Foreshores and Waterways Area.

Division 4 Coastal use area

14 Development on land within the coastal use area

(1) Development consent must not be granted to development on land that is within the coastal use area unless the consent authority:

(a) has considered whether the proposed development is likely to cause an adverse impact on the following:

(i) existing, safe access to and along the foreshore, beach, headland or rock platform for members of the public, including persons with a disability,

(ii) overshadowing, wind funnelling and the loss of views from public places to foreshores,

(iii) the visual amenity and scenic qualities of the coast, including coastal headlands,

(iv) Aboriginal cultural heritage, practices and places,

(v) cultural and built environment heritage, and

(b) is satisfied that:

(i) the development is designed, sited and will be managed to avoid an adverse impact referred to in paragraph (a), or

(ii) if that impact cannot be reasonably avoided—the development is designed, sited and will be managed to minimise that impact, or

(iii) if that impact cannot be minimised—the development will be managed to mitigate that impact, and

(c) has taken into account the surrounding coastal and built environment, and the bulk, scale and size of the proposed development.

Comment: The proposed development is not likely to cause an adverse impact on access to the foreshore area, any overshadowing of the foreshore area, impacts on the visual amenity of the coast, Aboriginal cultural heritage or cultural or built environmental heritage.

(2) This clause does not apply to land within the Foreshores and Waterways Area within the meaning of Sydney Regional Environmental Plan (Sydney Harbour Catchment) 2005.

Comment: The subject site is not located within the Foreshores and Waterways Area.

Division 5 General

15 Development in coastal zone generally—development not to increase risk of coastal hazards

Development consent must not be granted to development on land within the coastal zone unless the consent authority is satisfied that the proposed development is not likely to cause increased risk of coastal hazards on that land or other land.

Comment: Council is satisfied that the proposed development is not likely to cause increased risk of coastal hazards on the subject land or any other land.

16 Development in coastal zone generally—coastal management programs to be considered

Development consent must not be granted to development on land within the coastal zone unless the consent authority has taken into consideration the relevant provisions of any certified coastal management program that applies to the land.

Comment: On 30 October 2017, Council endorsed the final draft of the Wollongong Coastal Zone Management Plan for resubmission to the NSW Minister for Environment for certification. The draft Plan was certified on 20 December 2017. This Plan identifies that the site is affected by Geotechnical risk, and the site has been subsequently mapped according and considered as discussed throughout this report. There are no other provisions of the Plan which apply to the subject land.

18 Hierarchy of development controls if overlapping

If a single parcel of land is identified by this Policy as being within more than one coastal management area and the development controls of those coastal management areas are inconsistent, the development controls of the highest of the following coastal management areas (set out highest to lowest) prevail to the extent of the inconsistency:

(a) the coastal wetlands and littoral rainforests area,

(b) the coastal vulnerability area,

(c) the coastal environment area,

(d) the coastal use area.

Comment: The subject site is located within the Coastal Environmental areas. There is no inconsistency between the controls as discussed above.

<u>NSW Coastal Management Act 2016 and Wollongong Coastal Zone Management Plan</u>
A review of Council's associated CZMP coastal hazard mapping extents identifies that the subject site is impacted by geotechnical risk.

Minimal adverse impact on the coastal environment is anticipated as a result of the proposed development.

Minimal adverse impacts on the development are expected as a result of coastal processes

The proposal is therefore considered satisfactory with regard to the aims outlined in clause 3 of the Plan and the matters outlined for consideration.

3.1.5 STATE ENVIRONMENTAL PLANNING POLICY (KOALA HABITAT PROTECTION) 2020

The City of Wollongong is identified within Schedule 1 as land to which this Policy applies. Wollongong is located within the South Coast Koala Management Area.

The Koala SEPP only applies to development applications considered by councils on land over 1 hectare in size or on land if it is included in an approved council Koala Plan of Management. The lot size is less than one hectare and Council does not have an approved Koala Plan of Management for the land at the time of preparing this report. As such, no further consideration of this SEPP is required.

3.1.6 WOLLONGONG LOCAL ENVIRONMENTAL PLAN 2009

Clause 1.4 Definitions

residential flat building *means a building containing 3 or more dwellings, but does not include an attached dwelling or multi dwelling housing*.

Part 2 Permitted or prohibited development

Clause 2.2 – zoning of land to which Plan applies

The zoning map identifies the land as being zoned R2 Low Density Residential

Clause 2.3 – Zone objectives and land use table

The objectives of the zone are as follows:

• *To provide for the housing needs of the community within a low density residential environment.*

• *To enable other land uses that provide facilities or services to meet the day to day needs of residents.*

The proposal is considered to provide housing needs within the zone.

The land use table permits the following uses in the zone.

*Attached dwellings; Bed and breakfast accommodation; Boarding houses; Boat launching ramps; Child care centres; Community facilities; Dual occupancies; Dwelling houses; Environmental facilities; Exhibition homes; Exhibition villages; Group homes; Health consulting rooms; Home-based child care; Hospitals; Hostels; Information and education facilities; Jetties; Multi dwelling housing**;** Neighbourhood shops; Places of public worship; Recreation areas; Recreation facilities (indoor); Recreation facilities (outdoor);* ***Residential flat buildings****; Respite day care centres; Roads; Semi-detached dwellings; Seniors housing; Shop top housing; Signage; Veterinary hospitals*

The proposal is categorised as a residential flat building as described above and is permissible in the zone with development consent.

Clause 2.7 Demolition requires development consent

The application proposes demolition of existing dwellings.

Part 4 Principal development standards

Clause 4.3 Height of buildings

The proposed building height of maximum 10.345m exceeds the maximum of 9 permitted for the site. The applicant has submitted a written request to make an exception to the development standard. The request is discussed in detail below at Clause 4.6 and a copy of the applicant's justification statement is provided at Attachment 4.

Clause 4.4 Floor space ratio

Maximum FSR permitted for the zone:	0.5:1
Site area:	2940 m²
GFA of Units:	
Ground	472 m²
Level 1	470.25 m²
Level 2	335.18 m²
Total GFA	1278 m²
FSR:	1278 m²/2940 m² = 0.43:1

Clause 4.6 Exceptions to development standards

Clause 4.6 provides that development consent may, subject to this clause, be granted for development even though the development would contravene a development standard imposed by this or any other environmental planning instrument, where certain matters are met. In this instance, a departure is sought in respect of Clause 4.3 Height of Buildings

The below table outlines Council's assessment:

WLEP 2009 clause 4.6 proposed development departure assessment	
Development departure	Clause 4.3 – Height of Buildings. Clause 4.3(2) Requires that *the height of a building on any land is not to exceed the maximum height shown for the land on the Height of Buildings Map.* The Height of Building Map provides for a maximum building height of 9m for the site. The applicant proposes a maximum height of the building varying from 9.69m (front) to 10.345m (rear) which is a non- compliance of maximum 1.345m with a departure of 14.9% to the development standard.
Is the planning control a development standard	Yes
4.6 (3) Written request submitted by applicant contains a justification:	
that compliance with the development standard is unreasonable or unnecessary in the circumstances of the case, and	See applicant's 4.6 submission prepared by Think Planners at Attachment 4. The applicant's submission has outlined a number of reasons as to why the applicant believes that compliance with the development standard is unreasonable or unnecessary as provided and summarised below: ▪ The proposal satisfies the objectives of the R1 General Residential zone and the objectives of Clause 4.3 for following reasons. -The key reason for the height departure- in conjunction with the flooding affectation that necessitates the raised levels and the void in the slab. -The departure to the maximum building height is in part a result of the site being flood prone. The development is to provide elevated floor levels as a design response to comply with relevant flood level requirements, to provide appropriate freeboard levels. - The building footprint is regulated by the environmental site conditions with the flooding, trees, riparian and creek areas such that the building footprint has been compressed to enable suitable setbacks to these areas and is the rationale through the provision of the additional level on the site- noting the proposal is under the FSR control indicating the development density is suitable. - The site is a large site and the proposed building is well setback from the street and is compatible with the height of buildings in

	the immediate precinct. - The proposal does not result in unreasonable amenity impacts to adjoining properties in terms of privacy, overshadowing or loss of views given that the all shadows are cast within the site; - The proposal achieves an appropriate separation to adjoining properties and provides an appropriate landscaped corridor; - The proposal provides appropriate areas for landscaping around the perimeter of the site area and pervious surfaces to accommodate appropriate landscaping and also provide for on-site stormwater detention.
that there are sufficient environmental planning grounds to justify contravening the development standard.	See applicant's 4.6 submission at Attachment 4. In summary the applicant's identified environmental grounds include: The proposal is consistent with the R2 zoning and locality by providing appropriate setbacks and landscaping within a large site. The key reason for the height departure is in conjunction with the flooding affectation that necessitates the raised levels and the void in the slab. -The variation to maximum building height is in part a result of the site being flood prone. -The variation facilitates suitable separation to the creek and riparian areas through a compression of the footprint and provision of an additional level on the building- hence the proposal is a more site responsive outcome owing to the additional height in the context of the sites configuration and constraints; -The variation also enables suitable restorative works to the riparian areas owing to the relocation of the building footprint to the upper level to enable a smaller total building footprint that enables the restorative works and retention of key trees.
4.6 (4) (a) Consent authority is satisfied that:	
the applicant's written request has adequately addressed the matters required to be demonstrated by subclause (3), and	The applicant's request is not considered to adequately address the matters required to be demonstrated by subclause (3). ***Compliance with the development standard is unreasonable or unnecessary.*** It is not considered that there are sufficient environmental planning grounds to justify contravening the standard. There are impacts associated with the non-compliance regarding Building Height. The non-complying part of the building will be distinguishable in the streetscape and adjoining developments. This non -compliance relates to part of the upper floor (Level 2) and not just within the roof periphery. ***There are sufficient environmental planning grounds***

	No, it is not considered that there are sufficient environmental planning grounds to justify contravening the standard. In particular the following is noted: • *Cause for variation* It is justified that the height above the permitted 9m maximum is caused due to the raised floor slab for the void to address flood issues. However the issue in relation to the flood affectation is not satisfactorily addressed for the development assessment as per Council's Stormwater engineer's review. The variation has no sufficient environmental grounds to be supported in this regard. The DRP initially raised concern that given the scale of the context and the impacts of flooding, the height of the proposal be restricted to two levels only plus roof. Given that compliance still cannot be achieved, Council is of the view that the proposal remains an overdevelopment of the site and a reduced number of storeys is required to achieve compliance.
the proposed development will be in the public interest because it is consistent with the objectives of the particular standard and the objectives for development within the zone in which the development is proposed to be carried out, and	The applicant has failed to demonstrate that the proposed development would be consistent with the objectives of the height control standard (Clause 4.3(1)) which is summarised as follows: *(a) to establish the maximum height limit in which buildings can be designed and floor space can be achieved,* Compliance with the maximum 0.5:1 FSR is achieved. The applicant claims the variation to the standard allows for realisation of the allowable floor space at the site. However non-compliance in Height is due to the constraints on site limiting the building foot print area and overdevelopment on site with projected excessive yield with the development. *(b) to permit building heights that encourage high quality urban form,* The proposal has been considered by Council's DRP. The proposed scheme was revised twice during assessment to improve the urban form and architectural detail in response to DRP feedback which also resulted in one(1) unit being deleted from the original scheme. The height of the building had been further increased due to the previous non-compliant design in terms of flooding and floor to floor heights. This has resulted in a building which is well above the LEP maximum height and overdevelopment for the site and inconsistent with neighbouring development of one and two storeys. *(c) to ensure buildings and public areas continue to have views of the sky and receive exposure to sunlight*

	The proposal is considered to have impacts on the skyline compared to surrounding low density developments due to the non- complying building height. The applicant has failed to demonstrate that a functional Residential Flat Building development can be achieved without detrimentally impacting the surrounding properties in terms of flood impacts.
the concurrence of the Secretary has been obtained.	No. The application will be reported to the Wollongong Local Planning Panel for determination.

Part 5 Miscellaneous provisions

Clause 5.21 Flood Planning

The land is identified as being High Flood Risk Precinct due to the watercourse located within the site. Council's Development Engineer has assessed the application in this regard and raised concerns with respect to the flood management. The application submission lacks information to assess flood impacts on adjoining properties. The proposal is considered not to have demonstrated mitigation of detrimental increase in potential flood affectation of other development or properties.

The proposal does not satisfy the objectives of this clause.

Part 7 Local provisions – general

Clause 7.1 Public utility infrastructure

The development site is already serviced by electricity, water and sewage services which could be augmented to service the development.

Clause 7.2 Natural Resource Sensitive Lands - Biodiversity

The site is partially mapped under this clause in the north east portion of the site. Whilst the proposed development will slightly encroach into the mapped area Council's Environment officer has provided comments that the proposal is considered acceptable as all significant trees within this area are proposed to be retained and the riparian corridor restored.

Clause 7.6 Earthworks

The proposal comprises earthworks related to the construction of the buildings and related infrastructure and landscaping.

Clause 7.7 Foreshore building line

The foreshore building line runs through the site in relation to Towradgi Creek (see map below). The southern part of the proposed development crosses into the foreshore restricted building area to a significant degree. Though areas of concern for the riparian area are addressed, this encroachment is not considered acceptable as the proposal's effect on drainage patterns associated with the flood risk is not satisfactorily addressed.

Clause 7.14 Minimum site width

The proposed site has a width of approximately 32m along the street front that widens to the rear boundary, which complies with the minimum site width of 24m set by Clause 7.14 for Residential Flat Buildings.

3.2 SECTION 4.15(1)(A)(II) ANY PROPOSED INSTRUMENT

3.2.1 Draft Remediation of Land SEPP

The Explanation of Intended Effect for the Remediation of Land SEPP and the Managing Land Contamination guidelines were exhibited between 25 January 2018 and 13 April 2018.

The proposed SEPP: provides a state-wide planning framework for the remediation of land requires consent authorities to consider the potential for land to be contaminated when determining development applications clearly lists the remediation works that require development consent introduces certification and operational requirements for remediation works that can be undertaken without development consent.

Engagement is now closed and feedback is being considered by the Department.
It is considered the draft SEPP is of limited relevance in relation to this application.

3.2.2 Draft Environment SEPP

The Explanation of Intended Effect for the Environment SEPP was on exhibition from 31 October 2017 until the 31 January 2018.

This consolidated SEPP proposes to simplify the planning rules for a number of water catchments, waterways, urban bushland, and Willandra Lakes World Heritage Property.

Changes proposed include consolidating the following seven existing SEPPs:

- State Environmental Planning Policy No. 19 – Bushland in Urban Areas
- State Environmental Planning Policy (Sydney Drinking Water Catchment) 2011
- State Environmental Planning Policy No. 50 – Canal Estate Development
- Greater Metropolitan Regional Environmental Plan No. 2 – Georges River Catchment
- Sydney Regional Environmental Plan No. 20 – Hawkesbury-Nepean River (No.2-1997)
- Sydney Regional Environmental Plan (Sydney Harbour Catchment) 2005

- Willandra Lakes Regional Environmental Plan No. 1 – World Heritage Property.

Changes are also proposed to the Standard Instrument – Principal Local Environmental Plan. Some provisions of the existing policies will be transferred to new Section 9.1 Local Planning Directions where appropriate.

Engagement is now closed, and feedback is being considered by the Department.

It is considered the draft SEPP is of limited relevance in relation to this application.

3.2.3 Draft Design and Place SEPP

Public exhibition of the Design and Place SEPP Explanation of Intended Effect closed in April 2021.

The Design and Place SEPP will establish principles for the design and assessment of places in urban and regional NSW: PRINCIPLE 1. Design places with beauty and character that people feel proud to belong to PRINCIPLE 2. Design inviting public spaces to support engaged communities PRINCIPLE 3. Design productive and connected places to enable thriving communities PRINCIPLE 4. Design sustainable and greener places for the wellbeing of people and the environment PRINCIPLE 5. Design resilient and diverse places for enduring communities

The draft Design and Place SEPP will go on public exhibition later in 2021 to provide more opportunities for feedback. Supporting guidance and tools, drafts of which will also go on exhibition with the draft SEPP. These guides include revisions to the Apartment Design Guide and improvements to the Building Sustainability Index (BASIX), as well as the proposed Urban Design Guide, and Design Review Guide. The Department is currently conducting workshops with Council's around the State.

It is considered the draft SEPP is of limited relevance in relation to this application

3.2.4 Draft Housing SEPP

Public exhibition of the Housing SEPP Explanation of Intended Effect was exhibited between 29 July and 9 September 2020. The NSW Housing Strategy: Housing 2041 is the NSW Government's plan to meet the State's housing needs over the next 20 years. The Housing SEPP will support delivery on this strategy by driving the development of affordable and diverse housing

The new Housing SEPP will:

- consolidate five existing housing-related SEPPs:
- State Environmental Planning Policy (Affordable Rental Housing) 2009 (ARHSEPP);
- State Environmental Planning Policy (Housing for Seniors and People with a Disability) 2004 (Seniors SEPP);
- State Environmental Planning Policy No 70 – Affordable Housing (Revised Schemes) (SEPP 70);
- State Environmental Planning Policy No 21—Caravan Parks; and
- State Environmental Planning Policy No 36—Manufactured Home Estates.
- include the recently made provisions for short term rental accommodation and build-to-rent housing;
- include the recently updated social housing provisions;
- introduce provisions for co-living housing, a form of housing that provides small private rooms (which may or may not include private kitchen and bathroom facilities), offset by access to managed communal spaces;
- incorporate amendments to boarding house and seniors housing provisions
- amend some local environmental plans in relation to secondary dwellings in rural zones, and the permissibility of boarding houses in R2 zones.

The Housing SEPP is intended to be finalised in October 2021.

It is considered the draft SEPP is of limited relevance in relation to this application.

3.3 SECTION 4.15(1)(A)(III) ANY DEVELOPMENT CONTROL PLAN

3.3.1 WOLLONGONG DEVELOPMENT CONTROL PLAN 2009

The development has been assessed against the relevant chapters of WDCP 2009. Compliance tables are provided at Attachment 5. The proposal does involve variations to the front and side setbacks against the development controls. Statements justifying compliance have been provided by the applicant within the SoEE (Attachment 6) These variations have been considered and not supported in this instance as discussed within Attachment 5.

3.3.2 WOLLONGONG CITY WIDE DEVELOPMENT CONTRIBUTIONS PLAN 2019

Development contributions are applicable; however the DA is recommended for refusal.

3.4 SECTION 4.15(1)(A) (IIIA) ANY PLANNING AGREEMENT THAT HAS BEEN ENTERED INTO UNDER SECTION 7.4, OR ANY DRAFT PLANNING AGREEMENT THAT A DEVELOPER HAS OFFERED TO ENTER INTO UNDER SECTION 7.4

There are no planning agreements entered into or any draft agreement offered to enter into under S7.4 which affect the development.

3.5 SECTION 4.15(A)(IV) THE REGULATIONS (TO THE EXTENT THAT THEY PRESCRIBE MATTERS FOR THE PURPOSES OF THIS PARAGRAPH)

92 What additional matters must a consent authority take into consideration in determining a development application?

This could be subject to conditions.

93 Fire safety and other considerations

Not applicable.

94 Consent authority may require buildings to be upgraded

Not applicable.

3.6 SECTION 4.15(1)(B) THE LIKELY IMPACTS OF DEVELOPMENT

Context and Setting: The proposed development is not considered to conform to the context or setting for the existing residential precinct as relates to bulk / scale and unresolved flood issues.
Access, Transport and Traffic: The development provides for the required number of car parking spaces and manoeuvring of waste vehicles on site. Council's Traffic officer has considered the development with regard to impacts on the wider traffic network and raised no objections to this proposal.
Public Domain: The proposal will likely impact the public domain in that the development and the associated works could have adverse impacts on the neighbouring properties if the flood related matters are not satisfactorily addressed. Separately the maximum building height departure, bulk and scale are considered out of context in the locality
Utilities: The proposal is not expected to have negative impact on the utilities.

Other land resources: The proposal is not considered to contribute to the orderly development of the site and is therefore envisaged to impact upon adjoining land resources.
Water: The site is presently serviced by Sydney Water. The proposal is not envisaged to have unreasonable water consumption.
Soils: The proposal is not expected to have negative impact on soils.
Air and Microclimate: The proposal is not expected to have negative impact on air or microclimate.
Flora and Fauna: Trees are proposed to be removed on site. Council's Landscape Officer does not support the proposal as submitted due to possible impacts on trees and tree protection zones.
Waste: No concerns related to waste management is expected. Energy: The proposal is not envisaged to have unreasonable energy consumption.
Natural hazards: Unresloved flooding issues associated with the proposal are envisaged to have the potential to significantly affect the site and adjoining properties.
Technological hazards: There are no technological hazards affecting the site that would prevent the proposal.
Safety, Security and Crime Prevention: The proposal is expected to have possible safety issues due to the open plenum and unsafe access and long corridor leading to the Bin storage area.
Social Impact: The proposal may have social impact in principle due to the flood impacts on neighbouring properties.
Site Design and Internal Design: The application requests a departure to Council's development standard in relation to maximum Building Height and variations to development controls for side and front setbacks which are not supported.
Cumulative Impacts: The proposal may be expected to have negative cumulative impacts by way of bulk and scale and flooding issues in the locality.

3.7 SECTION 4.15(1)(C) THE SUITABILITY OF THE SITE FOR THE DEVELOPMENT

Does the proposal fit in the locality?

The proposal is not considered appropriate with regard to the site and is expected to have negative impacts on the amenity of the locality or adjoining developments.

Are the site attributes conducive to development?

The site could accommodate a new development however more consideration is required to be given to the built form design and site constraints. The current proposal is not considered satisfactory in this regard

3.8 SECTION 4.15(1)(D) ANY SUBMISSIONS MADE IN ACCORDANCE WITH THIS ACT OR THE REGULATIONS

The submissions made have been addressed in Section 1.5.

3.9 SECTION 4.15(1)(E) THE PUBLIC INTEREST

It is considered the proposal is inappropriate with consideration to the zoning and the character of the area and is therefore not considered to be in the public interest.

4 CONCLUSION

This application has been assessed as unsatisfactory having regard to Section S4.15(1) of the Environmental Planning and Assessment Act 1979, the provisions of Wollongong Local Environmental Plan 2009 and all relevant Council's DCPs. Codes and Policies.

The proposal includes non-compliant ADG standards and controls related to the side setback and communal open space. A Clause 4.6 departure to WLEP 2009 Building Height request is not supported, nor are the variation requests to WDCP2009 for front and side setbacks for the reasons identified in the report.

The application was referred to Council's Design Review Panel on two occasions and the final revised plans do not satisfactorily address all matters raised. Internal and external referral comments along with submissions received have been considered in the assessment.

It is considered that the proposed development will result in unacceptable impacts and is therefore not in the public interest.

5 RECOMMENDATION

Having regard to the above information, **DA-2020/1342** is considered to be unsatisfactory and is recommended for **refusal** for the following reasons:

a Pursuant to the provisions of Section 4.15 (1)(a)(i) of the Environmental Planning and Assessment Act, 1979, the proposal fails to demonstrate consistency with Wollongong Local Environmental Plan 2009:

- Clause 1.2 Aims of the Plan – (2)(c) and (2)(g)
- Clause 1.9 Application of SEPPs
- Clause 4.3 Height of buildings
- Clause 5.21 Flood Planning
- Clause 7.7 Foreshore building line

b Pursuant to the provisions of Section 4.15 (1)(a)(i) of the Environmental Planning and Assessment Act, 1979, the proposal fails to demonstrate consistency with SEPP 65 in that the development fails to meet the Design Quality Principles and the Apartment Design Guide.

c Pursuant to the provisions of Section 4.15(1)(a)(iii) of the Environmental Planning and Assessment Act 1979, the proposal fails to demonstrate consistency with the provisions of Wollongong Development Control Plan 2009,

- Chapter B1: Residential Development
- Chapter E02: Crime Prevention Through Environmental Design

- Chapter E13: Floodplain Management
- Chapter E17: Preservation and Management of Trees and Vegetation;

d Pursuant to the provisions of Section 4.15 (1)(b) of the Environmental Planning and Assessment Act, 1979, the proposal fails to demonstrate that the likely impacts will not be adverse on the natural and built environments due to the excessive bulk and scale , vegetation removal and flood affectation on site.

e Pursuant to the provisions of Section 4.15 (1)(c) of the Environmental Planning and Assessment Act, 1979, the proposal fails to demonstrate the site is suitable for the development.

f Pursuant to the provisions of Section 4.15 (1) (d) and (e) of the Environmental Planning and Assessment Act, 1979, it is considered that with submissions received and in the circumstances of the case, approval of the development would not be in the public interest.

