Wollongong Local Planning Panel Assessment Report | 26 Sep 2018

WLPP No.	Item No. 2
DA No. DA-2018/848	
Proposal Residential – Demolition of existing structures and construction of dwelling housing – four (4) townhouses	
Property Lot 10 DP 1107164, 11 Catherine Street, Gwynneville	
Applicant ADM Architects	
Responsible Team Development Assessment and Certification - City Centre Team (RW)	

ASSESSMENT REPORT AND RECOMMENDATION

Executive Summary

Reason for consideration by Wollongong Local Planning Panel - Determination

The proposal has been referred to Wollongong Local Planning Panel (WLPP) pursuant to clause 2.19(1)(a) of the *Environmental Planning and Assessment Act 1979*. Under Clause 1(a) of Schedule 2 clause 1 (a) of the Local Planning Panels Direction of 1 March 2018, the development involves the creation of an easement over the downstream property which is Council owned land (Seniors Citizen Centre at 192 Gipps Road, Gwynneville).

Proposal

The application was lodged on 13 July 2018 and is for demolition of the existing dwelling house and ancillary structures and construction of multi dwelling housing (4 townhouses).

Permissibility

The site is zoned R2 Low Density Residential pursuant to Wollongong Local Environmental Plan 2009. The proposal is categorised as *multi dwelling housing* and is permissible in the zone with development consent.

Consultation

The proposal was notified in accordance with Council's Notification Policy and received one objections and one letter of support. This is discussed at section 1.5 of this report.

Main Issues

The main issues are:

- Drainage easement over Council owned land
- Protection of significant tree on adjoining land
- Variation to Wollongong Development Control Plan 2009 for location of visitor parking space

RECOMMENDATION

It is recommended that the application be conditionally approved by way of a deferred commencement consent, subject to the recommended conditions at **Attachment 5**.

1.1 PLANNING CONTROLS

The following planning controls apply to the development:

State Environmental Planning Policies:

- SEPP No. 55 Remediation of Land
- SEPP (Building Sustainability Index: BASIX) 2004
- SEPP (Infrastructure) 2007

Local Environmental Planning Policies:

Wollongong Local Environmental Plan (WLEP) 2009

Development Control Plans:

• Wollongong Development Control Plan 2009

Other policies

Wollongong City-Wide Development Contributions Plan (2018)

1.2 DETAILED DESCRIPTION OF PROPOSAL

The proposal comprises the following:

Site preparation

- Demolition of existing dwelling, garage and carport
- Removal of one (1) tree is proposed however this is an exempt species and does not require approval to be removed.
- Minor earthworks are involved for excavation association with the development.

Works / Construction / building details

- Construction of four (4) x attached townhouses, each with 3 bedrooms on the first floor and a double garage and kitchen/living/dining areas on the ground floor. Each dwelling has access to a 4m x 5m private open space area.
- Landscaped areas including the deep soil zone at the rear of the site with ancillary landscaped areas within the front setback and around the perimeter of the site.
- The development relies on the creation of an inter-allotment drainage easement over the adjoining property to the south which is Council owned land – refer further discussion in Part 1.6.1 of this report.

Traffic, parking and servicing

- Eight (8) resident car spaces are proposed in the form of four (4) double garages and one (1) visitor car space is provided within the front setback.
- Vehicle access is in the form of a single driveway access from the western side of the site. The
 driveway towards the front of the site is to be permeable paving to protect the significant tree
 on the adjoining western site, and the driveway has been relocated so that it is outside the
 structural root zone of this tree.
- Waste collection is proposed using the street collection.

1.3 BACKGROUND

There is no development history for the site. The existing dwelling appears to have been constructed in the 1960s.

A pre-lodgement meeting was held for the proposal on 23 April 2018 (PL-2018/62). Issues discussed included the front setback requirement, variation to the location of the visitor's car space and protection of the tree on the adjoining western property. The matters discussed have been satisfactorily addressed as part of the current application.

Customer service actions

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

1.4 SITE DESCRIPTION

The site is located at 11 Catherine Street, Gwynneville and the title reference is Lot 10 DP 1107164. The site currently has a single storey dwelling, garage and carport, accessed off the driveway on the eastern side of the site. The site is rectangular in shape, with a width of 20.115m, a depth of 50.27m and has a fall of 1m from front to rear.

Adjoining development is as follows:

- North: mix of residential uses including townhouses, older residential flat buildings and single dwellings
- East: single storey building containing eight (8) flats (NB no development consent for flats)
- South: Senior Citizens Centre (Council owned property at 192 Gipps Rd)
- West: 1970s residential flat building containing eight (8) units.

The locality is characterised by a mix of residential densities and ages, comprising single dwellings, multi dwelling housing and 'walk up' flat buildings. The zoning to the south of the site is B1 Neighbourhood Centre.

An aerial photo and zoning map of the site forms **Attachment 1** to this report.

Property constraints

Council records identify the land as being impacted by acid sulphate soils. Suitable conditions are recommended to address this constraint, included in **Attachment 5**.

There are no restrictions on the title.

A power pole conflicts with the proposed driveway location and suitable conditions are recommended for the developer to consult with Endeavour Energy and relocate the infrastructure at the developer's expense – refer comments from Endeavour Energy at Part 1.6.2 of this report.

1.5 SUBMISSIONS

The application was notified from 27 July 2018 – 16 August 2018 in accordance with WDCP 2009 Appendix 1: Public Notification and Advertising. This included a notice in The Advertiser. Two (2) submissions were received, including one objection and a letter of support from Neighbourhood Forum 5.

Table 1: Submissions

Issue raised	Comment
Concerns regarding proposed landscape planting adjacent to the fence line of 9 Catherine Street, noting that there are existing plants pressing against the fence which has caused damage to the fence.	Landscape planting is required along the side boundaries for multi-dwelling housing under Wollongong Development Control Plan 2009. Perimeter landscape planting provides good separation between properties as well as a pleasant landscaped appearance. The development meets these requirements. Council's Landscape Architect has found the submitted landscape plan satisfactory and the

redevelopment of the site will remove existing vegetation (with the exception of a large tree on the adjoining property) and provide landscaping for the development in accordance with the landscape plan at **Attachment 2**. A condition is recommended for suitable side and rear boundary fencing to be provided at the developer's expense (refer Condition 32 in **Attachment 5**)

1.6 CONSULTATION

1.6.1 INTERNAL CONSULTATION

Landscape Architect

Council's Landscape Officer has reviewed the application and given a satisfactory referral. Conditions of consent were recommended and are included in the consent including conditions regarding tree protection measures, compliance with the recommendations of the arborist report, and replacement of more suitable street trees.

Property Officer

Council's Property Officer has reviewed the application and given a satisfactory referral noting that Council resolved to grant an Easement for Drainage in favour of Lot 10 DP 1107164 No 11 Catherine Street, Gwynneville over Council's adjoining land known as Lot 20 DP 852981 No 192 Gipps Road, Gwynneville. Council's terms of granting the easement have been agreed to by the applicant, including the relevant costs incurred, any adjustments to services and the timing of the works in relation to planned upgrade works to the Senior Citizen's building. A copy of the Council minutes can be found at **Attachment 4** to this report.

Development Engineering Officer

The application has been assessed having regard to traffic, parking and stormwater matters and found to be satisfactory, including the revised driveway design to accommodate the structural root zone of the significant tree on the adjoining western property. Conditions of consent have been recommended and are included in the consent.

1.6.2 EXTERNAL