6 ATTACHMENTS

1.	Architectural and other Plans
2.	Applicant's SEPP 65 Design Report and Design Verification Statement
3.	Apartment Design Guide Assessment
4.	Applicant's Clause 4.6 WLEP2009 Justification Statement
5.	Compliance table for Wollongong Development Control Plan 2009
6.	Applicant's Variation Request Statements to WDCP2009
7.	DRP Notes on 4 August 2021

404 PRINCES HIGHWAY - CORRIMAL

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NOTES :

DATE	DRAWING DESCRIPTION	ISSUE
06/09/21	DEFERRAL LETTER	C

Drawing Title: **SITE PLAN**

Client: Auswide

Council: Wollongong City Council

Project: Demolition & construction of a Four (4) Storey RFB development containing 14 units over basement parking

Designed + Drawn: A.W. / P.R / M.T

Issue/Stage: **DA - ISSUE C**

Paper/Scale: A2/1:200

Date: 6/09/2021

Job #: **28730**

Dwg #: **0008**

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NOTES :

DATE	DRAWING DESCRIPTION	ISSUE
06/09/21	DEFERRAL LETTER	C

Drawing Title: **BASEMENT PLAN**

Council: Wollongong City Council

Designed + Drawn: A.W. / P.R / M.T

Issue/Stage: **DA - ISSUE C**

Project: Demolition & construction of a Four (4) Storey RFB development containing 14 units over basement parking

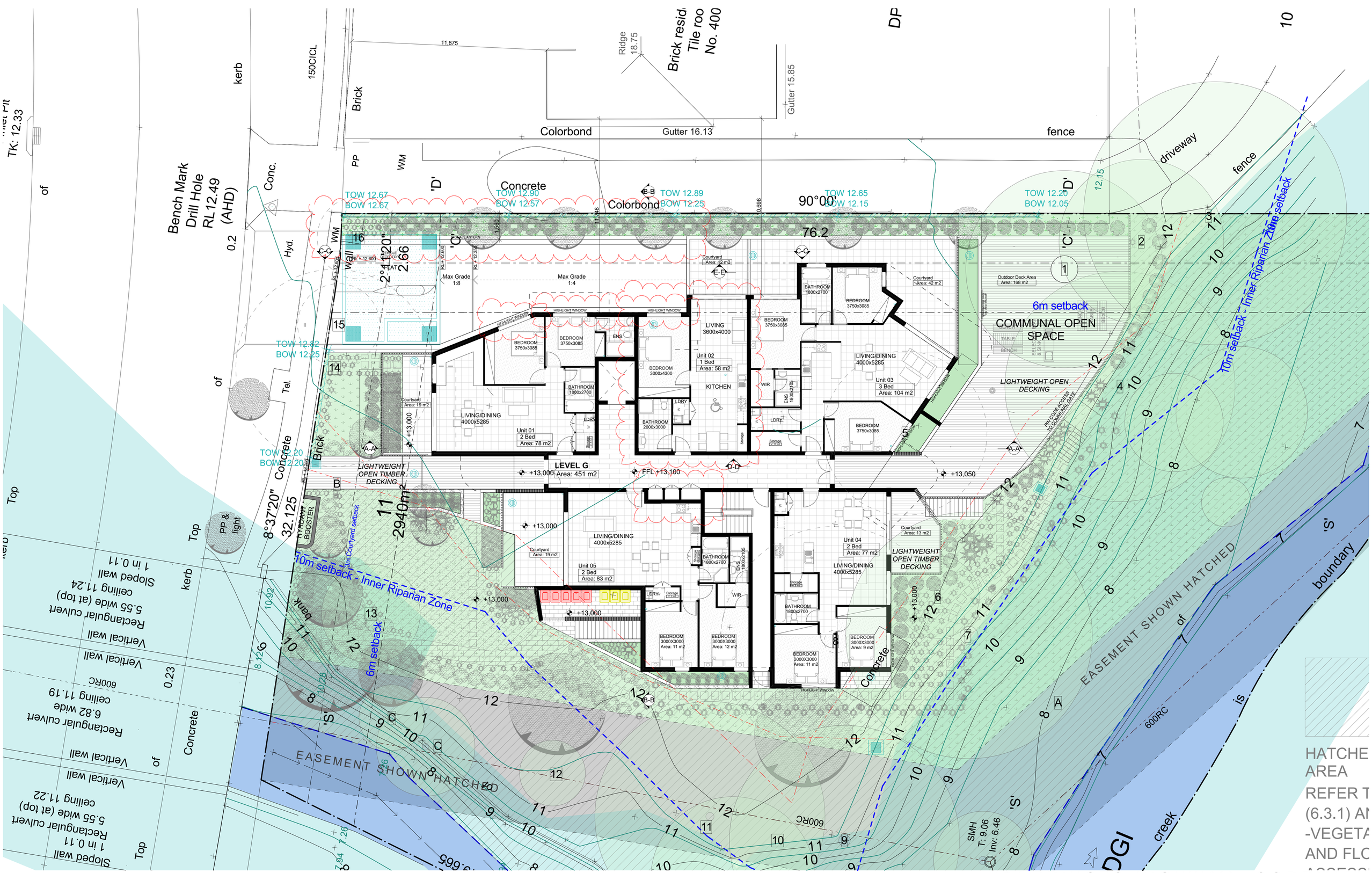
Paper/Scale: A2/1:100

Date: 6/09/2021

Client: Auswide

Job #: **28730**

Dwg #: **1001**



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NOTES :

DATE	DRAWING DESCRIPTION	ISSUE
06/09/21	DEFERRAL LETTER	C

Drawing Title: **GROUND FLOOR PLAN**

Client: Auswide

Council: Wollongong City Council

Project: Demolition & construction of a Four (4) Storey RFB development containing 14 units over basement parking

Designed + Drawn: A.W. / P.R / M.T

Issue/Stage: **DA - ISSUE C**

Paper/Scale: A2/1:100

Date: 6/09/2021

Job #: **28730**

Dwg #: **1002**

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NOTES :

ISSUE	DRAWING DESCRIPTION	DATE
C	DEFERRAL LETTER	06/09/21

Drawing Title: **LEVEL 1 FLOOR PLAN**
Client: Auswide
Council: Wollongong City Council
Project: Demolition & construction of a Four (4) Storey RFB development containing 14 units over basement parking
Designed + Drawn: A.W. / P.R / M.T
Issue/Stage: **DA - ISSUE C**
Paper/Scale: A2/1:100
Date: 6/09/2021
Job #: **28730**
Dwg #: **1003**

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NOTES :

DATE	DRAWING DESCRIPTION	ISSUE
06/09/21	DEFERRAL LETTER	C

Drawing Title: **LEVEL 2 FLOOR PLAN**

Client: Auswide

Council: Wollongong City Council

Project: Demolition & construction of a Four (4) Storey RFB development containing 14 units over basement parking

Designed + Drawn: A.W. / P.R / M.T

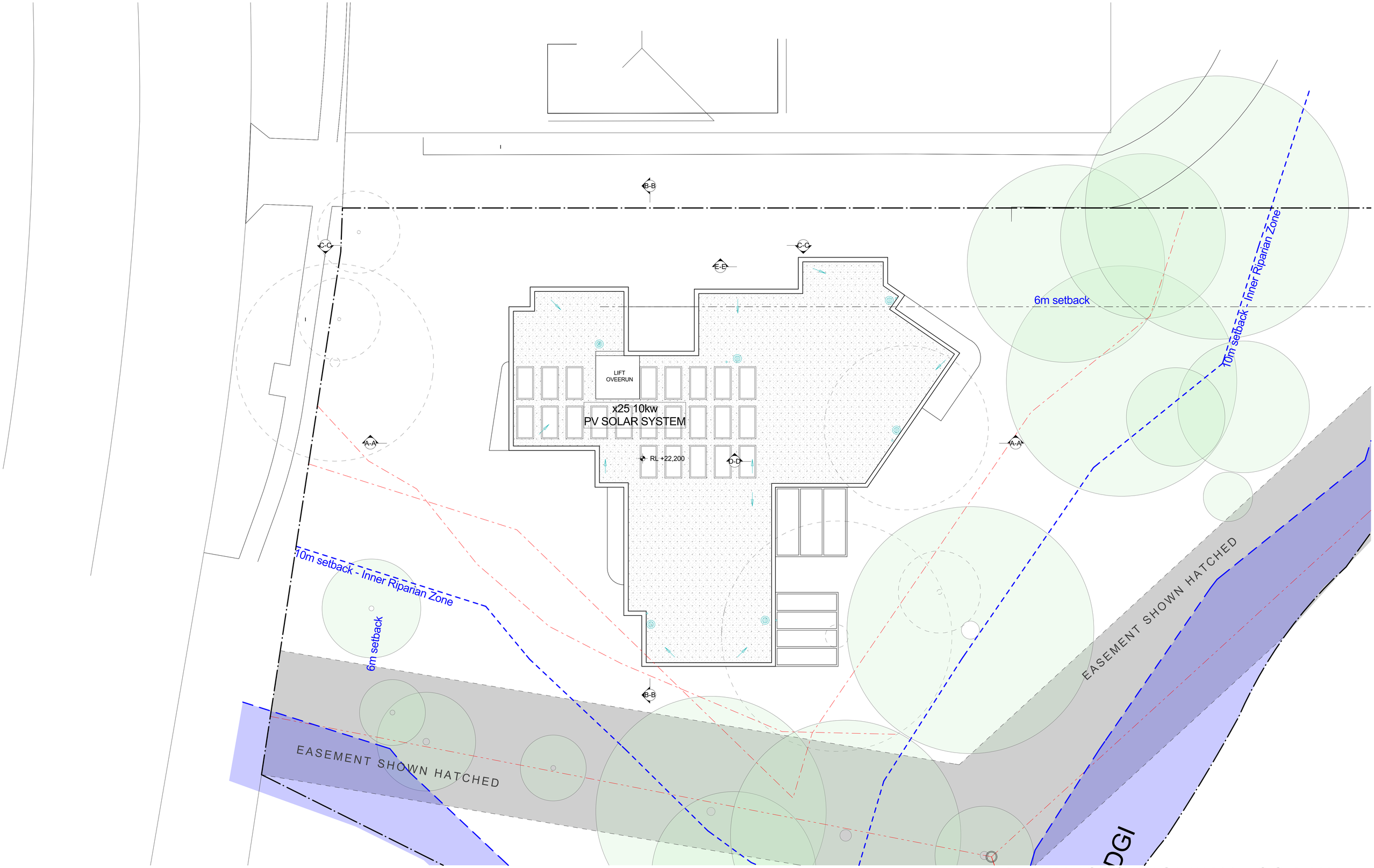
Issue/Stage: **DA - ISSUE C**

Paper/Scale: A2/1:100

Date: 6/09/2021

Job #: **28730**

Dwg #: **1004**



404 PRINCES HIGHWAY - CORRIMAL

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NOTES :

DATE	DRAWING DESCRIPTION	ISSUE
06/09/21	DEFERRAL LETTER	C

Drawing Title: **ROOF PLAN**

Council: Wollongong City Council

Project: Demolition & construction of a Four (4) Storey RFB development containing 14 units over basement parking

Client: Auswide

Designed + Drawn: A.W. / P.R / M.T

Issue/Stage: **DA - ISSUE C**

Paper/Scale: A2/1:100

Date: 6/09/2021

Job #: **28730**

Dwg #: **1005**

NORTH ELEVATION

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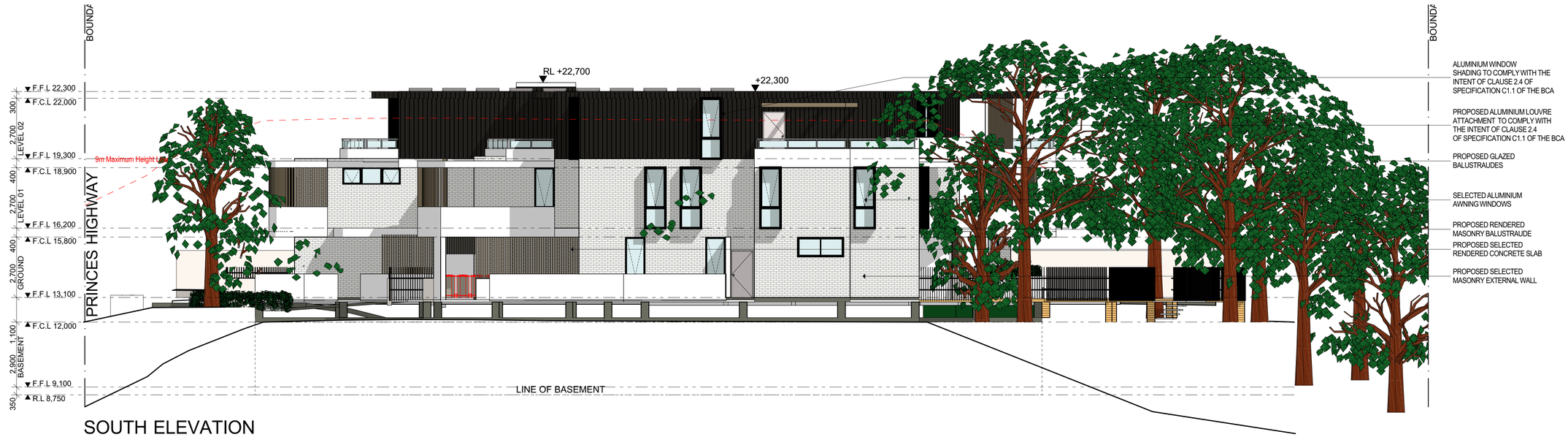

SOUTH ELEVATION

scale 1:100

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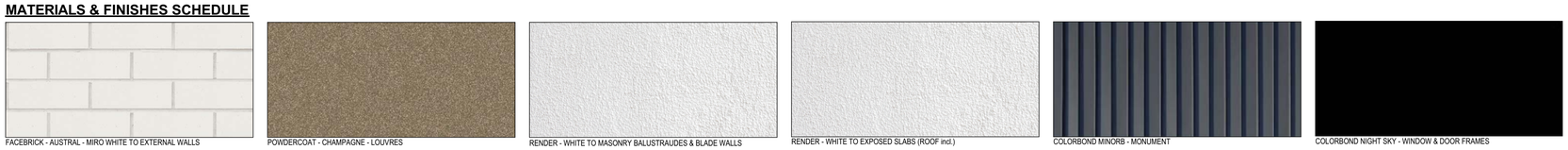
MATERIALS & FINISHES SCHEDULE



FACEBRICK - AUSTRAL - MIRO WHITE TO EXTERNAL WALLS

POWDERCOAT - CHAMPAGNE - LOUVRES

RENDER - WHITE TO MASONRY BALUSTRAUDES & BLADE WALLS

RENDER - WHITE TO EXPOSED SLABS (ROOF ind.)

COLORBOND MINORB - MONUMENT

COLORBOND NIGHT SKY - WINDOW & DOOR FRAMES

404 PRINCES HIGHWAY - CORRIMAL

NORTH POINT

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NOTES :

DATE	DRAWING DESCRIPTION	ISSUE
06/09/21	DEFERRAL LETTER	C

Drawing Title: **NORTH & SOUTH ELEVATIONS**

Client: Auswide

Council: Wollongong City Council

Project: Demolition & construction of a Four (4) Storey RFB development containing 14 units over basement parking

Designed + Drawn: A.W. / P.R / M.T

Issue/Stage: **DA - ISSUE C**

Paper/Scale: A2/1:100, 1:3.10, 1:1,

Date: 6/09/2021

Job #: **28730**

Dwg #: **2001**

EAST ELEVATION

scale 1:100

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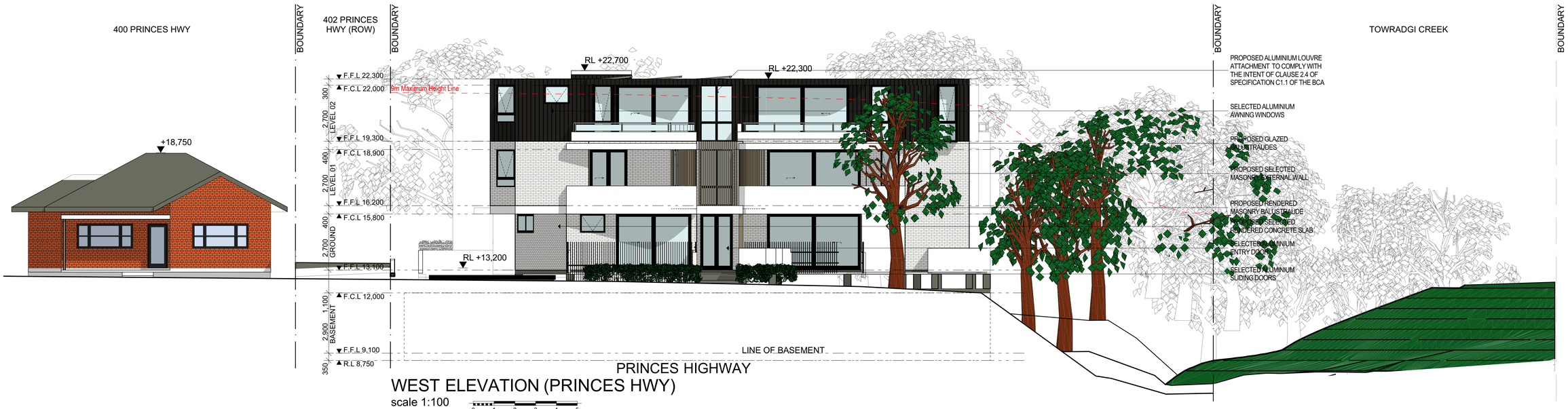

PRINCES HIGHWAY

WEST ELEVATION (PRINCES HWY)

scale 1:100

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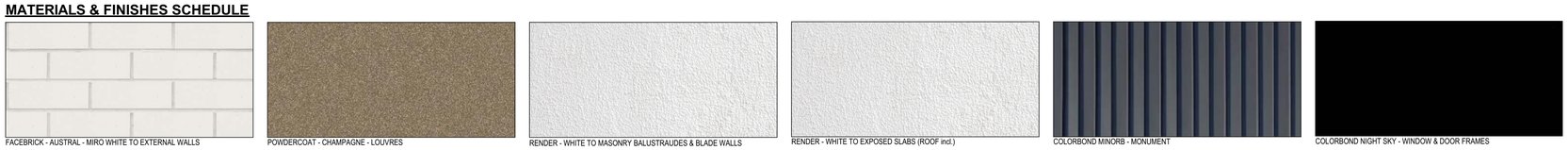
MATERIALS & FINISHES SCHEDULE



FACEBRICK - AUSTRAL - MIRO WHITE TO EXTERNAL WALLS

POWDERCOAT - CHAMPAGNE - LOUVRES

RENDER - WHITE TO MASONRY BALUSTRAUDES & BLADE WALLS

RENDER - WHITE TO EXPOSED SLABS (ROOF ind.)

COLORBOND MINORB - MONUMENT

COLORBOND NIGHT SKY - WINDOW & DOOR FRAMES

404 PRINCES HIGHWAY - CORRIMAL

NORTH POINT

All work to be carried out in accordance with BCA, AS & Council conditions.

 Do not scale off architectural drawings. These notes must be read in conjunction with colours selection for additional details on appliances, PC items & shower sizes shown on plan are inside hob dimensions shower screens to be fitted on inside of hob bulkheads may be required to accommodate drainage lines & steel beams position to be determined on site. Use figured dimensions ONLY, do not scale. Finished ground levels shown on plans are subject to site conditions, all calculated dimensions are subject to site measure during construction & no allowance has been made for shrinkage or milling position of electrical meter to be determined on site in accordance to the turret position front garden tap on meter.

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NOTES :

DATE	DRAWING DESCRIPTION	ISSUE
06/09/21	DEFERRAL LETTER	C

Drawing Title: **EAST & WEST ELEVATIONS**

Client: Auswide

Council: Wollongong City Council

Project: Demolition & construction of a Four (4) Storey RFB development containing 14 units over basement parking

Designed + Drawn: A.W. / P.R / M.T

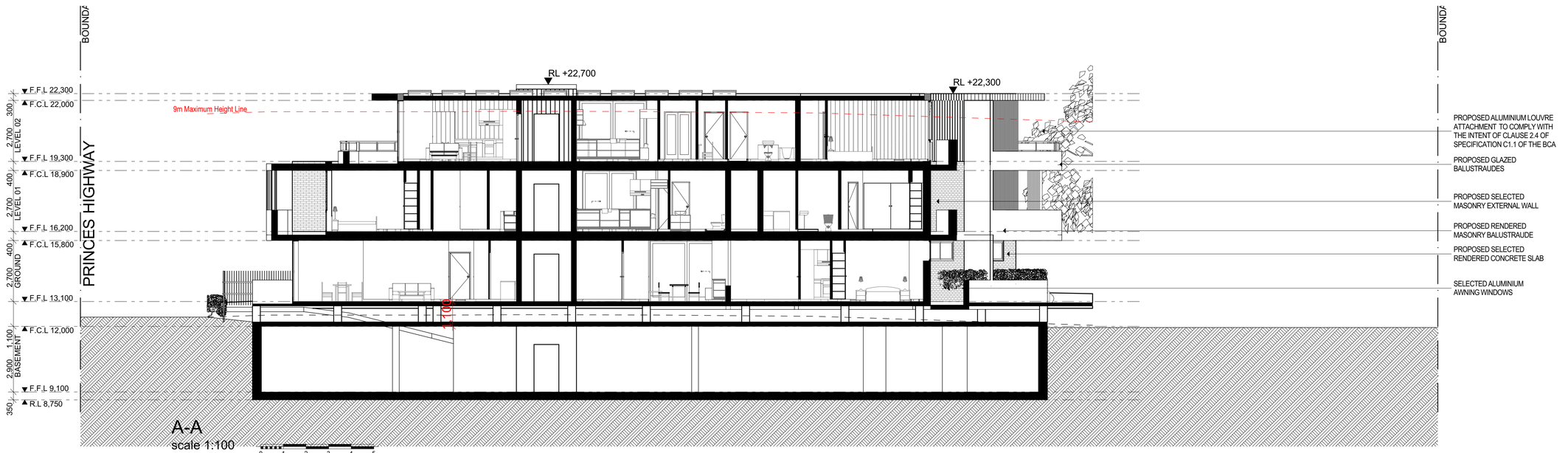
Issue/Stage: **DA - ISSUE C**

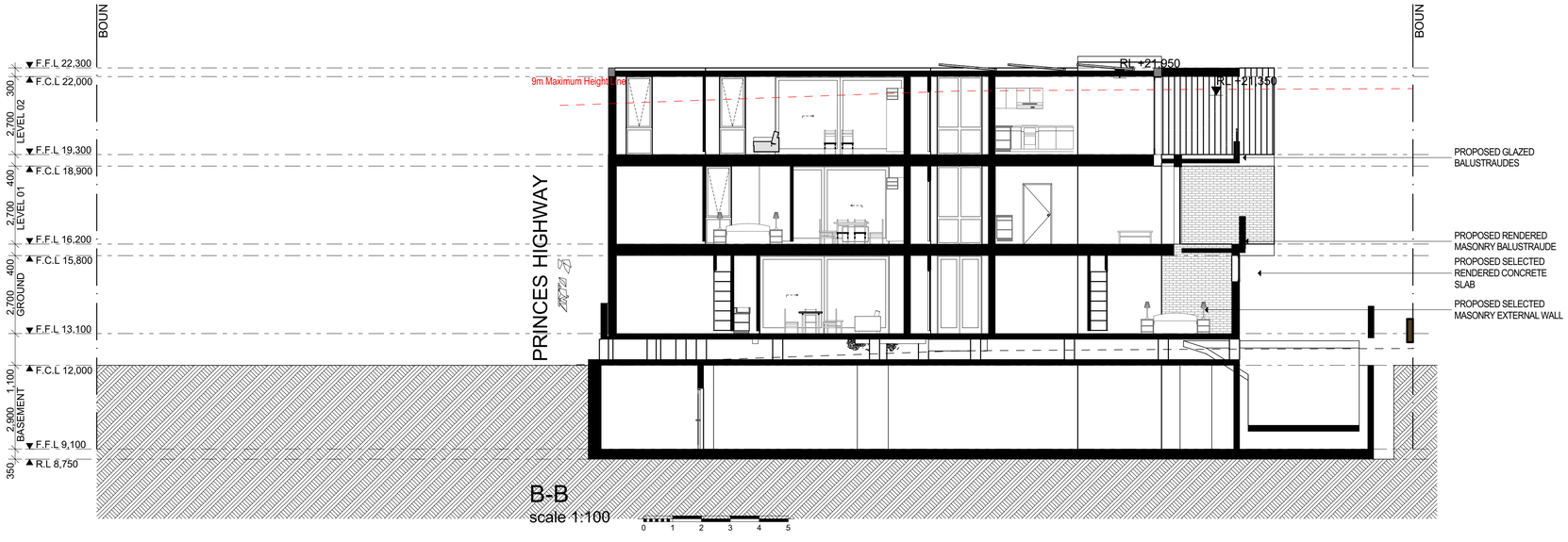
Paper/Scale: A2/1:100, 1:3.10, 1:1,

Date: 6/09/2021

Job #: **28730**

Dwg #: **2002**





404 PRINCES HIGHWAY - CORRIMAL

NORTH POINT

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NOTES :

DATE	DRAWING DESCRIPTION	ISSUE
06/09/21	DEFERRAL LETTER	C

Drawing Title: **SECTIONS**

Client: Auswide

Council: Wollongong City Council

Project: Demolition & construction of a Four (4) Storey RFB development containing 14 units over basement parking

Designed + Drawn: A.W. / P.R / M.T

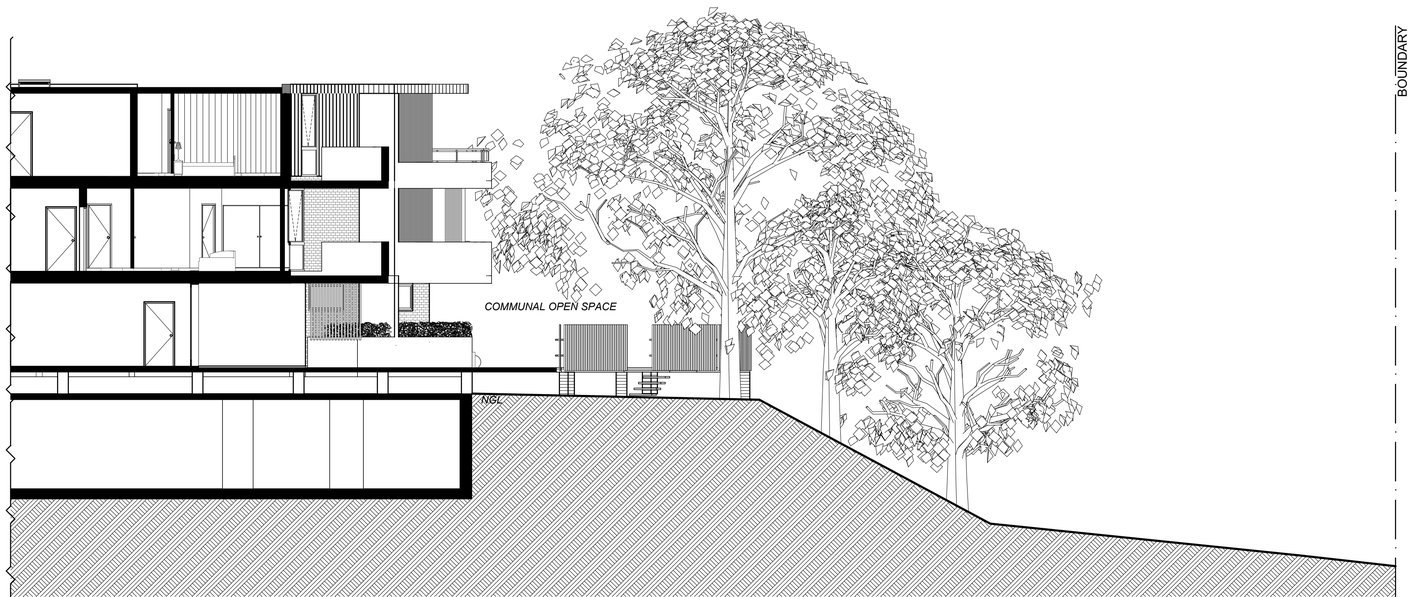
Issue/Stage: **DA - ISSUE C**

Paper/Scale: A2/1:100

Date: 6/09/2021

Job #: **28730**

Dwg #: **3001**



COMMUNAL SECTION A
scale 1:100

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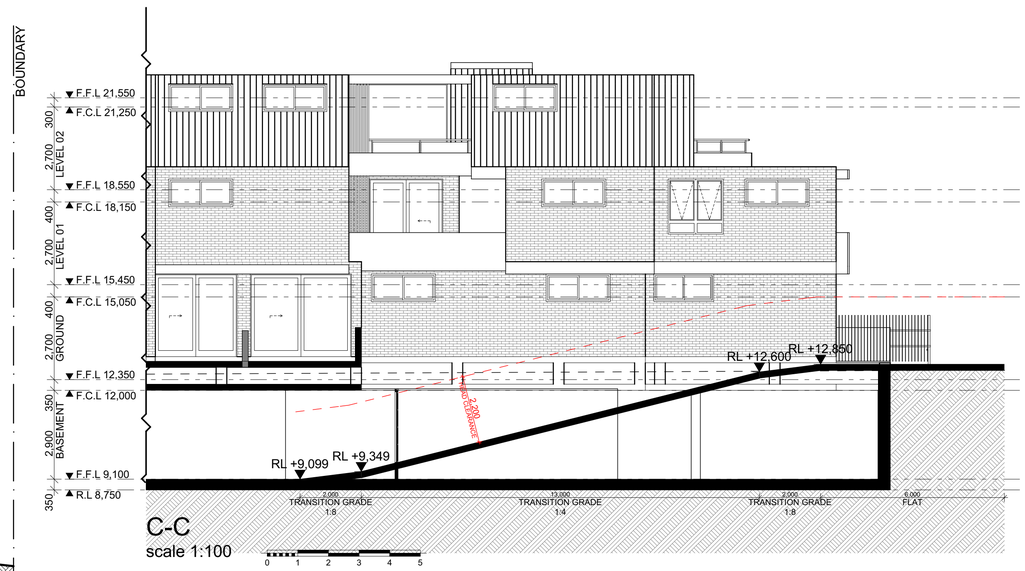

C-C
scale 1:100

0 1 2 3 4 5

COMMUNAL SECTION B
scale 1:100

0 1 2 3 4 5

404 PRINCES HIGHWAY - CORRIMAL

NORTH POINT

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NOTES :

DATE	DRAWING DESCRIPTION	ISSUE
06/09/21	DEFERRAL LETTER	C

Drawing Title: **SECTIONS**

Client: Auswide

Council: Wollongong City Council

Project: Demolition & construction of a Four (4) Storey RFB development containing 14 units over basement parking

Designed + Drawn: A.W. / P.R / M.T

Issue/Stage: **DA - ISSUE C**

Paper/Scale: A2/1:100

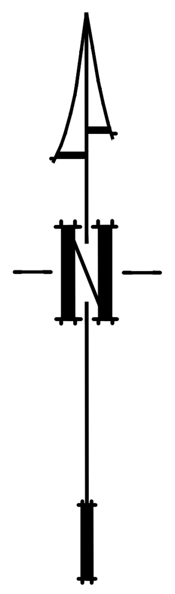
Date: 6/09/2021

Job #: **28730**

Dwg #: **3002**

LEGEND

- PROPOSED STORMWATER
- SURFACE FLOW ARROWS
- SUBSOIL DRAINAGE
- CLEANING EYE (OR INSPECTION EYE)
- PROPOSED STORAGE AREA
- × RL 27.56 — FINISHED SURFACE LEVEL
- GRATED DRAIN



STANDARD PUMP OUT DESIGN NOTES

THE PUMP OUT SYSTEM SHALL BE DESIGN TO BE OPERATED IN THE FOLLOWING MANNER:

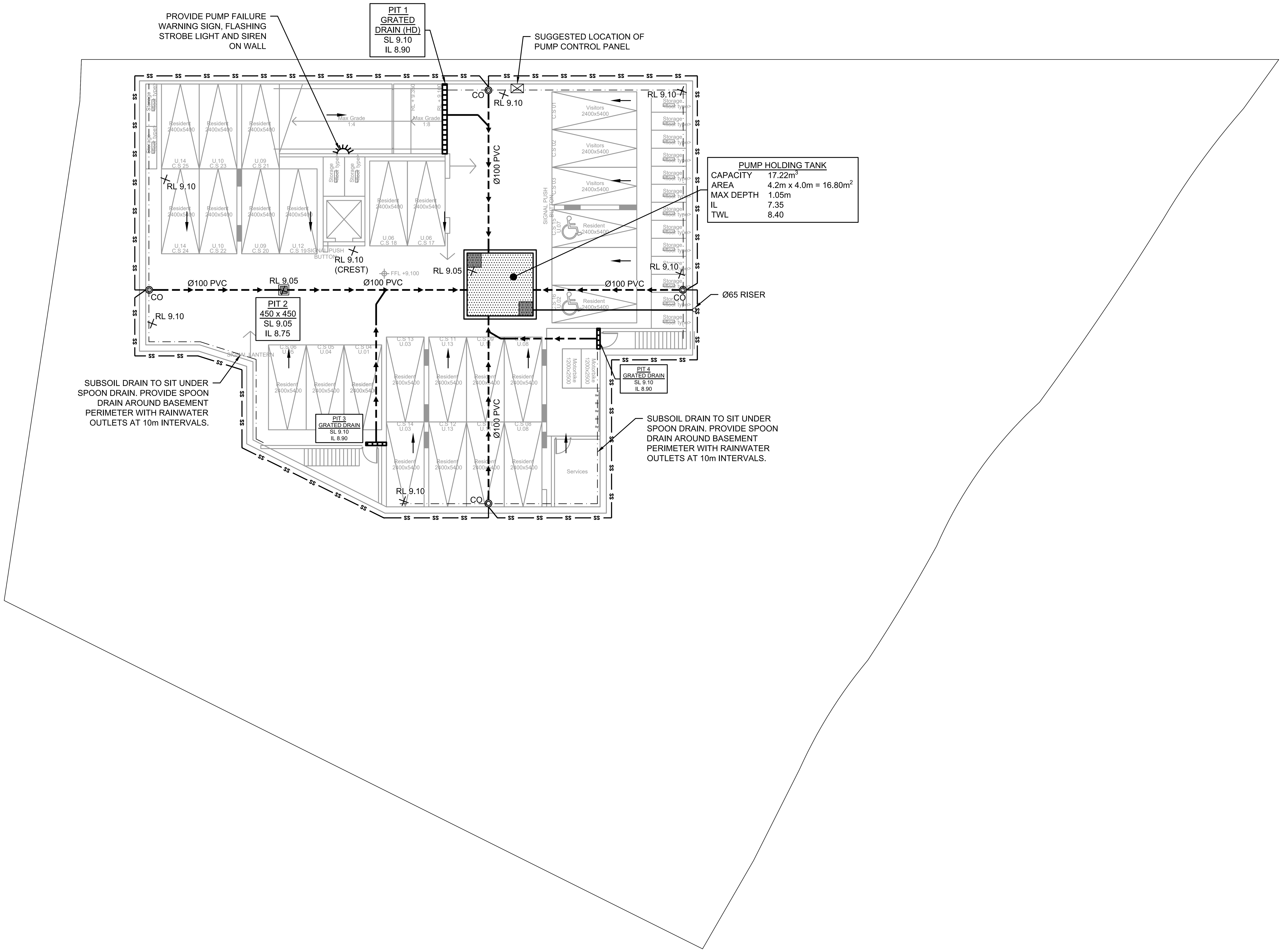
1 - THE PUMP SHALL BE PROGRAMMED TO WORK ALTERNATELY TO ALLOW BOTH PUMPS TO HAVE AN EQUAL OPERATION LOAD AND PUMP LIFE.

2 - A FLOAT SHALL BE PROVIDED TO ENSURE OF THE MINIMUM REQUIRED WATER LEVEL IS MAINTAINED WITHIN THE SUMP AREA OF THE BELOW GROUND TANK. IN THIS REGARD THIS FLOAT WILL FUNCTION AS AN OFF SWITCH FOR THE PUMPS AT THE MINIMUM WATER LEVEL. THE SAME FLOAT SHALL BE SET TO TURN ONE OF THE PUMPS ON UPON THE WATER LEVEL IN THE TANK RISING TO APPROXIMATELY 300mm ABOVE THE MINIMUM WATER LEVEL. THE PUMP SHALL OPERATE UNTIL THE TANK IS DRAINED TO THE MINIMUM WATER LEVEL.

3 - A SECOND FLOAT SHALL BE PROVIDE AT A HIGH LEVEL, WHICH IS APPROXIMATELY THE ROOF LEVEL OF THE BELOW GROUND TANK. THIS FLOAT SHALL START THE OTHER PUMP THAT IS NOT OPERATING AND ACTIVATE THE ALARM.

4 - AN ALARM SYSTEM SHALL BE PROVIDE WITH A FLASHING STROBE LIGHT AND A PUMP FAILURE WARNING SIGN WHICH ARE TO BE LOCATED AT THE DRIVEWAY ENTRANCE TO THE BASEMENT LEVEL THE ALARM SYSTEM SHALL BE PROVIDED WITH A BATTERY BACK-UP IN CASE OF POWER FAILURE.

5 - A CONFINED SPACE DANGER SIGN SHALL BE PROVIDED AT ALL ACCESS POINT TO THE PUMP-OUT STORAGE TANK IN ACCORDANCE WITH THE UPPER PARRAMATA RIVER CATCHMENT TRUST OSD HANDBOOK.



BASEMENT PLAN
SCALE 1:150

CONFINED SPACE DANGER SIGN

A) A CONFINED SPACE DANGER SIGN SHALL BE POSITIONED IN A LOCATION AT ALL ACCESS POINTS, SUCH THAT IT IS CLEARLY VISIBLE TO PERSONS PROPOSING TO ENTER THE BELOW GROUND TANK/S CONFINED SPACE.

B) MINIMUM DIMENSIONS OF THE SIGN - 300mm x 450mm (LARGE ENTRIES, SUCH AS DOORS) -250mm x 180mm (SMALL ENTRIES SUCH AS GRATES & MANHOLES)

C) THE SIGN SHALL BE MANUFACTURED FROM COLOUR BONDED ALUMINUM OR POLYPROPYLENE

D) SIGN SHALL BE AFFIXED USING SCREWS AT EACH CORNER OF THE SIGN

COLOURS:
"DANGER" & BACKGROUND = WHITE
ELLIPTICAL AREA = RED
RECTANGLE CONTAINING ELLIPSE = BLACK
BORDER AND OTHER LETTERING = BLACK

BASEMENT PUMP OUT FAILURE WARNING SIGN

SIGN SHALL BE PLACED IN A CLEAR AND VISIBLE LOCATION WHERE VEHICLES ENTER THE BASEMENT

COLOURS:
"WARNING" = RED
BORDER AND OTHER LETTERING = BLACK

NOT FOR CONSTRUCTION

Issue	Description	Date	Design	Checked
C	COUNCIL COMMENTS	06/09/2021	AGN	JSF
B	COUNCIL COMMENTS	11/06/2021	AGN	JSF
A	ISSUE FOR DEVELOPMENT APPLICATION	31/08/2020	EHZ	JSF

0 1cm at full size 10cm 20cm

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Client: Auswide

Council: Wollongong City Council

Scale: 0 3 6 9 m — SCALE 1:150 @ A1

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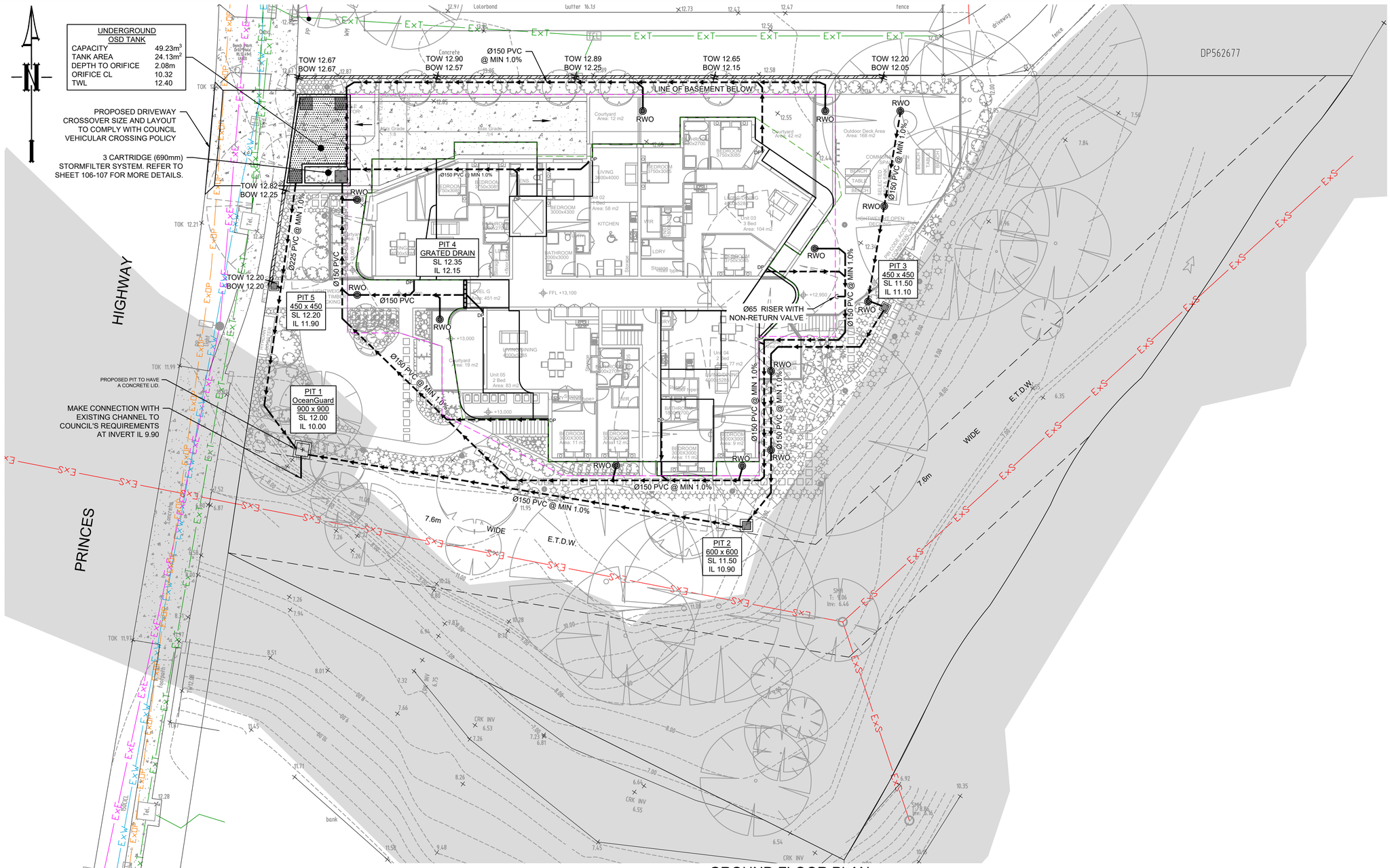
ACE ENGINEERING THE FUTURE

Project: 404 PRINCES HIGHWAY, CORRIMAL PROPOSED MULTI-UNIT DEVELOPMENT STORMWATER CONCEPT PLANS DEVELOPMENT APPLICATION

Drawing Title: STORMWATER CONCEPT PLAN BASEMENT LEVEL SHEET 1 OF 2

Scale A1	Project No.	Dwg. No.	Issue
1:150	200352	101	C



GROUND FLOOR PLAN

SCALE 1:150

PIPES NOTE:

Ø65 PVC @ MIN 1.0%
Ø90 PVC @ MIN 1.0%
Ø100 PVC @ MIN 1.0%
Ø150 PVC @ MIN 1.0%
Ø225 PVC @ MIN 0.5%
Ø300 PVC @ MIN 0.4%
UNLESS NOTED OTHERWISE

ROOF NOTE:

IT IS CONTRACTOR'S RESPONSABILITY TO ENSURE MINIMUM 30 TO 40mm OF PONDING IS ACHIEVED OVER THE FLOOR WASTES BY GRADING CATCHMENT'S SURFACES AT MINIMUM 1% FALL.

GENERAL NOTES

1. ALL THE CLEANING EYES (OR INSPECTION EYES) FOR THE UNDERGROUND PIPES HAVE TO BE TAKEN UP TO THE FINISHED GROUND LEVEL FOR EASY IDENTIFICATION AND MAINTENANCE PURPOSES
2. ALL LEVELS SHALL RELATE TO THE ESTABLISHED BENCH MARK.
3. THE BUILDER SHALL ENSURE THAT THE STORMWATER ENGINEERS DRAWINGS CORRESPOND TO THE ARCHITECTURAL, STRUCTURAL AND LANDSCAPING DRAWINGS. IF THERE EXISTS AND DISCREPANCIES BETWEEN THE DRAWINGS, THE BUILDER SHALL REPORT THE DISCREPANCIES TO THE ENGINEER PRIOR TO COMMENCEMENT OF ANY WORKS
4. ALL MULCHING TO BE USED WITHIN THE AREA DESIGNATED AS ONS-SITE DETENTION STORAGE SHALL BE OF A NON-FLOTABLE MATERIAL SUCH AS DECORATIVE RIVER GRAVEL. PINE BARK MULCHING SHALL NOT BE USED WITHIN THE DETENTION STORAGE AREA.
5. ALL RETAINING WALLS SHALL BE CONSTRUCTED COMPLETELY WITHIN THE PROPERTY BOUNDARY LIMITS TO DETAILS PREPARED BY THE STRUCTURAL ENGINEER. WALLS FORMING THE ON-SITE DETENTION SYSTEM SHALL BE OF MASONARY/BRICK CONSTRUCTION AND WATER TIGHT.
6. ALL SUB-SOIL DRAINAGE SHALL BE A MINIMUM OF 65MM DIA AND SHALL BE PROVIDED WITH A FILTER SOCK. THE SUBSOIL DRAINAGE SHALL BE INSTALLED IN ACCORDANCE WITH DETAILS TO BE PROVIDED BY THE LANDSCAPE ARCHITECT.
7. PRIOR TO COMMENCING ANY WORKS, THE BUILDER SHALL ENSURE THAT THE INVERT LEVELS OF WHERE THE SITE STORMWATER SYSTEM CONNECTS INTO THE COUNCILS KERB/DRAINAGE SYSTEM MATCHED THE DESIGN LEVELS. ANY DISCREPANCIES SHALL BE REPORTED TO THE DESIGN ENGINEER IMMEDIATELY.
8. ALL LINES ARE TO BE Ø90 uPVC 1.0% GRADE UNLESS NOTED OTHERWISE. CHARGED LINES TO BE SEWERGRADE & SEALED.
9. EXISTING SERVICES LOCATIONS SHOWN INDICATIVE ONLY.
10. IT IS THE CONTRACTORS RESPONSIBILITY TO LOCATE & LEVEL ALL EXISTING SERVICES PRIOR TO THE COMMENCEMENT OF ANY EARTHWORKS.
11. ALL PIPES TO HAVE MIN 150mm COVER IF LOCATED WITHIN PROPERTY.
12. ALL PITS IN DRIVEWAYS TO BE 450x450 CONCRETE AND ALL PITS IN LANDSCAPED AREAS TO BE 450x450PLASTIC.
13. PITS LESS THAN 450 DEEP MAY BE BRICK, PRECAST OR CONCRETE.
14. ALL BALCONIES AND ROOFS TO BE DRAINED AND TO HAVE SAFETY OVERFLOWS IN ACCORDANCE WITH RELEVANT AUSTRALIAN STANDARDS.
15. ALL EXTERNAL SLABS TO BE WATERPROOFED.
16. ALL GRATES TO HAVE CHILD PROOF LOCKS.
17. ALL DRAINAGE WORKS TO AVOID TREE ROOTS.
18. ALL DP'S TO HAVE LEAF GUARDS.
19. ALL EXISTING LEVELS TO BE CONFIRMED BY BUILDER PRIOR TO CONSTRUCTION.
20. ALL WORK WITHIN COUNCIL RESERVE TO BE INSPECTED BY COUNCIL PRIOR TO CONSTRUCTION.
21. COUNCIL'S ISSUED FOOTWAY DESIGN LEVELS TO BE INCORPORATED INTO THE FINISHED LEVELS ONCE ISSUED BY COUNCIL.
22. ALL WORK SHALL BE IN ACCORDANCE WITH B.C.A. AND A.S.3500.3.
23. REFER TO LANDSCAPE ARCHITECT'S DRAWINGS FOR LANDSCAPING.
24. ALL WALLS FORMING THE DETENTION BASINS SHALL BE CONSTRUCTED WHOLLY WITHIN THE PROPERTY BOUNDARIES OF THE SITE BEING DEVELOPED.
25. OSD WARNING SIGN AND SAFETY FENCING SHALL BE PROVIDED TO ABOVE GROUND OSD STORAGE AREA IN ACCORDANCE WITH COUNCIL'S REQUIREMENTS.
26. ENSURE THAT NON FLOATABLE MULCH IS USED IN DETENTION BASINS, ie, USE DECORATIVE ROCK MULCH OR EQUIVALENT.
27. THE OSD BASIN / TANK IS TO BE BUILT TO THE CORRECT LEVELS & SIZE AS PER THIS DESIGN. ANY VARIATIONS ARE TO BE DONE UNDER CONSULTATION FROM OUR OFFICE ONLY. ANY AMENDMENTS WITHOUT OUR APPROVAL WOULD RESULT IN ADDITIONAL FEES FOR REDESIGN AT OC STAGE OR IF A SOLUTION CANNOT BE FOUND, RECONSTRUCTION IS REQUIRED UNDER THE CONTRACTOR'S EXPENSES
28. ALL PIPES IN BALCONIES TO BE Ø65 uPVC IN CONCRETE SLAB. CONTRACTOR TO PROVIDE A BREAK / OPEN VOID IN RAIL / BALLUSTRADE FOR STORMWATER EMERGENCY OVERFLOW. ALL ENCLOSED AREAS / PLANTER BOXES TO BE FITTED WITH FLOOR WASTES & DRAINED TO OSD. DOWNPIPES TO BE CHECKED BY ARCHITECT & PLUMBER PRIOR TO CONSTRUCTION.

NOT FOR CONSTRUCTION

Issue	Description	Date	Design	Checked
C	COUNCIL COMMENTS	06/09/2021	AGN	JSF
B	COUNCIL COMMENTS	11/06/2021	AGN	JSF
A	ISSUE FOR DEVELOPMENT APPLICATION	31/08/2020	EHZ	JSF

0 1cm at full size 10cm 20cm

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Council: Wollongong City Council

Scale: 0 3 6 9 m — SCALE 1:150 @ A1

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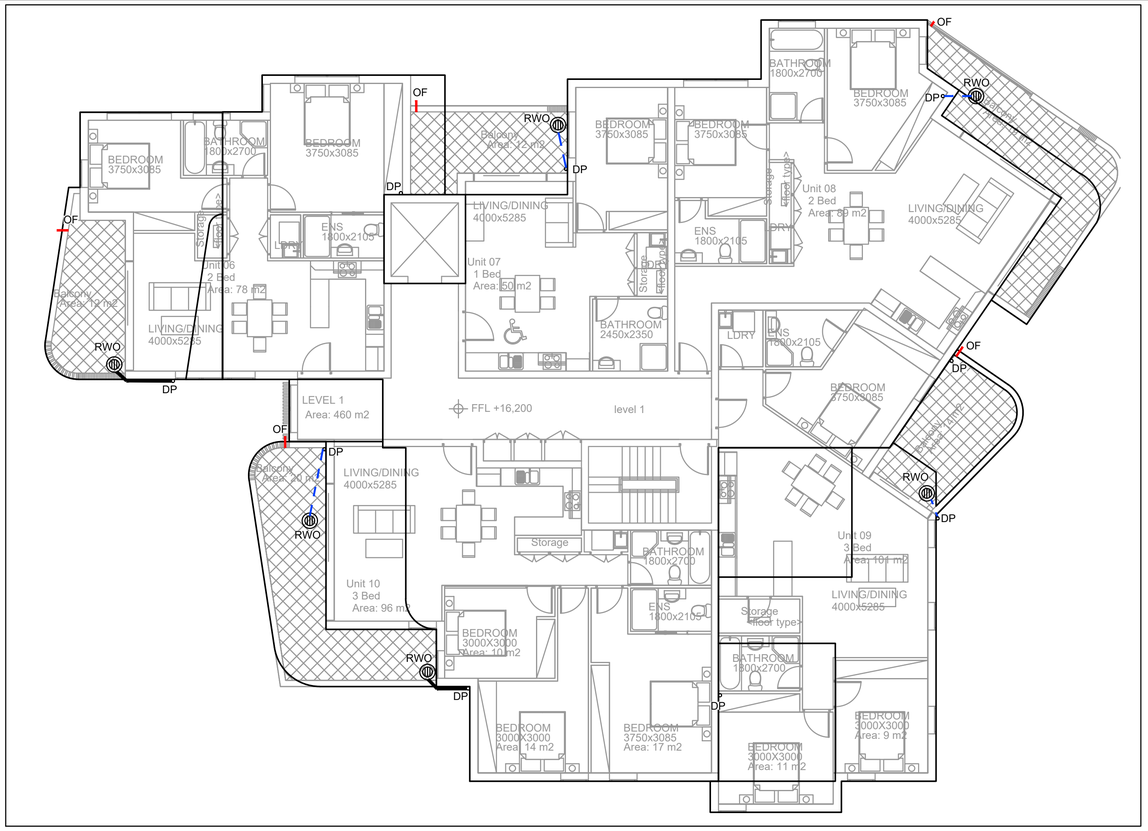
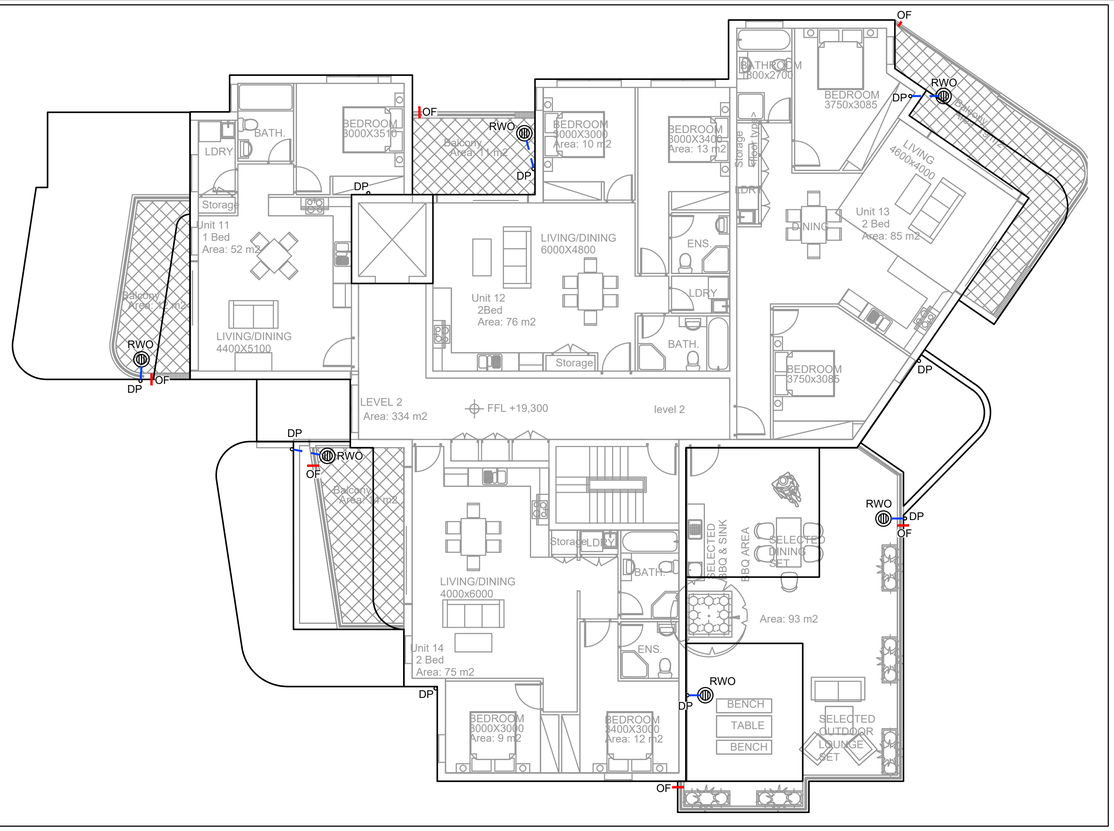
Project: 404 PRINCES HIGHWAY, CORRIMAL
PROPOSED MULTI-UNIT DEVELOPMENT
STORMWATER CONCEPT PLANS
DEVELOPMENT APPLICATION

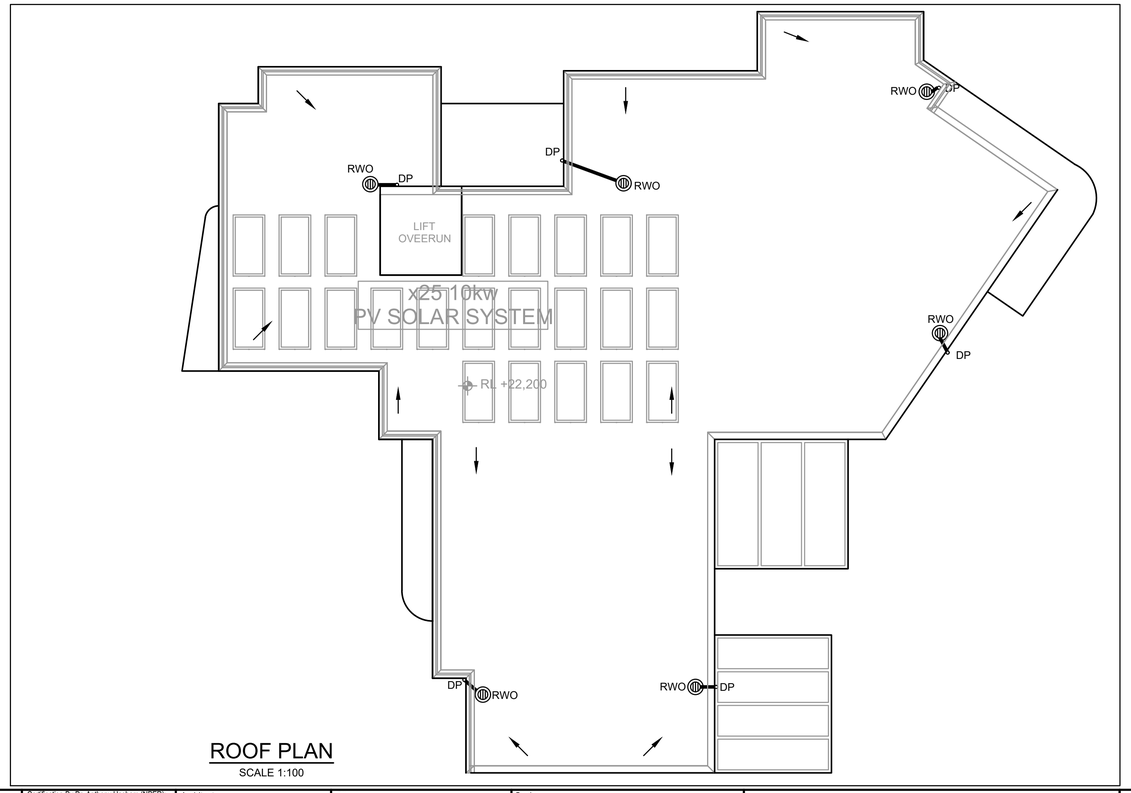
Drawing Title: STORMWATER CONCEPT PLAN GROUND LEVEL

Scale	Project No.	Dwg. No.	Issue
1:150 A1	200352	103	C





LEVEL 1 PLAN
SCALE 1:100



ROOF PLAN
SCALE 1:100

LEVEL 2 PLAN
SCALE 1:100

NOT FOR CONSTRUCTION

Issue	Description	Date	Design	Checked
C	COUNCIL COMMENTS	06/09/2021	AGN	JSF
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Project
404 PRINCES HIGHWAY, CORRIMAL
PROPOSED MULTI-UNIT DEVELOPMENT
STORMWATER CONCEPT PLANS
DEVELOPMENT APPLICATION

Drawing Title
STORMWATER CONCEPT PLAN
LEVEL 1, LEVEL 2 & ROOF PLAN

Scale	Project No.	Dwg. No.	Issue
1:100 A1	200352	104	C

CATCHMENT LEGEND

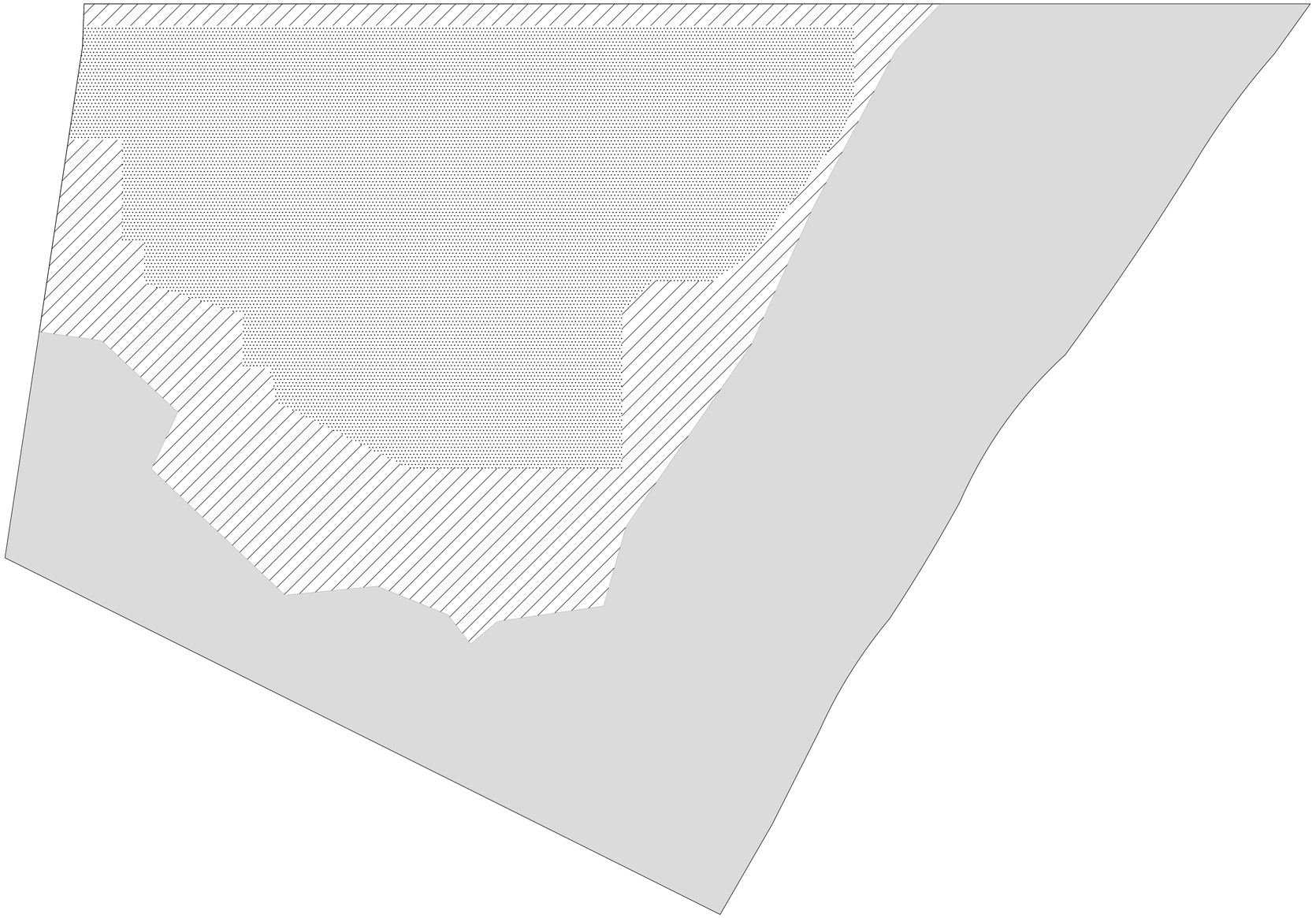
OSD CATCHMENT = 952.1m²

AREA BYPASSING OSD = 543.9m²

FLOOD AREA NOT INCLUDED IN SITE CALCULATION = 1415m²

TOTAL AREA INCLUDED IN OSD CALCULATIONS = 1496m²

TOTAL SITE AREA = 2911m²



OSD CATCHMENT PLAN

SCALE 1:150

NOT FOR CONSTRUCTION

Issue	Description	Date	Design	Checked
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Project
404 PRINCES HIGHWAY, CORRIMAL
PROPOSED MULTI-UNIT DEVELOPMENT
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Drawing Title
OSD CATCHMENT PLAN

Scale	A1	Project No.	Dwg. No.	Issue
1:150		200352	105	C

LEGEND / FINISHES SCHEDULE

EXISTING RL

EXISTING TREE TO BE REMOVED

NOTE:
All noxious weeds on the site shall be removed and destroyed as per their classification under the noxious weeds Act.

EXISTING TREE TO BE RETAINED AND SHALL BE PROTECTED DURING CONSTRUCTION IN ACCORDANCE WITH AS 4970-2009

TREE PRUNING SHALL BE IN ACCORDANCE WITH AS 4373

EXISTING TREE NO.
(REFER TO ARBORIST REPORT)

PROPOSED TREES, SHRUBS & GROUND COVER
(REFER NO. TO PLANT SCHEDULE)

BOUNDARY FENCE

MULCHED GARDEN BED
900 WIDE MIN.
OR AS SHOWN ON PLAN
REFER TO DETAIL 1 & 2

SELECTED METAL GARDEN EDGE
OR AS SELECTED
REFER TO DETAIL 1

RETAINING WALL

SELECTED RETAINING WALL /OSD WALL
ALL RETAINING WALL HEIGHT SHALL BE CONFIRM ON SITE AND TO
-TO ENGINEER DETAIL &
TO BCA REQUIREMENTS

800 HIGH PLANTER ABOVE CONC. SLAB

SELECTED INSITU PLANTER BOX OVER PODIUM CONC. SLAB
REFER TO DETAILS 3 AND TO ENGINEER DETAIL & TO BCA REQUIREMENTS

1200 HIGH PLANTER ABOVE CONC. SLAB

LAWN AREA
SIR WALTER BUFFALO
REFER TO DETAIL 1
All turf area shall be finished level with adjoining surfaces and also fall evenly to approved point of drainage discharge.

COMMON OPEN SPACE
SELECTED TILES
- TO AUST. STANDARDS

PATIO / TERRACE / PATH
SELECTED TILES
- TO AUST. STANDARDS

STEPPING STONES
SELECTED CONC. STEPPING STONES SET WITHIN MULCHED AREA

SELECTED LETTER BOX
-TO AUST POST REQUIREMENTS AND TO AS/NZS 4253:1994

SELECTED BOLLARD ILLUMINATION

SELECTED ILLUMINATION
ILLUMINATION SHALL BE DESIGNED BY A QUALIFIED LIGHTING CONSULTANT AND WITH AS 4282, AS 1680 & AS 1158 IN ACCORDANCE

DRAINAGE GRATE

DRAINAGE PIT

DRAINAGE
REFER TO ENGINEER PLANS FOR DETAILS
NOTE:
PROVIDE SELECTED HEEL GUARD GRATES TO PITS ON TRAFFICABLE AREAS - TO MANUF. DETAIL

ITEM	MATERIAL
	NOTE: ALL SOIL TYPE AS PER AUST LANDSCAPE SUPPLY OR EQUIVALENT AND SHALL BE IN
SOIL DETAIL 1 & 2	ACCORDANCE WITH AS 4419 AND AS 4454 FOR SOIL CONDITIONERS A COMPOSTS
LAWN AREA	1st QUALITY TOP SOIL
NATIVE GARDEN BED	NATIVE GARDEN MIX
EXOTIC GARDEN BED	ORGANIC GARDEN MIX
PLANTER BOX	IN PLANTER BOX MIX ACCORDANCE WITH AS4419:1998 & AS3743
MULCH	**SELECTED HARD WOOD CHIP** SHALL BE IN ACCORDANCE WITH AS 4454
PLANT MATERIAL	**AS PER PLANT SCHEDULE** REFER TO DETAIL 2
GARDEN EDGE	**SELECTED METAL EDGING OR AS SELECTED** REFER TO DETAIL 1
FENCE	
SIDES & REAR BOUNDARY BF1800	1800 HIGH LAPPED & CAPPED TIMBER FENCE OR 1800 HIGH COLOURBOND UNLESS THE TYPE OF MATERIAL IS STIPULATED IN ANY FLOOD STUDY PREPARE FOR THE SITE
POTS / TROUGHS	**QUATRO DESIGN PLANTER** http://www.quatrodesign.com.au OR SIMILAR
	1500 square tall civic planter 1500 x 1500 x 1000H
	900 tall square planter 900 x 900 x 700H
	1500 narrow 1000 tall planter 1500 x 600 x 1000H
IRRIGATION	PROVIDE DRIP IRRIGATION SYSTEM TO ALL PLANTER BOXES IN ACCORDANCE WITH AS3500 AND SYDNEY WATER CODE IRRIGATION SHALL BE DESIGNED & INSTALLED BY QUALIFIED IRRIGATION CONTRACTORS.

HATCHED AREA INDICATES VMP AREA
REFER TO PLANTING DENSITIES (6.3.1) AND MAINTENANCE (6.4) -VEGETATION MANAGEMENT PLAN AND FLORA AND FAUNA ASSESSMENT BY BIOSIS

1. TURF & METAL GARDEN EDGE DETAIL

NOTE :
ALIGNMENT OF METAL EDGE SHALL BE EVEN & FREE FROM DIPS AND HUMPS.

ALL TURFED AREAS SHALL BE FINISHED LEVEL WITH ADJOINING SURFACES AND ALSO FALL EVENLY TO APPROVED POINTS OF DRAINAGE DISCHARGE

2. TREE & SHRUB PLANTING IN GARDEN BED ©

NOTE :
DO NOT PLANT IN UNSUITABLE WEATHER CONDITIONS SUCH AS EXTREME HEAT, COLD, WIND OR RAIN CLAY SOIL IS TO BE TREATED WITH CLAY BREAKER AND ORGANIC COMPOST

ALL SOIL TYPE AS PER AUST, NATIVE LANDSCAPE SUPPLY OR EQUIVALENT AND SHALL BE IN ACCORDANCE WITH AS 4419

REV	DESCRIPTION	REVISION DATE
D	AMEND AS PER NRAR LETTER	13.9.21
C	AMEND AS PER ARCH CHG	6.9.21
B	UPDATED AS PER COUNCIL LETTER	16.8 .21
A	DA ISSUE	29.6 .21

NOTE:

1. In the event of anY inconsistency between the architectural plans and stormwater plans, The architectural plan shall prevail to the extent of the inconsistency
2. All landscape works shall be carried out by members of the LANDSCAPE CONTRACTORS ASSOCIATION of AUSTRALIA.
3. Contractors must verify all dimensions at the site before commencing any work or making any shop drawings which must be approved before manufacturing.
4. Do not scale drawing, if in doubt - ASK
5. This drawing is to be read in conjuction with Architectural, Hydraulic and survey plans
6. All Existing trees to remain shall be protected as per arborist report & council requirements
7. All pruning shall be in accordance with the AS 4373
8. Thoroughly eradicate weeds from all garden areas.
9. No variation to the works to be carried out without prior approval from owner.
10. All materials to be the best of their respective kinds and shall comply with approved sample type submitted or specified.
11. Substitution of plant species or varieties will not be permitted.
12. Unless otherwise specified or directed, all instructions are to be issued by the consulting landscape designer.
13. All storm water outlets & surface run off shall be to Hydraulic Engineers detail.
14. Provide sub-soil drainage to garden beds & lawn areas where required - To be confirmed on site.
15. Refer to survey plan for position of all existing services.
16. Refer to Architectural elevations & Sections for existing and proposed ground lines.
17. All landscape works shall comply with all councils DA & CC conditions and all relevant "AUSTRALIAN STANDARDS" and AUS SPEC NO.1 Specification C273-Landscaping.
18. Irrigation system - If required, shall be designed & installed to comply with AS 2698, AS 2698.1-1994, AS 2698.2-1985, AS 2698.3-1990, water board and other relevant authority regulations.

MAINTENANCE

- All landscape works are to be maintained for a period of 12 months (or as required by council DA Consent) by landscape contractor after final completion AND shall be maintained at all times in a suitable manner. Replace all plants which have failed with the same species. Mulch is to be maintained at specified depth. All plants and turf shall be watered on a regular basis to maintain moisture levels required for optimum growth. All garden areas are to be maintained free from weeds.

PROPOSED MULTI DWELLING HOUSING

404 Princes Hwy, Corrimal

ARCHITECT:
IDRAFT ARCHITECTS

vision dynamics pty ltd.
landscape design
8 Blaxland Road
Killara NSW 2071
m:0412 282 888
Ph:(02) 9499 8888 Fax:(02) 9499 8899
em : visiondynamics @ westnet.com.au

DRAWING TITLE
LANDSCAPE CONCEPT PLAN

DRAWN FF | SCALE 1 : 150@A1 OR 1:300@A3 | REV. D

DRAWING NUMBER 21137 DA 1-2

MEMBER Fiona Fong © Associate Member
Australian Institute Landscape Designers & Managers Ltd of Membership No. 193

NORTH

LEGEND / FINISHES SCHEDULE

EXISTING RL

EXISTING TREE TO BE REMOVED
NOTE:
All noxious weeds on the site shall be removed and destroyed as per their classification under the noxious weeds Act.

EXISTING TREE TO BE RETAINED AND SHALL BE PROTECTED DURING CONSTRUCTION IN ACCORDANCE WITH AS 4970-2009

TREE PRUNING SHALL BE IN ACCORDANCE WITH AS 4373

EXISTING TREE NO.
(REFER TO ARBORIST REPORT)

PROPOSED TREES, SHRUBS & GROUND COVER
(REFER NO. TO PLANT SCHEDULE)

BOUNDARY FENCE

MULCHED GARDEN BED
900 WIDE MIN.
OR AS SHOWN ON PLAN
REFER TO DETAIL 1 & 2

SELECTED METAL GARDEN EDGE
OR AS SELECTED
REFER TO DETAIL 1

RETAINING WALL

SELECTED RETAINING WALL /OSD WALL
ALL RETAINING WALL HEIGHT SHALL BE CONFIRM ON SITE AND TO
-TO ENGINEER DETAIL &
TO BCA REQUIREMENTS

800 HIGH PLANTER ABOVE CONC. SLAB

SELECTED INSITU PLANTER BOX OVER PODIUM CONC. SLAB
REFER TO DETAILS 3 AND TO ENGINEER DETAIL & TO BCA REQUIREMENTS

1200 HIGH PLANTER ABOVE CONC. SLAB

LAWN AREA
SIR WALTER BUFFALO
REFER TO DETAIL 1
All turf area shall be finished level with adjoining surfaces and also fall evenly to approved point of drainage discharge.

COMMON OPEN SPACE
SELECTED TILES
- TO AUST. STANDARDS

PATIO / TERRACE / PATH
SELECTED TILES
- TO AUST. STANDARDS

STEPPING STONES
SELECTED CONC. STEPPING STONES SET WITHIN MULCHED AREA

SELECTED LETTER BOX
-TO AUST POST REQUIREMENTS AND TO AS/NZS 4253:1994

SELECTED BOLLARD ILLUMINATION

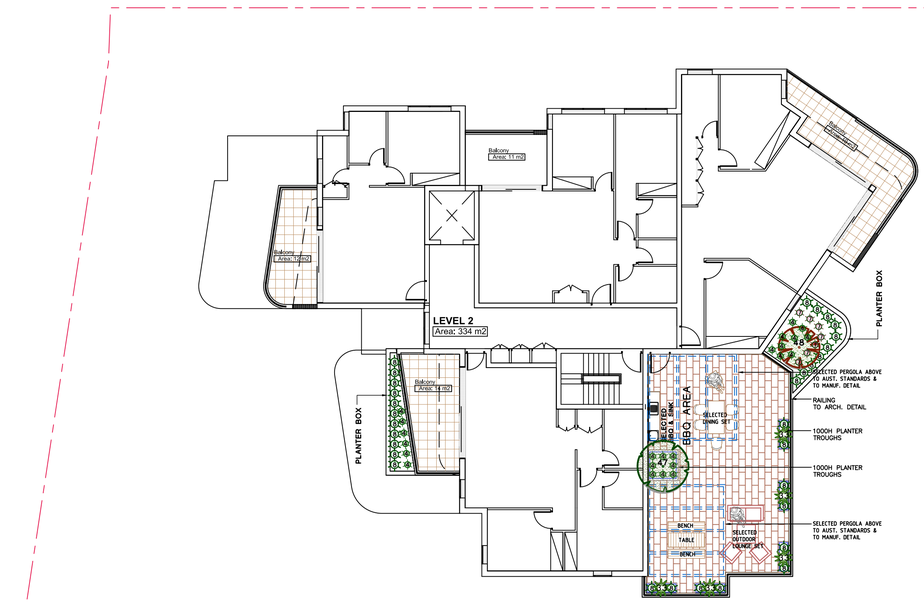
SELECTED ILLUMINATION
ILLUMINATION SHALL BE DESIGNED BY A QUALIFIED LIGHTING CONSULTANT AND WITH AS 4282, AS 1680 & AS 1158 IN ACCORDANCE

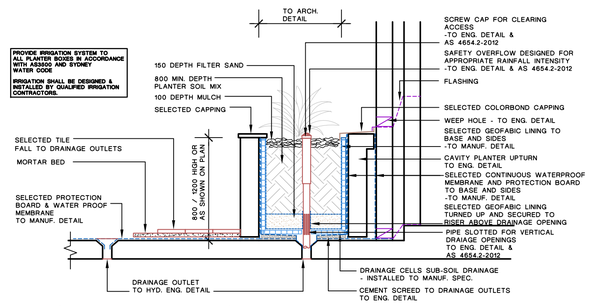
DRAINAGE GRATE

DRAINAGE PIT

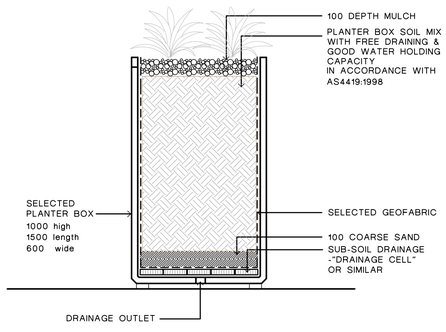
DRAINAGE
REFER TO ENGINEER PLANS FOR DETAILS
NOTE:
PROVIDE SELECTED HEEL GUARD GRATES TO PITS ON TRAFFICABLE AREAS - TO MANUF. DETAIL

ITEM	MATERIAL
	NOTE: ALL SOIL TYPE AS PER AUST NATIONAL LANDSCAPE SUPPLY OR EQUIVALENT AND SHALL BE IN
SOIL DETAIL 1 & 2	ACCORDANCE WITH AS 4419 AND AS 4454 FOR SOIL CONDITIONERS A COMPOSTS
LAWN AREA	1st QUALITY TOP SOIL
NATIVE GARDEN BED	NATIVE GARDEN MIX
EXOTIC GARDEN BED	ORGANIC GARDEN MIX
PLANTER BOX	IN PLANTER BOX MIX ACCORDANCE WITH AS4419:1998 & AS3743
MULCH	**SELECTED HARD WOOD CHIP** SHALL BE IN ACCORDANCE WITH AS 4454
PLANT MATERIAL	**AS PER PLANT SCHEDULE** REFER TO DETAIL 2
GARDEN EDGE	**SELECTED METAL EDGING OR AS SELECTED** REFER TO DETAIL 1
FENCE	
SIDES & REAR BOUNDARY BF1800	1800 HIGH LAPPED & CAPPED TIMBER FENCE OR 1800 HIGH COLOURBOND UNLESS THE TYPE OF MATERIAL IS STIPULATED IN ANY FLOOD STUDY PREPARE FOR THE SITE
POTS / TROUGHS	**QUATRO DESIGN PLANTER** http://www.quatrodesign.com.au OR SIMILAR
	1500 square tall civic planter 1500 x 1500 x 1000H
	900 tall square planter 900 x 900 x 700H
	1500 narrow 1000 tall planter 1500 x 600 x 1000H
IRRIGATION	PROVIDE DRIP IRRIGATION SYSTEM TO ALL PLANTER BOXES IN ACCORDANCE WITH AS3500 AND SYDNEY WATER CODE IRRIGATION SHALL BE DESIGNED & INSTALLED BY QUALIFIED IRRIGATION CONTRACTORS.





3. TYPICAL TERRACE / AGAINST BUILDING WALL PLANTER BOX DETAIL



4. TYPICAL PLANTER TROUGH DETAIL

NOTE :
INSTALLATION OF SUB-SOIL DRAINAGE SHALL BE AS PER MANUFACTURER'S DETAILS & SPECIFICATION

REV	DESCRIPTION	REVISION DATE
D	AMEND AS PER NRAR LETTER	13.9.21
C	AMEND AS PER ARCH CHG	6.9.21
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PROPOSED PLANT SCHEDULE

IN ACCORDANCE WITH AS 2303: 2015

CODE	BOTANICAL NAME	COMMON NAME	APPROX MATURED HEIGHT	POT SIZE	QUANTITY
GROUND COVER / BOARDER					
2	Lomandra 'TANIKA'	Dwarf Lomandra	0.75	150mm	82
4	Liriope muscari 'Just Right'	Just Right Liriope	0.5	150mm	70
5	Dianella tasmanica 'Destiny'	Destiny Flax Lily	0.4	150mm	74
6	Juncus usitatus	Common Rush	0.6	150mm	79
7	Phormium Chocomint Mist	Chocomint Mist	0.5	150mm	11
8	Crassula 'blue bird'	Crassula	0.3	150mm	31
LOW SHRUBS					
13	Pultenaea parviflora	Bush Pea	1	200mm	38
18	Dodonaea viscosa 'Purpurea'	Purple-leafed Hop bush	2	200mm	26
19	Acmena "Allyn's Magic'	Lilly pilly	1.5	200mm	12
20	Westringia Wynyabbie Gem	Wynyabbie Gem	1.2	200mm	16
TALL SHRUBS					
25	Syzygium Superior	Superior Lilly pilly	3	200mm	3
28	Pittosporum tenuifolium 'Silver Sheen'	Pittosporum Silver Sheen	3	200mm	28
30	Syzygium 'Cascade'	Cascade Lilly Pilly	2.5	200mm	
FEATURE SHRUBS					8
31	Cordyline stricta	Slander palm lily	3	200mm	16
32	Doryanthus excelsa	Gymea lillly	1.2	200mm	5
33	Yucca rostrata 'Sapphire Skies'	Blue yucca	2	25 L	2
35	Cordyline 'Red Sensation'	Red Sensation	1.2	25 L	3
39	Thysanolaena maxima	Tiger grass	1.5	200mm	4
TREES					
41	Callistemon viminalis	Weeping bottlebrush	6	45 L	2
42	Glochidion ferdinandi	Cheese Tree	7	25 L	1
43	Elaeocarpus reticulatus	Blueberry Ash	8	45 L	6
44	Tristaniopsis laurina 'Luscious'	Water gum	8	45 L	2
47	Plumeria rubra	frangipani	4	45 L	1
48	Magnolia 'Teddy Bear'	Magnolia	5	45 L	4
53	Eucalyptus pilularis	Blackbutt	20	75 L	3

NOTE:

THE TREES SHALL COMPLY WITH NATSPEC SPECIFYING TREES:
A GUIDE TO ASSESSMENT OF TREE QUALITY (2003) OR AUSTRALIAN STANDARD AS 2303 - 2015 TREE STOCK FOR LANDSCAPE USE.

HEIGHT AND SPAN ARE INDICATIVE ONLY.SUBJECT TO ON SITE ENVIRONMENTAL FACTORS. USE ONLY AS A GUIDE.

PROPOSED MULTI DWELLING HOUSING

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vision dynamics pty ltd.
landscape design
8 Blaxland Road
Killara NSW 2071
m:0412 282 888
Ph:(02) 9499 8888 Fax:(02) 9499 8899
em : visiondynamics @ westnet.com.au

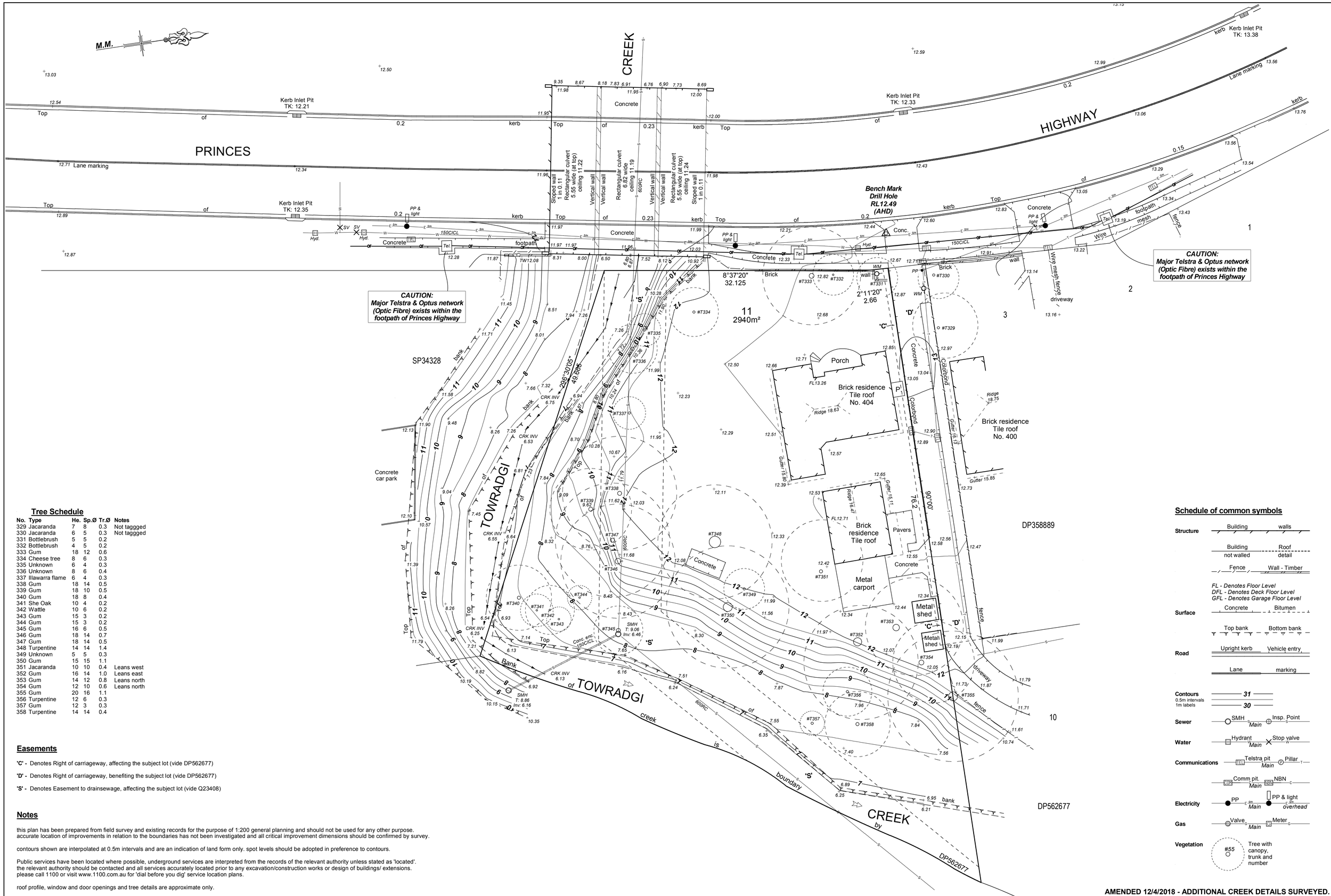
DRAWING TITLE
LANDSCAPE CONCEPT PLAN

DRAWN FF | SCALE 1 : 150@A1 OR 1:300@A3 | REV. D

DRAWING NUMBER 21137 DA 2-2

MEMBER
Fona Fong
Associate Member
Australian Institute Landscape Designers & Managers Ltd of Membership No. 193

NORTH



Tree Schedule

No.	Type	He.	Sp.Ø	Tr.Ø	Notes
329	Jacaranda	7	8	0.3	Not taggged
330	Jacaranda	6	5	0.3	Not taggged
331	Bottlebrush	5	5	0.2	
332	Bottlebrush	4	5	0.2	
333	Gum	18	12	0.6	
334	Cheese tree	8	6	0.3	
335	Unknown	6	4	0.3	
336	Unknown	8	6	0.4	
337	Illawarra flame	6	4	0.3	
338	Gum	18	14	0.5	
339	Gum	18	10	0.5	
340	Gum	18	8	0.4	
341	She Oak	10	4	0.2	
342	Wattle	10	6	0.2	
343	Gum	15	3	0.2	
344	Gum	15	3	0.2	
345	Gum	16	6	0.5	
346	Gum	18	14	0.7	
347	Gum	18	14	0.5	
348	Turpentine	14	14	1.4	
349	Unknown	5	5	0.3	
350	Gum	15	15	1.1	
351	Jacaranda	10	10	0.4	Leans west
352	Gum	16	14	1.0	Leans east
353	Gum	14	12	0.8	Leans north
354	Gum	12	10	0.6	Leans north
355	Gum	20	16	1.1	
356	Turpentine	12	6	0.3	
357	Gum	12	3	0.3	
358	Turpentine	14	14	0.4	

Easements

'C' - Denotes Right of carriageway, affecting the subject lot (vide DP562677)

'D' - Denotes Right of carriageway, benefiting the subject lot (vide DP562677)

'S' - Denotes Easement to drainsewage, affecting the subject lot (vide Q23408)

Notes

this plan has been prepared from field survey and existing records for the purpose of 1:200 general planning and should not be used for any other purpose. accurate location of improvements in relation to the boundaries has not been investigated and all critical improvement dimensions should be confirmed by survey.

contours shown are interpolated at 0.5m intervals and are an indication of land form only. spot levels should be adopted in preference to contours.

Public services have been located where possible, underground services are interpreted from the records of the relevant authority unless stated as 'located'. the relevant authority should be contacted and all services accurately located prior to any excavation/construction works or design of buildings/ extensions. please call 1100 or visit www.1100.com.au for 'dial before you dig' service location plans.

roof profile, window and door openings and tree details are approximate only.

Schedule of common symbols

Structure — Building; walls; Building not walled; Roof detail; Fence; Wall - Timber

FL - Denotes Floor Level
DFL - Denotes Deck Floor Level
GFL - Denotes Garage Floor Level

Surface — Concrete; Bitumen; Top bank; Bottom bank

Road — Upright kerb; Vehicle entry; Lane marking

Contours — 0.5m intervals; 1m labels: 31, 30

Sewer — SMH; Main; Insp. Point

Water — Hydrant; Main; Stop valve

Communications — Telstra pit; Main; Pillar; Comm pit.; Main; NBN

Electricity — PP; Main; PP & light; Main; overhead

Gas — Valve; Main; Meter

Vegetation — #55: Tree with canopy, trunk and number

SCALE 1:200 at A1
1:400 at A3

0 1 2 3 4 5 10 15 20 25 30 35 40 45 50 55 60 65 70 75 80

AMENDED 12/4/2018 - ADDITIONAL CREEK DETAILS SURVEYED.

DENNIS SMITH SURVEYS
8 Railway Street Bulli NSW 2516
Ph: 02 4284 9402 Fax: 02 4285 7042
E-mail: info@dssurvey.com.au
Web: www.dssurvey.com.au

PLAN: Contour & Detail Survey
ADDRESS: 404 Princes Highway, Corrimal
TITLE: Lot 11 DP562677
CLIENT: Design Workshop Australia

ORIENTATION: Magnetic Meridian
Origin: DP562677
DATUM: A.H.D.
Origin: PM3278

P.R.: 11264
SCALE 1:200 at A1
DATE: 7 - 6 - 2016
SHEET 1 of 1 (A1)
Drawn: M.J.B. Check: M.S.

404 PRINCES HIGHWAY - CORRIMAL

NORTH POINT

All work to be carried out in accordance with BCA, AS & Council conditions.

 Do not scale off architectural drawings. These notes must be read in conjunction with colours selection for additional details on appliances, PC items & shower sizes shown on plan are inside hob dimensions shower screens to be fitted on inside of hob bulkheads may be required to accommodate drainage lines & steel beams position to be determined on site. Use figured dimensions ONLY, do not scale. Finished ground levels shown on plans are subject to site conditions, all calculated dimensions are subject to site measure during construction & no allowance has been made for shrinkage or milling position of electrical meter to be determined on site in accordance to the turret position front garden tap on meter.

IDRAFT ARCHITECTS
Nominated Architect
Adriaan Winton NSW Architects Registration Board 5347
Dany Chalabi NSW Architects Registration Board 10451
02 9648 8848 | www.idraft.com.au | PO Box 427, Merrylands NSW 2160

NOTES :

DATE	DRAWING DESCRIPTION	ISSUE
06/09/21	DEFERRAL LETTER	C

Drawing Title: **DEMOLITION PLAN & STREETSCAPE**

Client: Auswide

Council: Wollongong City Council

Project: Demolition & construction of a Four (4) Storey RFB development containing 14 units over basement parking

Designed + Drawn: A.W. / P.R / M.T

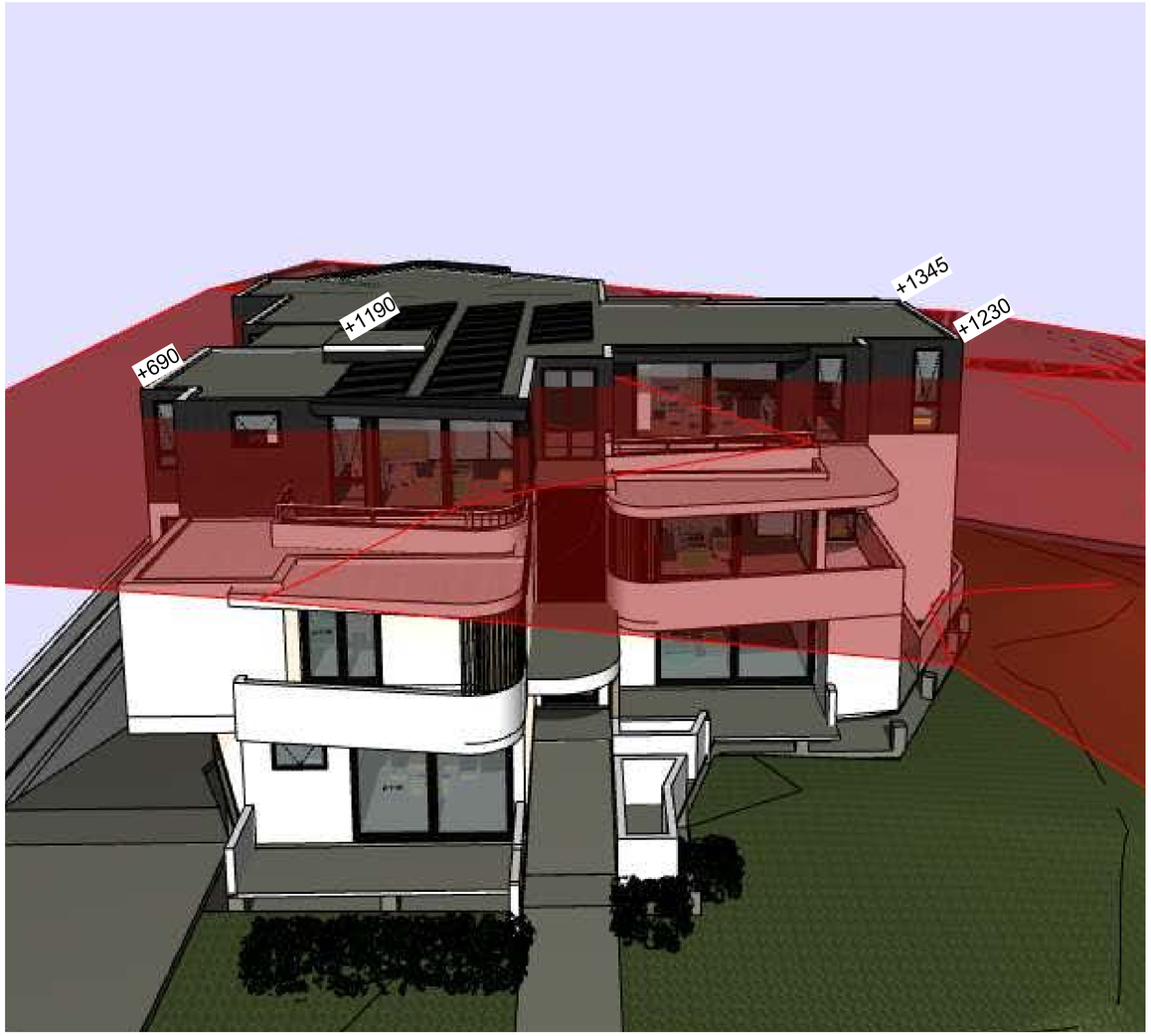
Issue/Stage: **DA - ISSUE C**

Paper/Scale: A2/1:200

Date: 6/09/2021

Job #: **28730**

Dwg #: **0006**



404 PRINCES HIGHWAY - CORRIMAL

NORTH POINT

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02 9648 6648 | www.idraft.com.au | PO Box 427, Merrylands NSW 2160

NOTES :

DATE	DRAWING DESCRIPTION	ISSUE
06/09/21	DEFERRAL LETTER	C

Drawing Title: **HEIGHT PLANE**

Client: Auswide

Council: Wollongong City Council

Project: Demolition & construction of a Four (4) Storey RFB development containing 14 units over basement parking

Designed + Drawn: A.W. / P.R / M.T

Issue/Stage: **DA - ISSUE C**

Paper/Scale: A2/1:57.87, 1:100

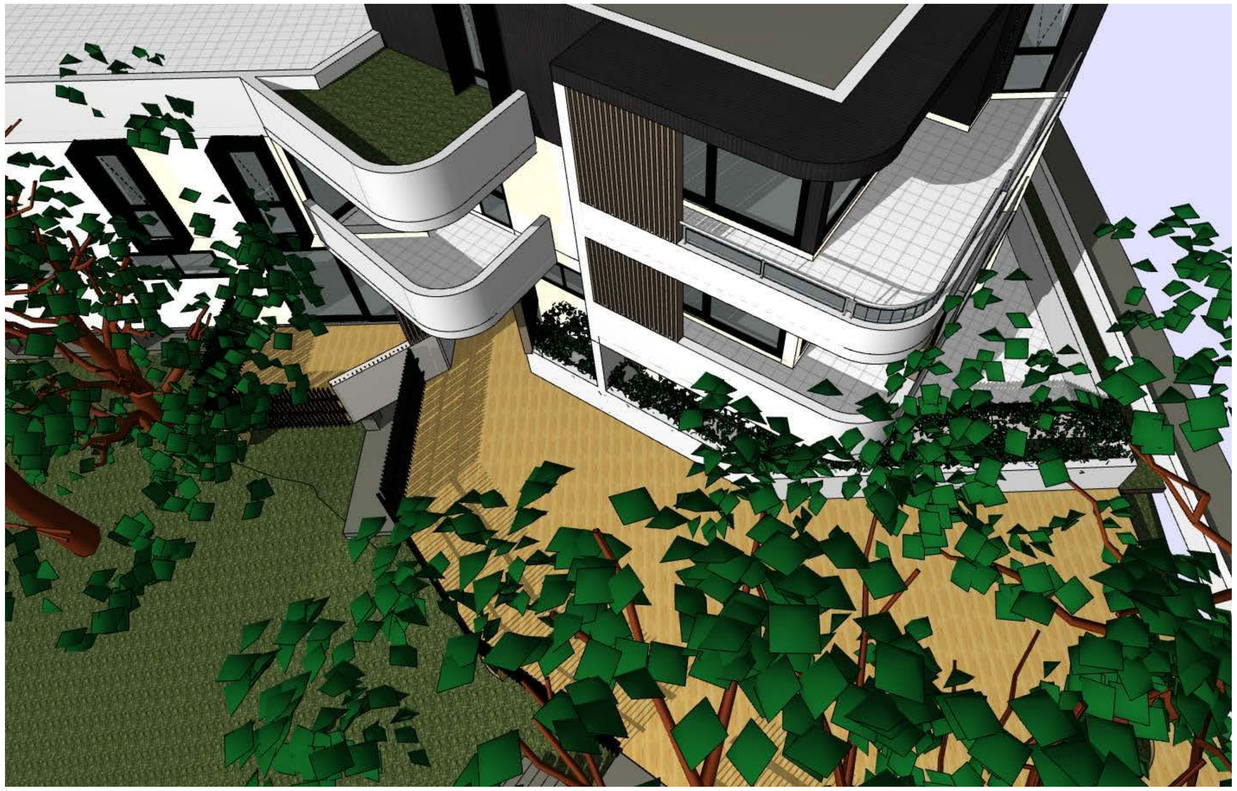
Date: 6/09/2021

Job #: **28730**

Dwg #: **4005**

404 PRINCES HIGHWAY, CORRIMAL

PROPOSED RESIDENTIAL FLAT BULIDING



404 PRINCES HIGHWAY - CORRIMAL

NORTH POINT

IDRAFT ARCHITECTS
Nominated Architect
Adriaan Winton NSW Architects Registration Board 5347
Darry Chalabi NSW Architects Registration Board 10451
02 9548 8848 | www.idraft.com.au | PO Box 427, Merrylands NSW 2160

NOTES :

DATE	DRAWING DESCRIPTION	ISSUE
06/09/21	DEFERRAL LETTER	C

Drawing Title: **COMMUNAL PERSPECTIVE**

Client: Auswide

Council: Wollongong City Council

Project: Demolition & construction of a Four (4) Storey RFB development containing 14 units over basement parking

Designed + Drawn: A.W. / P.R / M.T

Issue/Stage: **DA - ISSUE C**

Paper/Scale: A2/1:125, 1:113.64

Date: 6/09/2021

Job #: **28730**

Dwg #: **4006**

ADG compliance table – 404 Princes Hwy, CORRIMAL

ADG	Design Criteria / Design Guideline	Proposed
Site Analysis	The site and context of this proposal – including its high number of constraints and failures to adequately address them) was discussed extensively at the last DRP meeting (19th January 2021). It was noted at that meeting that *"a comprehensive site analysis has not been included in the documentation provided pre-meeting for review by the Panel. While the Panel did receive the site analysis plan when it was presented at the meeting, it is clear that only scant analysis of the site and its context has been made. Long elevations are misleading, with ground level interfaces not drawn. Vital information is missing from plans and elevations (such as levels, accurately drawn trees, adjoining buildings, fences, services etc) making a full appraisal of the scheme impossible."* In conclusion the Panel recommended *"that any revised proposal for the site must commence with a thorough context and site analysis. The ADG Appendix 1 specifies what should be included, how it should be prepared and why it should become the basis for a development proposal. In addition, plans, elevations and sections must include site boundaries, levels, existing services and trees, adjoining properties (including buildings and trees), creek and vegetation, additional natural features and other site qualities, opportunities and constraints essential to understanding impacts, compliances and design qualities of the proposal. Refer to ADG Part 1 and Part 3A."* No further site or context analysis has been provided; this is very difficult to understand, given the Panel's clear recommendations. In addition, adjoining buildings are not drawn on plans or sections; adjoining buildings, trees and landscape features such as the creek are not drawn on elevations or sections; and no informed diagrams indicate how the built form has been proposed let alone modified. The proposal therefore fails to meet its contextual requirements, which include demonstrating a sound understanding of the site, developing design principles based on that site understanding and preparing a design response that intelligently responds to the chief constraints and opportunities of the site.	• *Three separate analysis has been provided in Urban context analysis, LEP site analysis and local context has been considered by the design.* • *The adjacencies that may arise by virtue of future development potential are considered.* • *Integration into an otherwise low-rise streetscape is grappled with the design presenting varied floor plate footprints up the height of the building giving opportunity for a complex form with balconies further carved from the massing of the building and recessive top floor. These techniques assist to break down the solidity of the development giving it a varied form.* • *Traffic flow and pedestrian networks for movement are considered and approached in a clear, logical manner.* • *Continuing the passage of trees and retention across the rear of the site, with removal of two trees. Vehicular access has been retained in same location increased width to allow for two way traffic. This interrupts three street trees but a greening of the proposed new trees to replace front to maintain passage and western solar relief.* • *An extension of elevations, sections and streetscape has been considered to provide overall relationship between existing surrounding context.*

Bulk and Scale	At the last DRP meeting, the proponent was told that the proposal is *"too bulky and does not sit well with adjacent built form, which generally appears to sit well below tree height and features one and two storey dwellings with large hipped roofs"*. In response to the Panel's advice that *"the height of the proposal be restricted to two levels only plus roof"*, the proposal has been lowered substantially, but kept at three levels. No articulated design response to the proposal's two storey context has been demonstrated. In failing to show adjacent built form, trees or natural features, it is difficult to gauge from elevations if the revised bulk is more responsive to its context or not. While the built form has been lowered, it is not explained how the ground level is able to be lowered to RL 12.350, when the Panel understands the PMF to be 13.10. The panel cannot support habitable spaces proposed below the PMF. Although it was noted previously that *"the roof is expressed as single slab without any covering material, slope or drainage - an inadequate description at DA Stage"*, the roof is still shown as a single slab without roof falls or space for insulation. While a lift overrun is now shown on drawings, compared to typical practice, it appears insufficiently tall to function. Contrary to previous advice, the plan form of the building fails to capitalise on the key features of the site and still includes units facing the vehicular driveway. Although shown on drawings, it is noted that the proposed built form does not sit within the "15m setback from natural resources" required by Council. Site and Context analysis to ADG (see above) should clearly demonstrate how physical, regulatory and other constraints have been considered in arriving at the building envelope and footprint. Built form issues continue within the building. Service cupboards are indifferently located along the circulation corridor, reducing the entry's visual and physical amenity and creating a place of concealment. Most apartments do not include formal entries. Both bedrooms of the ground level north western unit feature full height windows directly facing the vehicular driveway unit.	• *We acknowledge the panels concern relating to two storey form and we've considered the following:* • *The building form has been retained at 3 storeys as the design of T-shape built form allows units orientate north to maximum solar and views to riparian corridor. The southern leg of building is setback from Princes Hwy further 6.8m to 6m primary front setback.* • *Upper most floors (level 2) replanned and further recessed from Princes Hwy by 3m to balconies* • *Reduction to 14 apartments, and introduction of communal open area at the rear facing Towradgi Creek* • *Level 2 change in materials to Colorbond minorb finish to be darker recessive appearance* • *The services elements have been minimised and integrated into the overall roof and building design by the selection of similar paint finishes.* • *Minimised visual intrusiveness of service elements.*
Density	As previously advised, *"with significant site constraints greatly reducing the developable portion of the site and so many built form, amenity and compliance issues evident in the proposal, it is not demonstrated that the proposed density can be accommodated on the site"*.	• *Density FSR is 0.42:1 well below the permitted Floor space permitted.* • *Reduction from 15 apartments to 14 apartments has been proposed*
Sustainability	It is noted that solar panels have been added to the revised proposal. Further opportunities exist for further sustainability measures include water capture for irrigation and WSUD to prevent irrigated water discharging into the creek system. Any further design development should demonstrate consideration and inclusion of ADG Part 4U-X objectives. **4U Energy Efficiency** Passive solar lighting and natural ventilation to optimise heat storage in winter and reduce heat transfer in summer.	• *The proposed residential units have been designed for optimal energy efficiency, reducing reliance on artificial lighting and cooling using passive ventilation throughout the building design.* • *The proposal aims to promote a high standard of environmental performance incorporating the use of ecologically sustainable development principles including:* • *Orientation of apartments to maximise access to natural light, natural cross ventilation and aspect* • *Use of construction materials that contributes to thermal mass such concrete slabs, concrete prefabricated panels and double-glazing.* • *Native and drought tolerant vegetation will form part of the soft and hard landscaping plan. Landscape spaces are laid out for maximum solar access, natural ventilation, water and planting management. Maintain vegetation will also be designed to modify the external wind direction to enhance ventilation and cool incoming air.* • *Use of solar screening devices as required to minimise use of high energy consumption*

		cooling systems • *Low energy fixtures and fittings will be implemented* • *A 40Kw PV power generator is designed for inclusion above Level 12 at the Rooftop.*
	4V Water management and Conservation *Reduce mains consumption and reduce the quantity of storm water runoff*	• *The Civil / Flood Engineer has designed a detention system to slow the flow of stormwater and lessen it's impact upon existing infrastructure.* • *Stormwater filers by oceans protect were designed within the on-site detention tank to treat, clean and filter water from any pollutants prior to discharging into the natural creek system* • *No water retention system or re-cycling of water is provided for.* • *Apartments will be separately metered.*
	4W Waste management *Supply waste management plan* *Allocate waste storage area*	• *A Waste Management Plan will address the demolition, construction and ongoing phases of the development.* • *Bin storage will be provided adjacent to Creek, off Princes Hwy in a suitable location for residents.*
	4X Building Maintenance *To ensure long life and ease of maintenance for the development.*	• *Maintenance has been addressed as follows:* • *The majority of windows are located adjacent to windows for ease of access.* • *The facade materials are durable and low maintenance.* • *The roof is accessible for maintenance with the provision of internal service ladders (from level 12) to comply with Australian Standards and OH&S.* • *Landscape elements are appropriate for the site condition, with the selection of, native, low maintenance plantings and hardscape.*

Landscape

Co-ordination + Area Calculations:

There appear to be discrepancies between the architectural plans and the landscape plans. One particular discrepancy is the tree along the Princes Hwy noted to be removed on the architectural drawings but retained on the landscape plans. These must be resolved so an accurate depiction of the design can be assessed. All built and hard elements of landscape proposals should be co-ordinated with, and shown on the architectural drawings. This includes works to nature strip up to the kerb-line.

The communal open space calculations are unclear with the 830m2 proposed to be provided not evident in the design. Only areas that are accessible and usable should be counted as COS for a development of this type.

Areas in the VMP should not be regarded as COS given the current scheme shows no access to it or activation.

The deep soil zone calculations are unclear with the 898m2 proposed too narrow to be calculable in some locations.
It is also unclear how the required landscape area, and the proposed landscape area – both noted as equal to 30% - can be accurately recorded given they are shown to be 882m2 and 724m2 respectively.

Ground Floor:

It appears the rear of the site is unsecured and accessible by anyone entering the site from the Princes Hwy. A strategy to secure the site in this regards, and similarly with regards to safety being maintained the steep rear of the site / creek, should be proposed that does not rely on the use of excessive fencing.

The narrow lawn strip between unit G01 and the public domain is unusable. Consideration should be given to making this planting. The POS to G01 also falls within the front set back which needs to be resolved. The semi-circular lawn outside unit G05 is likewise unusable and invites anyone to enter the site.

It is not clear how the bin enclosure is treated to prevent smell issues for unit G05.

The rear COS is poorly planned. The majority of space is used for circulation and therefore not contributing to meaningful and usable space. The fence alignment and spatial arrangement feels arbitrary and should respond better to the architecture and site conditions.

Noise and visual privacy between the rear units and the COS is also compromised by the current design

With only fourteen units, the development would be better served by providing a usable COS designed for a large cross section of users, rather than a children's playground. Furthermore it divides the space awkwardly; therefore, it should be removed.

The bike racks are poorly located, making it difficult for anyone with a bike to access.

While the approach set out within the Biosis VMP is understood and supported in principle, it is unclear how this is delineated or integrated with the COS design; how access for maintenance or passive use is provided; and how solar access can be achieved for the COS.

Level 2:

It is not explained how waterproofing, insulation, adequate falls and drainage can be achieved for the Level 2 COS within a 3m floor to floor height without breaching ADG ceiling height guidelines.

The Level 2 COS is extremely limited in terms of program variety. Given the ground floor already provides sets of tables and chairs, could this roof garden (or conversely the GF COS) have different types of uses. The GF and L2 should be considered as a suite of spaces complementary to each other.

Given its open rectangular layout, more work needs to be done to create spaces / rooms that provide opportunity for singles, couples or small groups to use. Planters could be used to define and separate spaces.

- *Communal open space areas occur as follows:*
- *Both Ground floor and Level 2 communal space faces north east and benefits from morning sun.*
- *Communal space is for the residents*
- *Communal spaces are given wider dimensions than 3m and forms part of usable decking and landscape areas*
- *Communal areas on terraces are landscaped with pergola shade structures over. BBQ facilities may be incorporated into the final design.*
- *Communal areas are planned to include some seating.*
- *Micro climate comfort has been considered. Solid handrail infill panels prevent and divert wind gusts from directly sweeping across balcony terraces.*
- *Communal open space is visible from the main lift egress points and adjoining ground floor east facing apartments. A point in the building with greatest numbers of people passing by. Casual surveillance is assisted by this.*
- *These areas are to be made available for use after daylight, and lighting of these spaces is to be included.*
- *All apartments on ground floor and level 2 adjacent to common area surrounded with planters around the perimeter.*
- *Calculations have been provided on 3 scenarios given usability of Towradgi Creek*
- *Scenario 1, Based on full site area*
- *Scenario 2, Based on top of bank*
- *Scenario 3, Based on RL12*

SITE AREA	LANDSCAPE AREA (30%)		COMMUNAL OPEN SPACE (25%)	
	REQUIRED	PROVIDED	REQUIRED	PROVIDED
2911M2 TOTAL SITE AREA	873.3M2	2124M2	727.75M2	168 +93 + 204 = 465 USABLE / LANDSCAPE
2224M2 TOP OF BANK	667.2M2	1429M2	556M2	168 +93 + 204 = 465 USABLE / LANDSCAPE
1314M2 RL 12.00	394.2M2	520M2	328.5M2	168 +93 + 204 = 465 USABLE / LANDSCAPE

- *In all 3 scenarios the landscape requirements far exceed the minimum landscape areas.*
- *Although communal area only meets requirement based on RL 12.00*
  - *Unit 01(2B), Courtyard 18m2 (Exceed x1.8)*
  - *Unit 02(1B), Courtyard 12m2 (Exceed x1.5)*
  - *Unit 03 (3B), Courtyard 42m2(Exceed x3.5)*
  - *Unit 04 (2B), Courtyard 13m2(Exceed x1.3)*
  - *Unit 05 (2B), Courtyard 19m2(Exceed x1.9)*
  - *Unit 06 (2B), Balcony 12m2(Exceed x1.2)*
  - *Unit 07 (1B), Balcony 12m2(Exceed x1.5)*
  - *Unit 08 (3B), Balcony 19m2(Exceed x1.58)*

		➢ *Unit 09 (3B), Balcony 14m2(Exceed x1.16)* ➢ *Unit 10 (3B), Balcony 20m2(Exceed x1.66)* ➢ *Unit 11 (1B), Balcony 12m2 (Exceed x1.5)* ➢ *Unit 12 (2B), Balcony 11m2(Exceed x1.1)* ➢ *Unit 13(2B), Balcony 19m2(Exceed x1.9)* ➢ *Unit 14(2B), Balcony 14m2(Exceed x1.4)* *Overall private open spaces exceed x1.64 times. Considering this is a small boutique development as average larger private open space areas ensures a better amenity to each apartment to offset any short fall of communal should the assessment be based on overall site or top of bank.* *Should the calculations landscape area and communal to be considered from top of bank, the difference in levels does not allow for use as communal area therefore a better relationship with communal area and landscape if the assessment is based on site area bounded by RL12.00 as reference on 0011 of the architectural set.*
Amenity	See comments above regarding : - lack of response in layout to key site qualities - flooding issues due to ground level being lower than PMF - non compliance with 15m natural resources setback - lack of entry spaces to individual units - full height bedroom facing vehicular driveway - no roof fall or drainage to roof - communal open space issues (see Landscape) - Access to COS not resolved or accessible - ADG compliant solar access to southern apartment needs to be confirmed, supported by sun-eye diagrams. - Available daylight to and outlooks from habitable rooms warrants further consideration on this heavily treed site.	• *Site contextual analysis as stated above to illustrate locality surroundings* • *Flooding response, please refer to Flood engineer letter* • *NRAR has accepted the footprint diagram as stated email 25th May. Please reference page 4007 of the architectural set* • *Entry into apartments have been reconsidered* • *Highlight windows applied to windows overlooking driveway* • *Roof fall shown on roof plan* • *Communal open space is accessible in accordance with AS1428 both ground and Level 2* • *Solar diagrams have been updated* • *Careful consideration of window location, balconies screens, and window screen ensures that visual and acoustic privacy is maintained.* • *Internal circulation has been minimised in all apartments, whilst providing generous and articulated circulation spaces, with detailed consideration of kitchens, laundry and bathroom layouts to ensure long term livability.*
Safety	Flooding issues appear to be unresolved. The SEE claims compliance with Councils flood evacuation requirements. Regardless, the panel cannot support a proposal where PMF floods ground floor habitable areas to a depth of ~750 mm, together with the whole of the basement.It is still not clear if there is a roller shutter or other form of barrier to basement car parking. A BCA report should inform any design development. Potential safety issues noted include egress, fire separation of openings,	• *Carpark facilities are controlled via roller door entry with transitions into the interior through enclosed lobbies.* • *Bollards are indicated to the front of lifts servicing the carpark.* • *Upper level apartments have balconies that address the street front and provide casual surveillance opportunities.*

	climbable balcony balustrades and access for persons with a disability .	• *The application of screens, glass and solid walls are further given visual interest by the high level of planting envisaged for the site.* • *Nooks and niches are otherwise avoided, with the building's walls for the most part built out to the boundary line.* • *No fencing at street level is integrated into the proposal however communal area and courtyards are secured by gate*
Housing Diversity	Context and neighbourhood analysis should identify the housing precedents in the area and the appropriateness of the design mix of the proposal.	• *Contextual analysis has shown housing diversity especially adjoining department of housing units at 402 Princes Hwy. Refer to page 0006 and 0008*
Aesthetics	The new proposal appears not to have responded to previous Panel comments, which include : - *the building appears not to have any compatibility with neighbouring buildings, which feature large hipped roofs above two level massing – at most.* - *without adjacent context, trees and any description of the site's topography and other landscape features, it is hard to gauge the materiality and expression of the proposal…as presented, the building language appears very harsh and crude, with little relationship with the natural ground or sensitivity to the adjacent creek landscape.* - *a revised design should remove one level and incorporate a well designed roof; perhaps a low hipped roof with large overhangs would introduce a more shady relaxed character, more compatible with locality and responsive to its riparian landscapes.* - *fenestration design generally needs to demonstrate factors such as solar shading, spread of fire, and outlook opportunities have been adequately considered.*	• *This has been highlighted earlier in context analysis.* • *The building elements have been designed with regard to the elements, textures, materials and colours of the existing neighbourhood with the desire to transform and rejuvenate the local character according to the urban renewal plans. Thorough context analysis has been undertaken as well as an analysis of the desired future character that intends to rejuvenate the current industrial and suburban context as part of the initiative to transform the local area.* • *Materials have also incorporated upper storey change to provide recessive appearance with monument miniorb finish*

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DESIGN VERIFICATION STATEMENT

For a Residential Development at

404 princes Highway Corrimal

September - 2020

Nominated Architect Adriaan Winton NSW Architects Registration Board 5347

Unit 43, 2 Slough Avenue
Silverwater NSW 2128
Correspondence to: PO Box 6370 Silverwater NSW 2128

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Introduction:

This Design Verification Statement accompanies a Development Application for the demolition of existing dwellings and the construction of a 3storey Residential flat building and associated basement car parking

The development consists of 15 units contained within one multi storied building.

The development content is as follows.
2 Bed 12 Units
3 Bed 3

27 Car parking spaces

This statement verifies that Adriaan Winton directed the design of the project and that the proposed development adheres to the design principles set out in Part 2 of State Environmental Policy No 65- *"Design Quality of Residential Flat Development* and certifies that the proposed building satisfies those principals.

Principle 1:
Context and neighbourhood character

SEPP 65: *Good design responds and contributes to its context. Context is the key natural and built features of an area, their relationship and the character they create when combined. It also includes social, economic, health and environmental conditions. Responding to context involves identifying the desirable elements of an area's existing or future character. Well-designed buildings respond to and enhance the qualities and identity of the area including the adjacent sites, streetscape and neighbourhood. Consideration of local context is important for all sites, including sites in established areas, those undergoing change or identified for change*

Comment*:* The site of the proposed development is located in the area controlled by Wollongong Local Environmental Plan 2009 (FLEP)

The subject area is Zone R2 Low Density Residential. Residential flat buildings are permissible in the zone.

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Principle 2: Built form and scale

SEPP 65: *Good design provides an appropriate scale in terms of the bulk and height that suits the scale of the street and the surrounding buildings.*

Good design also achieves an appropriate built form for a site and the building's purpose in terms of building alignments, proportions, building type, articulation and the manipulation of building elements. Appropriate built form defines the public domain, contributes to the character of streetscapes and parks, including their views and vistas, and provides internal amenity and outlook.

Comment: The scale of development in the precinct is proposed to be of buildings of variable height primarily low rise in height. The proposed site is in a precinct that is planned for revitalization. The site is located within close proximity to the Corrimal Town Centre and regular bus services to the town centre

The proposed development responds and conforms to the height and building form Proposed for the precinct and would allow for future developments on adjoining sites to achieve their full potential.

The building may be termed a "Big House" type, and relates to the existing built form in the area due to its roof design, recessed bays, fenestration , materials, texture and colour. The building addresses the street with a major façade which is aligned with the form of the street. The built form of the development relates to other built forms allowed in the DCP for the precinct. The overall affect is to create a building that presents a very effective and architectural building within the streetscape.

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Principle 3: Density

SEPP 65**:** *Good design has a density appropriate to its site and its context, in terms of floor space yields (or numbers of units or residents). Appropriate densities are sustainable and are consistent with the existing density in an area or, in precincts undergoing a transition, are consistent with the stated desired future density. Sustainable densities respond to the regional context, availability of infrastructure, public transport, community facilities and environmental quality.*

Comment: The precinct with in the area controlled by Wollongong Local Environmental Plan 2009 and the Wollongong Development Control Plan 2009

The density of the development complies with the allowable density in the planning codes for the area. Given the location of the development in relation to the Cabramatta town centre, retail facilities and community facilities and the rising demand for housing in the area, the proposed density is appropriate and consistent with the requirements as outlined *Wollongong Development Control Plan 2009*

Principle 4: Sustainability

SEPP 65: *Good design combines positive environmental, social and economic outcomes. Good sustainable design includes use of natural cross ventilation and sunlight for the amenity and liveability of residents and passive thermal design for ventilation, heating and cooling reducing reliance on technology and operation costs. Other elements include recycling and reuse of materials and waste, use of sustainable materials and deep soil zones for groundwater*

Comment: The proposed development is consistent in the application of through flow ventilation and solar access to the units. Of the 15 units in the development 13 units (86%) have the required solar access and through flow ventilation. There are no units which have a sole southerly aspect; the units which have a southerly aspect have primary living space facing west or east. The orientation of the building on the site and the design of the units all contribute substantially to the solar passive design and energy efficiency of the development.

The proposed development has been Nathers and Basix assessed and scores well in all required categories of water, thermal comfort and energy. Energy efficiency is aided by the use of water/energy efficient fittings, appliances and lighting.

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Principle 5: Landscape

SEPP 65: *Good design recognizes that together landscape and buildings operate as an integrated and sustainable system, resulting in attractive developments with good amenity. A positive image and contextual fit of well-designed developments is achieved by contributing to the landscape character of the streetscape and neighbourhood.*

Good landscape design enhances the development's environmental performance by retaining positive natural features which contribute to the local context, coordinating water and soil management, solar access, micro-climate, tree canopy, habitat values and preserving green networks. Good landscape design optimizes usability, privacy and opportunities for social interaction, equitable access, respect for neighbours' amenity and provides for practical establishment and long term management

Comment: The proposed development forms part of the Residential precinct,

The current development upon the site provides many areas of landscaping and deep soil promoting healthy growth of large tress.

The proposed development provides 458sqm (23%) deep soil, 1860sqm (63%) landscaping and communal open space of 736 sqm (25%). The landscaped open space which will promote healthy growth of large tress. The landscaping provided will contribute to the enjoyment of these areas.

Principle 6: Amenity

SEPP 65: *Good design positively influences internal and external amenity for residents and neighbours. Achieving good amenity contributes to positive living environments and resident well-being. Good amenity combines appropriate room dimensions and shapes, access to sunlight, natural ventilation, outlook, visual and acoustic privacy, storage, indoor and outdoor space, efficient layouts and service areas and ease of access for all age groups and degrees of mobility.*

Comment: Apartments is a mixture of 2 and 3 bedroom apartments. Cross ventilation is achieved for 13 (86%) of the apartments.
13(86%) of apartments have the required solar access. Where apartments are exposed to direct western summer sun sliding louver/shading panels have been provided.

Privacy is ensured by the side setbacks to the side boundaries. The building complies with the setbacks as recommended in the SEPP 65 design code and the requirements outline in DCP. Where there are perceived direct observation potentials the design of the building tries to ensure the windows in conflict have the required offset.

Each dwelling has its own external private open space which is more than adequate.

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Bathrooms/Ensuite are accessed from the hallways leading to the bedrooms. Kitchens are accessed from the primary living area.

Visual and acoustic privacy is acceptable and able bodied access is through entry lobbies at the ground floor.

Disabled access is gained to the ground floor via a pedestrian path (which complies with ASNZ 1428.1-2001) from the street. There are the required number of apartments which are adaptable these are located on levels 1 and 2 all units within the development are accessible via the lifts. The car spaces are located in the basement car parking with easy access to the lift.

Principle 7: Safety

SEPP 65: *Good design optimizes safety and security within the development and the public domain. It provides for quality public and private spaces that are clearly defined and fit for the intended purpose. Opportunities to maximize passive surveillance of public and communal areas promote safety.*

A positive relationship between public and private spaces is achieved through clearly defined secure access points and well-lit and visible areas that are easily maintained and appropriate to the location and purpose

Comment: Public and communal spaces are overlooked on all sides by balconies, terraces and windows from primary living rooms of the project. The building addresses the public domain with glazed doors and balconies.

The communal spaces will be adequately lit and are void of areas that may be subjectable to criminal activities

The building will have safe and secure access to the carpark. The lift to the building will be a security lift providing access to the residential levels.

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Principle 8: Housing Diversity and Social Interaction

Good design achieves a mix of apartment sizes, providing housing choice for different demographics, living needs and household budgets.

Well-designed apartment developments respond to social context by providing housing and facilities to suit the existing and future social mix. Good design involves practical and flexible features, including different types of communal spaces for a broad range of people and providing opportunities for social interaction among residents.

Comment: The proposed residential use is appropriate to the location of this site, as it is located within close proximity Corrimal Town Centre and to Bus routes that service the Cabramatta transport interchange and community facilities such as local clubs, baby health centre and community centre.

The proposed development has an appropriate mix of 2 and 3 bedrooms apartments of varied size, as a result it provides a social mix which is well suited and appropriate to the area.

Principle 9: Aesthetics

SEPP 65: *Good design achieves a built form that has good proportions and a balanced composition of elements, reflecting the internal layout and structure. Good design uses a variety of materials, colours and textures. The visual appearance of a well-designed apartment development responds to the existing or future local context, particularly desirable elements and repetitions of the streetscape.*

Comment: The form and composition of this design relate to proposed developments in the precinct in terms of its roof type, modulation of facade, fenestration, materials, texture and colour.

The use of detail and texture and the high degree of articulation in the façade composition has the result of creating an interesting and high quality building which sits well in the precinct and compliments the existing streetscape

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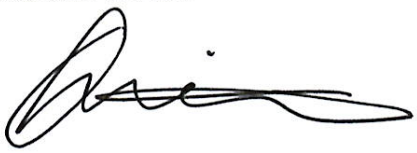
Conclusion

This proposed development provides a complimentary and interesting addition to the Princess Highway streetscape and the Corrimal town centre and surrounding area in its built form, height, scale and density comply with DCP controls is consistent with what is allowable for the precinct.

Its landscape design includes substantial deep soil planting of large trees and low scale planting. The development is well suited to its site and its location.

The proposed development will provide a positive contribution to the environment, population and social interaction of the existing precinct

Adriaan Winton



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Attachment 3 - Apartment Design Guide Assessment

Standards/controls	*Comment*	*Compliance*
Part 1 – Identifying the context **1A Apartment building types**	The proposal is 3 storey residential flat building containing a total of 14 units.	Yes
1B Local character and context This guideline outlines how to define the setting and scale of a development, and involves consideration of the desired future character, common settings and the range of scales.	The strategic local character and future desired character of the site is set by Wollongong LEP 2009 (R2 Low Density Residential Development), Wollongong DCP 2009 (Chapters D1 Character Statement). Clauses are assessed in detail in the assessment report and at Attachment 5.	Not satisfactory
1C Precincts and individual sites Individual sites: New development on individual sites within an established area should carefully respond to neighbouring development, and also address the desired future character at the neighbourhood and street scales. Planning and design considerations for managing this include: - Site amalgamation where appropriate - Corner site and sites with multiple frontages can be more efficient than sites with single frontages - Ensure the development potential for adjacent sites is retained - Avoid isolated sites that are unable to realise the development potential.	Though the site has a lengthy frontage to Princes Highway it is constrained with several factors. Proposal failed to satisfactorily address the potential impact on neighbouring sites from flooding. Building height above the permitted height for the locality is not considered consistent with the neighbourhood and streetscape surrounded by low density residential developments of single and double storeys	No

Standards/controls	*Comment*	*Compliance*
Part 3 Siting the development		
3A Site analysis		
Site analysis uses the following key elements to demonstrate that design decisions have been based on opportunities and constraints of the site conditions and their relationship to the surrounding context: - Site location plan - Aerial photograph - Local context plan - Site context and survey plan - Streetscape elevations and sections - Analysis A written statement explaining how the design of the proposed development has responded to the site analysis must accompany the development application.	Submitted Site and context analysis has not satisfactorily addressed the design intent based on the site constraints and lacks sufficient analysis with its relationship in a larger context beyond the location of the site.	Not satisfactory
3B Orientation		
Buildings must be oriented to maximise northern orientation, response to desired character, promote amenity for the occupant and adjoining properties, retain trees and open spaces and respond to contextual constraints such as overshadowing and noise.	While majority of the units have northern orientation solar access to the southern units are not correctly represented. Amenity and design of open spaces are considered poor due to the limitations associated with site constraints and overdevelopment of site.	Not satisfactory
Objective 3B-1: *Building types and layouts respond to the streetscape and site while optimising solar access within the development* Design Guidance - Buildings should define the street by facing it and providing direct access.	Most units faces away from the street. The entrance is reasonably legible. The scale of the building is considered excessive and does not adequately responds to the desired future character sought to be achieved in the precinct as defined by the planning controls (maximum floor space ratio proposed within a restricted building foot print area due to site constraints, height, and building setbacks).	
Objective 3B-2 *Overshadowing of neighbouring properties is minimised during mid- winter* Design Guidance - Overshadowing should be minimised to the south or downhill by increased		Yes

Standards/controls	*Comment*	*Compliance*
upper level setbacks - Refer sections 3D & 4A below for solar access requirements - A minimum of 4 hours of solar access should be retained to solar collectors on neighbouring buildings **<u>3C Public domain interface</u>** Key components to consider when designing the interface include entries, private terraces or balconies, fences and walls, changes in level, services locations and planting. The design of these elements can influence the real or perceived safety and security of residents, opportunities for social interaction and the identity of the development when viewed from the public domain <u>*Objective 3C-1:*</u> *Transition between private and public domain is achieved without compromising safety and security* <u>Design Guidance</u> - Terraces, balconies and courtyards should have direct street entry, where appropriate - Changes in level between private terraces etc above street level provide surveillance and improved visual privacy for ground level dwellings. - Front fences and walls along street frontages should use visually permeable materials and treatments. The height of solid fences or walls should be limited to 1m. - Opportunities should be provided casual interaction between residents and the public domain eg seating at building entries, near letterboxes etc <u>*Objective 3C-2:*</u> *Amenity of the public domain is retained and enhanced* <u>Design Guidance</u> - Planting softens the edges of any raised terraces to the street (eg basement podium) - Mailboxes should be located in lobbies	The raising of the floor height necessitated by the flooding requirements has not been dealt with in terms of access. Residential balconies mostly face away from the street frontage, providing less opportunities for natural surveillance. Additionally, the amenity and design of the COS is poor (COS is provided on decks). Garbage storage is on the ground level and located close to unit 5, no details provided in addressing issues with odour or noise. Location of substation not accurately shown on the plans to assess the design quality. Mailboxes located within the residential lobby.	Not satisfactory

Standards/controls	*Comment*	*Compliance*
perpendicular to street alignment or integrated into front fences. - Garbage storage areas, substations, pump rooms and other service requirements should be located in basement car parks. - Durable, graffiti resistant materials should be used - Where development adjoins public parks or open space the design should address this interface.		
<u>3D Communal and public open space</u> <u>*Objective 3D-1*</u> *An adequate area of communal open space is provided to enhance residential amenity and to provide opportunities for landscaping* <u>Design Criteria</u>		No
1. Communal open space (COS) minimum area equal to 25% of the site (735m²)	COS provided is deficient by 204sqm considering the whole site area (same area used for the purpose of calculating the proposed FSR).	
2. 50% direct sunlight provided to principal usable part of communal open space for a minimum of 2 hours between 9am and 3pm on 21 June	The communal open space will be partially overshadowed from the building itself and the existing vegetation. The areas are not considered to receive unobstructed sunlight for min 2hrs between 9am and 3pm as required.	
<u>Design Guidance</u> - Communal open space should be consolidated into a well-designed, usable area. - Minimum dimension of 3m - Should be co-located with deep soil areas	The amenity and design of the COS is poor, providing two decks at different levels. These spaces are no child friendly and do not account for anything beyond sitting and BBQ. Open green areas are not overly large to be considered as COS.	
- Direct & equitable access required - Where not possible at ground floor it should be located at podium or roof level.	Direct and equitable access is not provided as one of the decks is located on Level 2 crossing other units' front doors.	
<u>*Objective3D-2*</u> *Communal open space is designed to allow for a range of activities, respond to site conditions and be attractive and inviting*	Activities are restricted within the limited space.	
<u>Design guidance</u> - Facilities to be provided in communal open spaces for a range of age groups,	Provision made for a BBQ, casual seating and possible outdoor dining provided. No child friendly as play equipments and other activities are lacking due to the site	

Standards/controls	*Comment*	*Compliance*
and may incorporate seating, barbeque areas, play equipment, swimming pools *Objective 3D-3* *Communal open space is designed to maximise safety* Design guidance - Communal open space should be visible from habitable rooms and POS areas and should be well lit. **3E Deep soil zones** *Objective 3E-1* *3E-1 Deep soil zones provide areas on the site that allow for and support healthy plant and tree growth. They improve residential amenity and promote management of water and air quality.* Design Criteria: 1. Deep soil zones are to meet the following minimum requirements: Site area / Minimum dimensions / Deep soil zone (% of site area) less than 650m² / - / 7% 650m² - 1,500m² / 3m greater than 1,500m² / 6m greater than 1,500m² with significant existing tree cover / 6m Design guidance: - Deep soil zones should be located to retain existing significant trees. **3F Visual privacy** *Objective 3F-1* *Adequate building separation distances are shared equitably between neighbouring sites, to achieve reasonable levels of external and internal visual amenity.* Design Criteria: 1. Minimum required separation distances from buildings to the side and rear boundaries are as follows:	limitations. The COS on both levels are totally isolated towards the rear of the development and not highly visible from other units. There is DSZ provided within the VMP area. Though 6m setback is not achieved on the northern side to the balconies	Yes No

Standards/controls	Comment	Compliance

Building height	Habitable rooms and balconies	Non-habitable rooms
up to 12m (4 storeys)	6m	3m
up to 25m (5-8 storeys)	9m	4.5m
over 25m (9+ storeys)	12m	6m

Design Guidance

- Direct lines of sight should be avoided
- No separation is required between blank walls

Objective 3F-2:

Site and building design elements increase privacy without compromising access to light and air and balance outlook and views from habitable rooms and private open space

Design Guidance

- Communal open space, common areas and access paths should be separated from private open space and windows to apartments. Design solutions include:
  - Setbacks,
  - Solid or partly solid balustrades to balconies
  - Fencing or vegetation to separate spaces
  - Screening devices
  - Raising apartments/private open space above the public domain
  - Planter boxes incorporated into walls and balustrades to increase visual separation
  - Pergolas or shading devices to limit overlooking
  - Only on constrained sites where it's demonstrated that building layout opportunities are limited – fixed louvres or screen panels
- Windows should be offset from the windows of adjoining buildings

3G Pedestrian access and entries

Objective 3G-1

Building entries and pedestrian access

Not satisfactory

Standards/controls	*Comment*	*Compliance*
connects to and addresses the public domain Design Guidance - Multiple entries should be provided to activate the street edge. - Buildings entries should be clearly identifiable and communal entries should be clearly distinguishable from private entries. *Objective 3G-2* *Access, entries and pathways are accessible and easy to identify* Design Guidance - Building access areas should be clearly visible from the public domain and communal spaces - Steps and ramps should be integrated into the overall building and landscape design. *Objective 3G-3* *Large sites provide pedestrian links for access to streets and connection to destinations* **3H Vehicle access** *Objective 3H-1* *Vehicle access points are designed and located to achieve safety, minimise conflicts between pedestrians and vehicles and create high quality streetscapes* Design Guidance - Car park entries should be located behind the building line - Access point locations should avoid headlight glare to habitable rooms - Garbage collection, loading and service areas should be screened - Vehicle and pedestrian access should be clearly separated to improve safety. - Where possible, vehicle access points should not dominate the streetscape and be limited to the minimum width possible.	Single pedestrian entry is provided. Building access points are visible from the public domain and COS. Ramp to the front door is provided. However the safety regarding its slope is not clearly demonstrated. Internal access corridor to the bin storage is identified as an area of entrapment. Pedestrian links from COS and waste storage are provided close to the units on the southern side that could cause amenity issues. Proposed basement car park entry is behind the building line. The proposed driveway location is acceptable Satisfactory referral comments received from Council's traffic engineer	Satisfactory
3J Bicycle and car parking	Adequate vehicle, motor bike and bicycle parking provided	Yes

Standards/controls	*Comment*	*Compliance*
<u>*Objective 3J-2*</u> *Parking and facilities are provided for other modes of transport* <u>Design Guidance</u> - Conveniently located and sufficient numbers of parking spaces should be provided for motorbikes and scooters - Secure undercover bicycle parking should be provided that is easily accessible from both the public domain and common areas. <u>*Objective 3J-3*</u> *Car park design and access is safe and secure* <u>Design Guidance</u> - Supporting facilities within car parks (garbage rooms, storage areas, car wash bays) can be accessed without crossing parking spaces - A clearly defined and visible lobby or waiting area should be provided to lifts and stairs. - Permeable roller doors allow for natural ventilation and improve the safety of car parking areas by enabling passive surveillance. <u>*Objective 3J-4*</u> *Visual and environmental impact of underground car parking are minimised* <u>Design Guidance</u> - Excavation should be minimised through efficient carpark layouts and ramp design. - Protrusion of carparks should not exceed 1.0m above ground level. - Natural ventilation should be provided to basement and sub-basement car parking areas. - Ventilation grills or screening devices should be integrated into the façade and landscape design. ***Part 4 – Designing the building - Amenity*** **<u>4A Solar and daylight access</u>** <u>*Objective 4A-1*</u>	Basement layout is appropriate with regard to safety and security. Basement car park walls are to be built well within the site boundaries. Car park layout appears to be reasonably efficient. Satisfactory referral comments received from Council's traffic engineer	Not satisfactory

Standards/controls	*Comment*	*Compliance*
To optimise the number of apartments receiving sunlight to habitable rooms, primary windows and private open space Design Criteria 1. Living rooms and private open spaces of at least 70% of apartments in a building receive a minimum of two (2) hours direct sunlight between 9am and 3pm in mid-winter in Wollongong LGA. 2. A maximum of 15% of apartments in a building receive no direct sunlight between 9am and 3pm at mid-winter Design Guidance - The design maximises north aspect and the number of single aspect south facing apartments is minimised - To optimise the direct sunlight to habitable rooms and balconies, the following design features are used: Dual aspect, Shallow apartment layouts Bay windows - To maximise the benefit to residents, a minimum of $1m^2$ of direct sunlight measured at 1m above floor level, is achieved for at least 15 minutes. *Objective 4A-2* *Daylight access is maximised where sunlight is limited* Design Guidance - Courtyards, skylights and high level windows (sill heights of 1500m or greater) are used only as secondary light sources in habitable rooms *Objective 4A-3* *Design incorporates shading and glare control, particularly for warmer months* Design Guidance Design features can include: - Balconies - Shading devices or planting - Operable shading - High performance glass that minimises external glare	Solar access is identified limited to the south-western lots. The applicant has provided evidence that at least 78% (11/14) of the units can achieve appropriate solar access (living rooms and private open spaces receive a minimum of 2 hours sunlight between 9am-3pm mid-winters.) Sun eye view access diagrams are not correctly represented. It appears that south-western unit has the potential to achieve two hours due to a lack of enclosure on the balcony. Sunlight is limited within the COS area.	
4B Natural ventilation		Yes

Standards/controls	*Comment*	*Compliance*
Objective 4B-1 *All habitable rooms are naturally ventilated.* Design Guidance - A building's orientation should maximise the prevailing winds for natural ventilation in habitable rooms - The area of unobstructed window openings should be equal to at least 5% of the floor area served. - Doors and openable windows should have large openable areas to maximise ventilation. *Objective 4B-2* *The layout and design of single aspect apartments maximises natural ventilation* Design Guidance - Single aspect apartments should use design solutions to maximise natural ventilation. *Objective 4B-3* *The number of apartments with natural cross ventilation is maximised to create a comfortable indoor environment for residents* Design Criteria: 1. 60% of apartments are naturally cross ventilated in the first nine storeys 2. Overall depth of a cross-over or cross-through apartment does not exceed 18m, measured glass line to glass line.	Units have been generally been designed to achieve cross ventilation.	
4C Ceiling heights *Objective 4C-1* *Ceiling height achieves sufficient natural ventilation and daylight access* Design Criteria 1. Minimum 2.7m for habitable rooms and 2.4m for non-habitable rooms *Objective 4C-2* *Ceiling height increases the sense of space in apartments and provides for well-proportioned rooms* *Objective 4C-3* *Ceiling height contribute to the flexibility of building use over the life of the building*	Minimum 2.7m floor to ceiling height in all living areas.	Yes

Standards/controls	*Comment*	*Compliance*
4D Apartment size and layout *Objective 4D-1* *The layout of rooms within an apartment is functional, well organised and provides a high standard of amenity* Design Criteria: 1. Minimum internal areas: 2 bed – 70m^2 3 bed – 90m^2 The minimum internal areas include only 1 bathroom. Additional bathrooms increase the minimum internal areas by 5m^2 each. A fourth bedroom and further additional bedrooms increase the minimum internal by 12m^2. 2. Every habitable room must have a window in an external wall with a total minimum glass area of at least 10% of the floor area of the room *Objective 4D-2* *Environmental performance of the apartment is maximised* Design Criteria: 1. Habitable room depths are limited to a maximum of 2.5 x ceiling height 2. In open plan layouts (where the living, dining and kitchen are combined) the maximum habitable room depth is 8m from a window. Design Guidance: - Greater than the minimum ceiling heights can allow proportionate increases in room depths. - Where possible, bathrooms and laundries should have an external openable window. - Main living spaces should be oriented towards the primary outlook. *Objective 4D-3* *Apartment layouts are designed to accommodate a variety of household activities and needs* Design Criteria: 1. Master bedrooms have a minimum area of 10m^2 and other bedrooms 9m^2 (excl wardrobe space) 2. Bedrooms have minimum dimension of 3m (excl wardrobe) 3. Living rooms have minimum width of: - 3.6m for studio and 1 bed apartments	All units achieve compliance with the minimum internal areas specified. All habitable rooms have adequate windows. Habitable room depths comply. Unit depths comply 2.7m ceiling heights proposed. All living areas and bedrooms are located on the external face of the building. Bedroom and living room dimensions are adequate.	Yes

Standards/controls	*Comment*	*Compliance*
4E Private open space and balconies *Objective 4E-1* *Apartments provide appropriately sized private open space and balconies to enhance residential amenity* 1. Minimum balcony depths are: <table><tr><th>Dwelling type</th><th>Minimum area</th><th>Minimum depth</th></tr><tr><td>Studio apartments</td><td>4m²</td><td>-</td></tr><tr><td>1 bedroom apartments</td><td>8m²</td><td>2m</td></tr><tr><td>2 bedroom apartments</td><td>10m²</td><td>2m</td></tr><tr><td>3+ bedroom apartments</td><td>12m²</td><td>2.4m</td></tr></table>The minimum balcony depth to be counted as contributing to the balcony area is 1m. 2. Ground level apartment POS must have minimum area of 15m² and min. depth of 3m *Objective 4E-2* *Primary private open space and balconies are appropriately located to enhance liveability for residents* Design Guidance - Primary private open space and balconies should be located adjacent to the living room, dining room or kitchen to extend the living space. - POS & Balconies should be oriented with the longer side facing outwards to optimise daylight access into adjacent rooms. *Objective 4E-3* *Primary private open space and balcony design is integrated into and contributes to the overall architectural form and detail of the building* Design Guidance - A combination of solid and transparent materials balances the need for privacy with surveillance of the public domain - Full width glass balustrades alone are not desirable - Operable screens etc are used to control sunlight and wind, and provide increased privacy for occupancy while allowing for storage and external clothes drying.	All balcony areas achieve the minimum area and depth requirements except Unit 10 All ground level apartments POS achieve the minimum required. POS of all units are located adjoining and accessible from living/dining areas. Adequate solar access appears to be available to the private open space areas. Balconies designed to articulate the façade.	Not satisfactory

Standards/controls	*Comment*	*Compliance*
Objective 4E-4 *Private open space and balcony design maximises safety* Design Guidance - Changes in ground levels or landscaping are minimised.		
4F Common circulation and spaces *Objective 4F-1* *Common circulation spaces achieve good amenity and properly service the number of apartments.* Design Criteria 1. The maximum number of apartments off a circulation core on a single level is eight 2. For buildings of 10 storeys and over, the maximum number of apartments sharing a single lift is 40.	maximum of 5 apartments per level serviced off a single lift.	
Design Guidance - Long corridors greater than 12m in length should be articulated through the use of windows or seating. - Primary living rooms or bedroom windows should not open directly onto common circulation spaces, whether open or enclosed. Visual and acoustic privacy from common circulation spaces should be controlled.	The corridor leading to the bin storage is an area of entrapment with no external windows. No living or bedroom window openings to common circulation spaces.	Not satisfactory
Objective 4F-2 *Common circulation spaces promote safety and provide for social interaction between residents* Design Guidance: - Incidental spaces can be used to provide seating opportunities for residents, and promotes opportunities for social interaction.	Daylight and natural ventilation are provided to common circulation areas.	Not satisfactory
4G Storage *Objective 4G-1* *Adequate, well designed storage is provided in each apartment* 1. In addition to storage in kitchens, bathrooms and bedrooms, the following storage is provided	Overall storage provision is compliant.	Yes

Standards/controls	*Comment*	*Compliance*
<table><tr><th>Dwelling type</th><th>Storage size volume</th></tr><tr><td>Studio apartments</td><td>4m³</td></tr><tr><td>1 bedroom apartments</td><td>6m³</td></tr><tr><td>2 bedroom apartments</td><td>8m³</td></tr><tr><td>3+ bedroom apartments</td><td>10m³</td></tr></table> At least 50% of the required storage is to be located within the apartment <u>*Objective 4G-2*</u> *Additional storage is conveniently located, accessible and nominated for individual apartments* <u>Design Guidance:</u> - Storage not located within apartments should be allocated to specific apartments. **<u>4H Acoustic privacy</u>** <u>*Objective 4H-1*</u> *Noise transfer is minimised through the siting of buildings and building layout* <u>Design Guidance</u> - Adequate building separation is required (see also section 3F above). - Noisy areas within buildings should be located next to or above each other and quieter areas next to or above quieter areas. - Storage, circulation areas and non-habitable rooms should be located to buffer noise from external sources. - Noise sources such as garage doors, plant rooms, active communal open spaces and circulation areas should be located at least 3m away from bedrooms. <u>*Objective 4H-2*</u> *Noise impacts are mitigated within apartments through layout and acoustic treatments* <u>Design Guidance</u> - In addition to mindful siting and orientation of the building, acoustic seals and double or triple glazing are effective methods to further reduce noise transmission.	Individual secure storage units proposed for each unit; Noisy rooms within each unit are located adjacent or above similar rooms. Waste storage area in located close to the units on ground floor as well as COS and pedestrian circulation paths. Internal layout provides for appropriate internal acoustic amenity within individual units.	Not satisfactory Yes

Standards/controls	*Comment*	*Compliance*
4J Noise and pollution *Objective 4J-1* *In noisy or hostile environments the impacts of external noise and pollution are minimised through the careful siting and layout of buildings* Design Guidance - Minimise impacts through design solutions such as physical separation from the noise or pollution source, *Objective 4J-2* *Appropriate noise shielding or attenuation techniques for the building design, construction and choice of materials are used to mitigate noise transmission* Design guidance: - Design solutions include limiting openings to noise sources & providing seals to prevent noise transfer.	The external environment is not considered to be hostile and noisy.	Yes
Part 4 – Designing the building - Configuration		
4K Apartment mix *Objective 4K-1* *A range of apartment types and sizes is provided to cater for different household types now and into the future* Design guidance - A variety of apartment types is provided - The apartment mix is appropriate, taking into consideration the location of public transport, market demands, demand for affordable housing, different cultural/social groups - Flexible apartment configurations are provided to support diverse household types and stages of life *Objective 4K-2* *The apartment mix is distributed to suitable locations within the building* Design guidance - Larger apartment types are located on the ground or roof level where there is potential for more open space and on corners where more building frontage is available	Variety of apartment type provided	Yes

Standards/controls	*Comment*	*Compliance*
4L Ground floor apartments *Objective 4L-1* *Street frontage activity is maximised where ground floor apartments are located* Design guidance - Direct street access should be provided to ground floor apartments - Activity is achieved through front gardens, terraces and the facade of the building. - Ground floor apartment layouts support small office home office (SOHO) use to provide future opportunities for conversion into commercial or retail areas. In these cases provide higher floor to ceiling heights and ground floor amenities for easy conversion *Objective 4L-2* *Design of ground floor apartments delivers amenity and safety for residents* Design guidance - The design of courtyards should balance the need for privacy of ground floor apartments with surveillance of public spaces. Design solutions include: • elevation of private gardens and terraces above the street level by 1-1.5m (see figure 4L.4) • landscaping and private courtyards • window sill heights that minimise sight lines into apartments • integrating balustrades, safety bars or screens with the exterior design - Solar access should be maximised through: • high ceilings and tall windows • trees and shrubs that allow solar access in winter and shade in summer	Ground floor access to the street is provided in the design.	Satisfactory
4M Facades *Objective 4M-1* *Building facades provide visual interest along the street while respecting the character of the local area* Design guidance - To ensure that building elements are integrated into the overall building form	ADG response from DRP (below) is not addressed - a revised design should remove one	No

Standards/controls	*Comment*	*Compliance*
and façade design - The front building facades should include a composition of varied building elements, textures, materials, detail and colour and a defined base, middle and top of building. - Building services should be integrated within the overall facade - Building facades should be well resolved with an appropriate scale and proportion to the streetscape and human scale. - To ensure that new developments have facades which define and enhance the public domain and desired street character.	level and incorporate a well-designed roof; perhaps a low hipped roof with large overhangs would introduce a more shady relaxed character, more compatible with locality and responsive to its riparian landscapes.	
<u>*Objective 4M-2*</u> *Building functions are expressed by the facade* <u>Design guidance</u> - Building entries should be clearly defined		
<u>4N Roof design</u> <u>*Objective 4N-1*</u> *Roof treatments are integrated into the building design and positively respond to street* <u>Design guidance</u> - Roof design should use materials and a pitched form complementary to the building and adjacent buildings.	The roof design is not appropriate (see comments above section 4M).	No
<u>*Objective 4N-2*</u> *Opportunities to use roof space for residential accommodation and open space are maximised* <u>Design guidance</u> - Habitable roof space should be provided with good levels of amenity. - Open space is provided on roof tops subject to acceptable visual and acoustic privacy, comfort levels, safety and security considerations		
<u>*Objective 4N-3*</u> *Roof design incorporates sustainability*		

Standards/controls	*Comment*	*Compliance*
features Design guidance - Roof design maximises solar access to apartments during winter and provides shade during summer		
4O Landscape design *Objective 4O-1* *Landscape design is viable and sustainable* Design guidance - Landscape design should be environmentally sustainable and can enhance environmental performance - Ongoing maintenance plans should be prepared *Objective 4O-2* *Landscape design contributes to the streetscape and amenity* Design guidance - Landscape design responds to the existing site conditions including: • changes of levels • views • significant landscape features	Landscape design is not satisfactory. Advice received from Council's Landscape indicate that the landscaping is not satisfactory.	No
4P Planting on Structures *Objective 4P-1* *Appropriate soil profiles are provided* Design guidance - Structures are reinforced for additional saturated soil weight - Minimum soil standards for plant sizes should be provided in accordance with Table 5 *Objective 4P-2* *Plant growth is optimised with appropriate selection and maintenance* Design guidance - Plants are suited to site conditions *Objective 4P-3* *Planting on structures contributes to the quality and amenity of communal and public open spaces* Design guidance	Terrace planting proposed	

Standards/controls	*Comment*	*Compliance*
- Building design incorporates opportunities for planting on structures. Design solutions may include: • green walls with specialised lighting for indoor green walls • wall design that incorporates planting • green roofs, particularly where roofs are visible from the public domain • planter boxes		
4V Water management and conservation		Not satisfactory
Objective 4V-1		
Potable water use is minimised	The applicant has obtained a BASIX certificate.	
Objective 4V-2	Despite the site's location alongside a riparian corridor there seems to be little to no Water Sensitive design considered within the project.	
Urban stormwater is treated on site before being discharged to receiving waters	The design is not satisfactory for the required flood mitigation and management.	
Design guidance		
- Water sensitive urban design systems are designed by a suitably qualified professional		
Objective 4V-3		
Flood management systems are integrated into site design		
Design guidance		
- Detention tanks should be located under paved areas, driveways or in basement car parks		
4W Waste management		No
Objective 4W-1		
Waste storage facilities are designed to minimise impacts on the streetscape, building entry and amenity of residents		
Design guidance		
- Common waste and recycling areas should be screened from view and well ventilated	The applicant proposes waste storage attached to the building between units. Amenity to these units and residents will be impacted. Submission lacks details on enclosure and ventilation of this room.	
Objective 4W-2		
Domestic waste is minimised by providing safe and convenient source separation and		

Standards/controls	*Comment*	*Compliance*
recycling		

ANNEXURE 1: CLAUSE 4.6 VARIATION REQUEST - BUILDING HEIGHT

The Numerical Height Departure

Clause 4.3(2) of the Wollongong LEP states that:

(2) The height of a building on any land is not to exceed the maximum height shown for the land on the Height of Buildings Map.

The Height of Buildings Map (HOB_024) identifies a maximum building height of 9m for the subject site.

The building is 3 storeys in height and has a maximum height that exceeds the standard by 0.69m (Front)-1.345m (Rear) which is a maximum of 14.94% of the standard.

This is reflected on the 3D height lines on the plans but of key importance is that the building footprint is only covering 20% of the site- a function of the 'compressed' building envelope owing to the site configuration and constraints. The image below shows the footprint on the site which is modest- and the key reason for the height departure- in conjunction with the flooding affectation that necessitates the raised levels and the void in the slab.

Land and Environment Case Law

The decision by Chief Judge Preston in a judgement dated 14 August 2018 in the matter of *Initial Action Pty Ltd v Woollahra Council* confirmed that the absence of impact was a suitable means of establishing grounds for a departure and also confirmed that there is no requirement for a development that breaches a numerical standard to achieve a '*better outcome'.*

However recent developments in the law in ***RebelMH Neutral Bay Pty Limited v North Sydney Council*** **[2019] NSWCA 130** have set out to confirm that the approach taken in *Al Maha Pty Ltd v Huajun Investments Pty Ltd* [2018] NSWCA 245 ('***Al Maha***') is also relevant.

In simple terms, Al Maha requires that a Clause 4.6 departure will have only adequately addressed Clause 4.6(3) if the consent authority is satisfied the matters have been demonstrated in the Clause 4.6 request itself- rather than forming a view by the consent authority itself. This Clause 4.6 request demonstrates the matters if Clause 4.6 (3).

The key tests or requirements arising from recent judgements is that:

- The consent authority be satisfied the proposed development will be in the public interest because it is "*consistent with*" the objectives of the development standard and zone is not a requirement to "*achieve*" those objectives. It is a requirement that the development be compatible with the objectives, rather than having to 'achieve' the objectives.

- Establishing that 'compliance with the standard is unreasonable or unnecessary in the circumstances of the case' does not always require the applicant to show that the relevant objectives of the standard are achieved by the proposal (Wehbe "test" 1). Other methods are available as per the previous 5 tests applying to SEPP 1, set out in Wehbe v Pittwater.

- When pursuing a clause 4.6 variation request it is appropriate to demonstrate environmental planning grounds that support any variation ; and

- The proposal is required to be in 'the public interest'.

In relation to the current proposal the keys are:

- Demonstrating that the development remains consistent with the objectives of the building height standard;

- Demonstrating consistency with the R2 Low Density Residential zoning; and

- Satisfying the relevant provisions of Clause 4.6.

Consideration of Clause 4.6

Clause 4.6 of the WLEP 2009 provides that development consent may be granted for development even though the development would contravene a development standard.

This is provided that the relevant provisions of the clause are addressed, in particular subclause 3-5 which provide:

(3) Development consent must not be granted for development that contravenes a development standard unless the consent authority has considered a written request from the applicant that seeks to justify the contravention of the development standard by demonstrating:

(a) that compliance with the development standard is unreasonable or unnecessary in the circumstances of the case, and

(b) that there are sufficient environmental planning grounds to justify contravening the development standard.

(4) Development consent must not be granted for development that contravenes a development standard unless:

(a) the consent authority is satisfied that:

(i) the applicant's written request has adequately addressed the matters required to be demonstrated by subclause (3), and

(ii) the proposed development will be in the public interest because it is consistent with the objectives of the particular standard and the objectives for development within the zone in which the development is proposed to be carried out, and

(b) the concurrence of the Planning Secretary has been obtained.

(5) In deciding whether to grant concurrence, the Planning Secretary must consider;

(a) whether contravention of the development standard raises any matter of significance for State or regional environmental planning, and

(b) the public benefit of maintaining the development standard, and

(c) any other matters required to be taken into consideration by the Planning Secretary before granting concurrence.

Each of these provisions are addressed in turn.

Clause 4.6(3) & Underlying Objectives of the Standard

Compliance with the development standard is unreasonable or unnecessary in the circumstances of the case as the underlying objectives of the control, and the objectives of the zone, are achieved despite the non-compliance to the numerical development standard as set out above, which satisfies Wehbe Test 1.

Compliance unreasonable or unnecessary

The variation to the height development standard is acceptable in the circumstances of the case and compliance with the development standard is considered unreasonable and unnecessary based on the following assessment:

- The variation to maximum building height is in part a result of the site being flood prone. The development is to provide elevated floor levels as a design response to comply with relevant flood requirements, to provide appropriate freeboard levels.

- The building footprint is regulated by the environmental site conditions with the flooding, trees, riparian and creek areas such that the building footprint has been compressed to enable suitable setbacks to these areas and is the rationale through the provision of the additional level on the site- noting the proposal is under the FSR control indicating the development density is suitable.

- The site is a large site and the proposed building is well setback from the street and is compatible with the height of buildings in the immediate precinct.

- The proposal does not result in unreasonable amenity impacts to adjoining properties in terms of privacy, overshadowing or loss of views given that the all shadows are cast within the site;

- The proposal achieves an appropriate separation to adjoining properties and provides an appropriate landscaped corridor;

- The proposal provides appropriate areas for landscaping around the perimeter of the site area and pervious surfaces to accommodate appropriate landscaping and also provide for on-site stormwater detention.

As outlined above the variation to the building height is acceptable in that the development remains consistent with the underlying objectives/aims of the standard notwithstanding the non-compliance.

Clause 4.6(3) & Environmental Planning Grounds

The environmental planning grounds that warrant the departure are as follows:

- The variation is primarily as a result of the flooding potential of the subject site, with the development raising the floor levels above the anticipated 100 year flood level;

- The variation facilitates suitable separation to the creek and riparian areas through a compression of the footprint and provision of an additional level on the building- hence the proposal is a more site responsive outcome owing to the additional height in the context of the sites configuration and constraints;

- The variation also enables suitable restorative works to the riparian areas owing to the relocation of the building footprint to the upper level to enable a smaller total building footprint that enables the restorative works and retention of key trees.

The variation to the height control is consistent with the objective of the R2 Low Density Zone, as it provides for the housing needs of the community within a low density residential environment;

- The proposal is consistent with the R2 zoning and locality by providing appropriate setbacks and landscaping within a large site.

As outlined above the proposal remains consistent with the underlying objectives of the control and as such compliance is considered unnecessary or unreasonable in the circumstances.

The above discussion demonstrates that there are sufficient environmental planning grounds to justify the departure from the control.

As outlined above the proposal remains consistent with the underlying objectives of the control and as such compliance is considered unnecessary or unreasonable in the circumstances. The above discussion demonstrates that there are sufficient environmental planning grounds to justify the departure from the control. This also satisfies Wehbe Test 1.

Clause 4.6(4)- Public Interest and Objectives of the Zone

In accordance with the provisions of Clause 4.6(4) Council can be satisfied that this written request has adequately addressed the matters required to be demonstrated by Clause 4.6(3).

As addressed the proposed development is in the public interest as it remains consistent with the objectives of the building height control. In addition, the proposal is consistent with the objectives of the R2 zone, being:

- *To provide for the housing needs of the community within a low density residential environment.*

- *To enable other land uses that provide facilities or services to meet the day to day needs of residents.*

The proposal is consistent with the objectives of the R2 zone, insofar as the development is not antipathetic to the zone objectives (per *Schaffer Corporation v Hawkesbury City Council (1992) 77 LGRA 21).*

The development is consistent with the zone objectives noting that:

- The development provides for the housing needs of the community
- The development is consistent with the low density residential environment, as a result of;
    - Compliant building setbacks to the front, side and rear boundaries within a large site;
    - The provision of a large portion of the site as landscaped area providing a buffer between the development and the public domain;
    - The development retains the amenity of neighbouring sites and the locality through; appropriate visual and acoustic privacy, and minimal overshadowing as a result of the compliant setbacks and scale of the development.

Clause 4.6(5)

The Secretary (of Department of Planning and Environment) can be assumed to have concurred to the variation. This is because of Department of Planning Circular PS 18–003 'Variations to development standards', dated 21 February 2018. This circular is a notice under 64(1) of the Environmental Planning and Assessment Regulation 2000.

A consent granted by a consent authority that has assumed concurrence is as valid and effective as if concurrence had been given.

The points contained in Clause 4.6 (5) are a matter for consideration by the consent authority however the following points are made in relation to this clause:

- The contravention of the height control does not raise any matter of significance for State or regional environmental planning given the nature of the development proposal

- There is no public benefit in maintaining the development standard as it relates to the current proposal. The departure from the control is acceptable in the circumstances given the underlying objectives of the control are achieved and it will not set an undesirable precedent for future development within the locality as any future development on another site would require consideration of the relevant merits and circumstances of the individual application.

Strict compliance with the prescriptive building height requirement is unreasonable and unnecessary in the context of the proposal and its unique circumstances. The proposed development meets the underlying intent of the control and is a compatible form of development that does not result in unreasonable environmental amenity impacts.

The design response aligns with the intent of the control and provides for an appropriate transition to the adjoining properties.

The proposal promotes the economic use and development of the land consistent with its zone and purpose.

CONCLUSION

Strict compliance with the prescriptive building height requirement is unreasonable and unnecessary in the context of the proposal and its circumstances.

The proposed development meets the underlying intent of the control and is a compatible form of development that does not result in unreasonable environmental amenity impacts.

The proposal will not have any adverse effect on the surrounding locality, which will be characterised by residential development of comparable height and character. The proposal promotes the economic use and development of the land consistent with its zone and purpose.

The variation is well founded and demonstrates the relevant matters set out under Clause 4.6 having regard to the provisions of Clause 4.6 and recent case law and taking into account the absence of adverse environmental, social or economic impacts, it is requested that Council and the planning panel support the development proposal.

Attachment 5 - Wollongong Development Control Plan 2009 Assessment

CHAPTER A1 – INTRODUCTION

8 Variations to development controls in the DCP

Front setback: The proposed development's front setback do not meet the minimum control set by Clause 6.3.2, Chapter B1 Residential Development of DCP2009. For residential flat building minimum front setback is the average of the setbacks of the two adjoining buildings if the difference between the setbacks of the buildings is greater than 2m. The difference in setback to the adjoining buildings is greater than 2 (approx.. 5m- average of 11.5m and 6.6m) hence a front setback of 9m is required. The applicant has proposed min 6m distance to the closest façade of the building.

The variation could have been considered acceptable if assessed for merits considering the reasons outlined in the applicant's SoEE provided the Clause 4.6 departure was acceptable. The reduced setback adds to the adverse impact on streetscape with a building having height above the maximum allowed in the locality. The variation is not supported.

Side setback: Buildings upto 12m in height require a minimum side setback of 6m to a habitable room/balcony on development site. The proposed northern boundary setback varies between minimum 3m to maximum 4.8m to the façade. This non-compliance is considered under Objective 3F Visual Privacy of the Apartment Design Guide. Refer to detailed assessment at Attachment 3. The rear boundary set back complies.

CHAPTER A2 – ECOLOGICALLY SUSTAINABLE DEVELOPMENT

The application submission contains a BASIX Certificate indicating minimum requirements with regard to energy and water efficiency and thermal comfort are met. Generally speaking, the proposal is considered to be consistent with the principles of ecologically sustainable development.

However better Water Sensitive design strategies could have been incorporated within the project as the site is located alongside a riparian corridor.

CHAPTER B1 – RESIDENTIAL DEVELOPMENT

4.0 General Residential controls

Controls/objectives	*Comment*	*Compliance*
4.13 Fire Brigade Servicing • All dwellings located within 60m of a fire hydrant	The subject site can be adequately serviced by fire fighting vehicles in this circumstance.	Yes
4.14 Services • Encourage early consideration of servicing requirements	Water, electricity, sewage and telephone services are already available to the site. It is expected that the existing utility services can be augmented to support the proposed development.	Yes
4.16 View sharing • To protect and enhance view sharing, significant view corridors • A range of view sharing measures to be considered for building design	The proposed development will have minimal impact on view corridors of existing development.	Yes

6 Residential Flat Buildings

It is noted that the proposed residential flat building component of the development is subject to SEPP 65 and as such an assessment of the proposed residential flat building against the ADG is required to be undertaken.

SEPP 65 Clause 6A(2) indicates that in the event that a development control plan contains provisions that specify requirements, standards or controls in relation to a matter to which the ADG applies, those provisions are of no effect. However certain matters in Council's DCP still require assessment against relevant controls for all components of the development.

The proposed development has been considered against the provisions of WDCP 2009 below.

Controls/objectives	Comment	Compliance
6.1 General		
6.2 Minimum Site Width Requirement		
This clause prescribes a minimum site width of 24m for residential flat buildings.	The subject site has a minimum site frontage of approximately 32m along Princes Highway	Yes
6.3 Front Setbacks		
a) The same distance as one or other of the adjoining buildings, provided the difference between the setbacks of the two adjoining dwellings is less than 2.0m. (b) The average of the setbacks of the two adjoining buildings, if the difference between the setbacks of the buildings is greater than 2.0m. (c) A minimum front setback of 6m applies to residential apartment buildings where calculations of a) or b) result in a front setback of less than 6m.	Required min13m (average of setbacks of adjoining buildings) Min 6m to the closest façade/balcony	No(detail assessment of variation under Chapter A1 above)
6.4 Side and Rear Setbacks / Building Separation		
A minimum of 6m is required for buildings up to 4 storeys where a habitable room /balcony faces the boundary.	Northern side setback varies between minimum 3m to 4.8m to the façade, 1.56m to POS/courtyards . See 3F ADG assessment at Attachment 3	No See 3F ADG assessment at Attachment 3
6.5 Built Form		
	The application submission included a Design Verification Statement. The scale of the development is likely to give rise to some visual impacts on the area with the building height over the limit compared to building in the locality. Further comments on built form are provided in the ADG assessment at Attachment 3	No

6.6 Visual privacy		
	The objectives, design criteria and design guidance for visual privacy in residential flat building development are provided in the Part 3 of the ADG.	Not satisfactory See 3F ADG assessment at Attachment 3
6.7 Acoustic privacy		
	The objectives, design criteria and design guidance for acoustic privacy in residential flat building development are provided in the Part 4 of the ADG.	See 4H ADG assessment at Attachment 3
6.8 Car Parking Requirements		
1 car parking space per dwelling (<70m2) or 1.5 car parking spaces per dwelling (70-110m2) or 2 car parking spaces per dwelling (>110m2), plus 0.2 car parking spaces per dwelling for visitors. 1 bicycle space per 3 dwellings (residents) and 1 bicycle space per 12 dwellings (visitors). 1 motorcycle space per 15 dwellings Large Rigid Vehicle (Waste Contractor) >10 dwellings – side loading waste collection vehicle	• 25 car spaces including seven (7)stacked resident parking 2 accessible spaces, and three (3) visitor parking spaces; • 2 motorcycle spaces. • 5 bicycle spaces. Advice received from Council's Traffic Officer indicates that the proposal is considered conditionally satisfactory with regards to Council's car parking requirements.	Yes
6.9 Basement Car Parking		
The roof of the basement podium must not be greater than 1.2m above natural or finished ground level.	The roof of the basement carparking level is 1.1m above natural or finished ground level as shown on the plans.	Yes
6.10 Access Requirements		
	Details of the application were referred to Council's Traffic Officer for comments. Advice received indicates that access arrangements including dimensions and grades are conditionally satisfactory.	Yes
6.11 Landscaping Requirements		
30% of the site area to be provided as landscaping	Details of the application submission including landscaping plans were referred to Council's Landscape and Environment Officers for comment. The proposed landscaping is not considered satisfactory as per the referral advice from landscape officer.	No
6.12 Deep Soil Zone		
15% site area = 441m²	Details of the application submission including landscaping plans and a Vegetation Management Plan (VMP) were referred to Council's Landscape and	Yes

	Environment Officers for comment. No concerns raised on DSZ.	
6.13 Communal Open Space		
Development with more than 10 dwelling must have communal open space calculated at a rate of 5m² per dwelling (540m² req'd)	COS is not compliant when assessed against the ADG requirements. Further comments on Communal Open Space are provided in Part 3D of the ADG assessment at Attachment 3	No
6.14 Private Open Space		
	The objectives, design criteria and design guidance for private open space in residential flat building development are provided in the Part 4 of the ADG.	No (for Unit 10 dimension)See 4E ADG assessment at Attachment 3
6.15 Adaptable Housing		
10% of dwellings must be designed to be capable of adaptation. (Min req'd 0.1 x 108 = 10.8)	2 Units provided capable of adaptation.	Yes
6.16 Access for People with a Disability		
	The proposed development has not satisfactorily addressed Access for People with a Disability in this circumstance. The waste storage area is not accessible as shown in the plans. No revised access report was submitted as part of the submission.	No
6.17 Apartment Size and Layout Mix for Larger Residential Flat Building Developments		
Min 10% studio or 1 BR	Apartment mix has been assessed under Part 4K of ADG assessment at Attachment 3	Yes
6.18 Solar Access		
	See design criteria and design guidance of the ADG for solar and daylight access at Part 4A of ADG assessment at Attachment 3.	See 4A of ADG assessment at Attachment 3
6.19 Natural Ventilation		
	The objectives, design criteria and design guidance for natural ventilation in residential flat building development are provided in the Part 4 of the ADG.	See 4B of ADG assessment at Attachment 3

CHAPTER D1 – CHARACTER STATEMENTS

Corrimal

Chapter D1 indicates that the lower density residential areas of Corrimal will retain their low density character and replacement of some older dwelling stock will occur with newer two storey dwelling-houses. Any new building should be designed to be sympathetic with the prevailing streetscape and

any adjoining dwelling-house, especially an inter-war bungalow. The desired future character in Chapter D1 encourages residential uses for all parts of the Corrimal and higher density mixed use retail, commercial office and residential apartment development to be orientated towards Princes Highway, Railway Street and Underwood Street.

The proposal is considered to have impacts on the existing and desired future character for the locality. The bulk and scale of the 3- storey development is considered to have uncharacteristic impacts to the streetscape. The proposal is not considered to be consistent with the existing and desired future character for the locality.

CHAPTER E1: ACCESS FOR PEOPLE WITH A DISABILITY

An amended Access Consultants report was not submitted with the revised design. Compliance to the requirement with regards to Access for People with a Disability is not demonstrated in this circumstance.

CHAPTER E2: CRIME PREVENTION THROUGH ENVIRONMENTAL DESIGN

The objectives and requirements under the chapter is not assessed in detail as the final submission is not considered acceptable to be supported. However it is noticed that matters related to bin room and area of entrapment is still not satisfactorily addressed with this submission.

CHAPTER E6: LANDSCAPING

The proposed landscape plan was referred to Council's Landscape Officer and is not considered supportive as the impact on trees are not satisfactorily addressed with the submitted Arborist report.

CHAPTER E7: WASTE MANAGEMENT

Council's Traffic Officer has reviewed the proposal providing conditionally satisfactory referral advice.

CHAPTER E12 GEOTECHNICAL ASSESSMENT

The application has been reviewed by Council's Geotechnical Engineer in relation to site stability and the suitability of the site for the development. No concerns were raised.

CHAPTER E13 FLOODPLAIN MANAGEMENT

Council's Stormwater Officer has reviewed the final submission and raised concerns that the flood related issues identified with assessment from the initial design proposal still remains unresolved.

CHAPTER E14 STORMWATER MANAGEMENT

Council's Stormwater Officer has reviewed the proposal and raised no significant concerns related to stormwater drainage.

CHAPTER E17 PRESERVATION AND MANAGEMENT OF TREES AND VEGETATION

The application proposes the removal of several trees to facilitate the proposal. Council's Landscape have assessed the application submission and has raised concerns on possible impacts to the trees that are to be retained trees on site.

CHAPTER E18 THREATENED SPECIES

The application submission has been assessed in regards to threatened species. The site is partially mapped under this clause in the north east portion of the site. Whilst the proposed development will slightly encroach into the mapped area, it is considered acceptable as all significant trees within the area are proposed to be retained and the riparian corridor restored. The proposal is not expected to impact on these values as the development is located mostly within the existing cleared area. All significant trees are proposed to be retained and the riparian corridor is to be revegetated and weeds managed.

CHAPTER E19 EARTHWORKS (LAND RESHAPING WORKS)

The proposal involves excavation to facilitate the basement car parking. A geotechnical report and information regarding the earthworks to reshape the land were submitted with the application.

The application was referred to Council's Stormwater, Geotechnical and Environment Officers for comment. The flood affectation and risk associated with the excavation and impacts were not considered satisfactorily addressed as raised in the Stormwater officer's advice.

CHAPTER E20 CONTAMINATED LAND MANAGEMENT

A Stage 1 Contamination Assessment, Stage 2 – Detailed Site Investigation Report (DSI) and Amended Interim Site Audit Letter have been submitted and found acceptable by Council's Environment Officer.

CHAPTER E21 DEMOLITION AND ASBESTOS MANAGEMENT

The proposal includes demolition works which is considered acceptable.

WOLLONGONG DEVELOPMENT CONTROL PLAN 2009

The Wollongong Development Control Plan (DCP) is a set of Council policies that explain how developments need to be designed to meet the conditions of the Local Environmental Plan (LEP) and State-wide rules. The tables provided below will address the sections of the DCP relevant to the proposal.

WOLLONGONG DEVELOPMENT CONTROL PLAN 2009 - CHAPTER B1: RESIDENTIAL DEVELOPMENT

A summary of key controls is provided below- noting a full discussion against the DCP will be provided at DA stage.

Wollongong Development Control Plan 2009 – Chapter B1: Residential Development Compliance Table			
Clause	**Controls**	**Comment**	**Complies**
4. General Residential Controls			
4.10	Car Parking and Access		
	6. Car Parking and Access The minimum dimension for a single car parking space shall be 5.5 metres x 2.6 metres where unenclosed.	Complies	Yes
	9. Driveways shall be separated from side boundaries by a minimum of 1 metre.	Section 6.10.2 provides separation controls specific to RFBs. See this section for details.	Yes
	10. Driveways shall have a maximum cross-over width of 3 metres.	The RFB section of this DCP allows a maximum width of 6m for RFBs.	Yes
6. Residential Flat Buildings			
6.2.2	Minimum Site Width Requirement – Development Controls	Development for the purpose of a residential flat building is to have a minimum site width of 24m. The development site has a frontage of 32.125m to Princes Highway.	**Yes**
6.3.2	Front Setback – Development Controls	1. Because the site to the north is an access handle, and the site to the south is on the opposite side of the creek the adoption of an 'average' is considered inappropriate- particularly also noting the actual front building line only occupies 50% of the site width owing to the required setbacks to the creek and FBL and the riparian areas.	**Yes**

		Development provides a 6m setback from Princes Highway which is suitable.	
6.4.2	Side and Rear Setbacks / Building Separation – Development Controls	The development provides 6m setbacks to all boundaries, except for the northern boundary. The ground floor is provided with fencing and landscaping that will mitigate impacts. Habitable rooms that exceed the 6m setback on the upper levels are provided with narrow windows to mitigate impacts. Overall, the development is considered appropriate with regard to this control.	**Yes – ADG**
6.5.2	Built Form – Development Controls	The size of the site permits and it partially secluded location combined with the retention of the majority of the trees will allow the subject allotment to accommodate a 3 storey residential flat building that will not be highly visible from the public domain. Considering the site bounds a creek to its southern boundary and generous setback to its eastern boundary, the proposal will not impact upon the amenity of neighbouring properties in terms of privacy, noise and overshadowing. It is also noted that Towradgi Creek separates the development site from a large two storey multi dwelling housing complex to the south, indicating that Council supports higher densities within close proximity to key arterial road networks and commercial hubs. The proposed building has been designed with clear entry points that address Princes Highway.	**Yes**
6.6.2	Visual Privacy – Development Controls	The development complies with the building separation requirements under the ADG. Furthermore, the development provides generous setback to its eastern boundary with the overall internal layout designed to minimise direct overlooking of neighbouring properties.	**Yes**
6.7.3	Acoustic Privacy – Development Controls	Development designed to minimise noise transition and noise impact to neighbouring properties. Given that the development is fully compliant with the required setbacks and exceeds the requirement to its eastern and southern boundaries, the development is not considered likely to result in acoustic privacy impacts to neighbouring properties.	**Yes**

Attachment 7

Wollongong Design Review Panel Via MS Teams
Meeting minutes and recommendations

Date	4 August 2021
Meeting location	Wollongong City Council Administration Offices
Panel members	Brendan Randles
	Tony Tribe
	Marc Deuschle
Apologies	Michael Trinh – IDA Group
Council staff	John Wood - City Wide Development Manager Brigit Mathia - Development Project Officer Alexandra McRobert – Council Architect
Guests/ representatives of the applicant	Applicant not in attendance at the meeting
Declarations of Interest	Nil
Item number	1
DA number	DA-2020/1342
Reason for consideration by DRP	
Determination pathway	
Property address	404 Princes Highway, Corrimal 2515
Proposal	Demolition of existing structures, tree removals and construction of a residential flat building comprising 15 units with associated basement carparking, landscaping and services infrastructure (Amended Plans)
Applicant or applicant's representative address to the design review panel	
Background	The site was previously inspected by the Panel on 19 January 2021, prior to the proposal's presentation to the DRP.
Design quality principals SEPP 65	
Context and Neighbourhood Character	The site and context of this proposal – including its high number of constraints and failures to adequately address them) was discussed extensively at the last DRP meeting (19th January 2021). It was noted at that meeting that *"a comprehensive site analysis has not been included in the documentation provided pre-meeting for review by the Panel. While the Panel did receive the site analysis plan when it was presented at the meeting, it is clear that only scant analysis of the site and its context has been made. Long elevations are misleading, with ground level interfaces not drawn. Vital information is missing from plans and elevations (such as levels, accurately drawn trees, adjoining buildings, fences, services etc) making a full appraisal of the scheme impossible."* In conclusion the Panel recommended "*that any revised proposal for the site must commence with a thorough context and site analysis. The ADG Appendix 1 specifies what should be included, how it should be prepared and why it should become the basis for a development proposal. In addition, plans, elevations and sections must include site boundaries, levels, existing services and trees, adjoining properties (including buildings and trees), creek and vegetation, additional natural features and other site qualities, opportunities and constraints essential to understanding impacts, compliances and design qualities of the proposal. Refer to ADG Part 1 and Part 3A.*"

	No further site or context analysis has been provided; this is very difficult to understand, given the Panel's clear recommendations. In addition, adjoining buildings are not drawn on plans or sections; adjoining buildings, trees and landscape features such as the creek are not drawn on elevations or sections; and no informed diagrams indicate how the built form has been proposed let alone modified. The proposal therefore fails to meet its contextual requirements, which include demonstrating a sound understanding of the site, developing design principles based on that site understanding and preparing a design response that intelligently responds to the chief constraints and opportunities of the site.
Built Form and Scale	At the last DRP meeting, the proponent was told that the proposal is *"too bulky and does not sit well with adjacent built form, which generally appears to sit well below tree height and features one and two storey dwellings with large hipped roofs".* In response to the Panel's advice that *"the height of the proposal be restricted to two levels only plus roof",* the proposal has been lowered substantially, but kept at three levels. No articulated design response to the proposal's two storey context has been demonstrated. In failing to show adjacent built form, trees or natural features, it is difficult to gauge from elevations if the revised bulk is more responsive to its context or not. While the built form has been lowered, it is not explained how the ground level is able to be lowered to RL 12.350, when the Panel understands the PMF to be 13.10. The panel cannot support habitable spaces proposed below the PMF. Although it was noted previously that *"the roof is expressed as single slab without any covering material, slope or drainage - an inadequate description at DA Stage"*, the roof is still shown as a single slab without roof falls or space for insulation. While a lift overrun is now shown on drawings, compared to typical practice, it appears insufficiently tall to function. Contrary to previous advice, the plan form of the building fails to capitalise on the key features of the site and still includes units facing the vehicular driveway. Although shown on drawings, it is noted that the proposed built form does not sit within the "15m setback from natural resources" required by Council. Site and Context analysis to ADG (see above) should clearly demonstrate how physical, regulatory and other constraints have been considered in arriving at the building envelope and footprint. Built form issues continue within the building. Service cupboards are indifferently located along the circulation corridor, reducing the entry's visual and physical amenity and creating a place of concealment. Most apartments do not include formal entries. Both bedrooms of the ground level north western unit feature full height windows directly facing the vehicular driveway unit.
Density	As previously advised, *"with significant site constraints greatly reducing the developable portion of the site and so many built form, amenity and compliance issues evident in the proposal, it is not demonstrated that the proposed density can be accommodated on the site".*
Sustainability	It is noted that solar panels have been added to the revised

	proposal. Further opportunities exist for further sustainability measures include water capture for irrigation and WSUD to prevent irrigated water discharging into the creek system. Any further design development should demonstrate consideration and inclusion of ADG Part 4U-X objectives.
Landscape	Co-ordination + Area Calculations: There appear to be discrepancies between the architectural plans and the landscape plans. One particular discrepancy is the tree along the Princes Hwy noted to be removed on the architectural drawings but retained on the landscape plans. These must be resolved so an accurate depiction of the design can be assessed. All built and hard elements of landscape proposals should be co-ordinated with, and shown on the architectural drawings. This includes works to nature strip up to the kerb-line. The communal open space calculations are unclear with the 830m2 proposed to be provided not evident in the design. Only areas that are accessible and usable should be counted as COS for a development of this type. Areas in the VMP should not be regarded as COS given the current scheme shows no access to it or activation. The deep soil zone calculations are unclear with the 898m2 proposed too narrow to be calculable in some locations. It is also unclear how the required landscape area, and the proposed landscape area – both noted as equal to 30% - can be accurately recorded given they are shown to be 882m2 and 724m2 respectively. Ground Floor: It appears the rear of the site is unsecured and accessible by anyone entering the site from the Princes Hwy. A strategy to secure the site in this regards, and similarly with regards to safety being maintained the steep rear of the site / creek, should be proposed that does not rely on the use of excessive fencing. The narrow lawn strip between unit G01 and the public domain is unusable. Consideration should be given to making this planting. The POS to G01 also falls within the front set back which needs to be resolved. The semi-circular lawn outside unit G05 is likewise unusable and invites anyone to enter the site. It is not clear how the bin enclosure is treated to prevent smell issues for unit G05. The rear COS is poorly planned. The majority of space is used for circulation and therefore not contributing to meaningful and usable space. The fence alignment and spatial arrangement feels arbitrary and should respond better to the architecture and site conditions. Noise and visual privacy between the rear units and the COS is also compromised by the current design With only fourteen units, the development would be better served

	by providing a usable COS designed for a large cross section of users, rather than a children's playground. Furthermore it divides the space awkwardly; therefore, it should be removed. The bike racks are poorly located, making it difficult for anyone with a bike to access. While the approach set out within the Biosis VMP is understood and supported in principle, it is unclear how this is delineated or integrated with the COS design; how access for maintenance or passive use is provided; and how solar access can be achieved for the COS. Level 2: It is not explained how waterproofing, insulation, adequate falls and drainage can be achieved for the Level 2 COS within a 3m floor to floor height without breaching ADG ceiling height guidelines. The Level 2 COS is extremely limited in terms of program variety. Given the ground floor already provides sets of tables and chairs, could this roof garden (or conversely the GF COS) have different types of uses. The GF and L2 should be considered as a suite of spaces complementary to each other. Given its open rectangular layout, more work needs to be done to create spaces / rooms that provide opportunity for singles, couples or small groups to use. Planters could be used to define and separate spaces.
Amenity	See comments above regarding : - lack of response in layout to key site qualities - flooding issues due to ground level being lower than PMF - non compliance with 15m natural resources setback - lack of entry spaces to individual units - full height bedroom facing vehicular driveway - no roof fall or drainage to roof - communal open space issues (see Landscape) - Access to COS not resolved or accessible - ADG compliant solar access to southern apartment needs to be confirmed, supported by sun-eye diagrams. - Available daylight to and outlooks from habitable rooms warrants further consideration on this heavily treed site.
Safety	Flooding issues appear to be unresolved. The SEE claims compliance with Councils flood evacuation requirements. Regardless, the panel cannot support a proposal where PMF floods ground floor habitable areas to a depth of ~750 mm, together with the whole of the basement.It is still not clear if there is a roller shutter or other form of barrier to basement car parking. A BCA report should inform any design development. Potential safety issues noted include egress, fire separation of openings,

	climbable balcony balustrades and access for persons with a disability .
Housing Diversity and Social Interaction	Context and neighbourhood analysis should identify the housing precedents in the area and the appropriateness of the design mix of the proposal.
Aesthetics	The new proposal appears not to have responded to previous Panel comments, which include : - *the building appears not to have any compatibility with neighbouring buildings, which feature large hipped roofs above two level massing – at most.* - *without adjacent context, trees and any description of the site's topography and other landscape features, it is hard to gauge the materiality and expression of the proposal…as presented, the building language appears very harsh and crude, with little relationship with the natural ground or sensitivity to the adjacent creek landscape.* - *a revised design should remove one level and incorporate a well designed roof; perhaps a low hipped roof with large overhangs would introduce a more shady relaxed character, more compatible with locality and responsive to its riparian landscapes.* - *fenestration design generally needs to demonstrate factors such as solar shading, spread of fire, and outlook opportunities have been adequately considered.*
Design Excellence WLEP2009	
Whether a high standard of architectural design, materials and detailing appropriate to the building type and location will be achieved	The site is not within the Wollongong City Centre or a nominated Key Site. The WLEP Design Excellence standards do not apply. The comments below are to assist in understanding the above. Not achieved
Whether the form and external appearance of the proposed development will improve the quality and amenity of the public domain,	Not achieved
Whether the proposed development detrimentally impacts on view corridors,	Not achieved
Whether the proposed development detrimentally overshadows an area shown distinctively coloured and numbered on the Sun Plane Protection Map,	N/A
How the development addresses the following:	
the suitability of the land for development,	Potentially Suitable, but capacity needs to be substantiated.

existing and proposed uses and use mix	Not achieved
heritage issues and streetscape constraints,	N/A
the location of any tower proposed, having regard to the need to achieve an acceptable relationship with other towers (existing or proposed) on the same site or on neighbouring sites in terms of separation, setbacks, amenity and urban form,	N/A
bulk, massing and modulation of buildings	Not achieved
street frontage heights	Not achieved
environmental impacts such as sustainable design, overshadowing, wind and reflectivity	Not achieved
the achievement of the principles of ecologically sustainable development	Achieved
pedestrian, cycle, vehicular and service access, circulation and requirements	Stacked parking now aligned with specific units
impact on, and any proposed improvements to, the public domain	Not achieved
Key issues, further Comments & Recommendations	The revised proposal still includes many contextual, urban design, safety and amenity issues, as identified above. The proposal should be discussed with Council before proceeding further. Logic dictates the capacity of the site is likely determined by the extent of flood-free habitable space achievable under the statutory height limit. Exceptional design excellence, and measurable public benefit, would have to be demonstrated for the panel to support any variations to the standards.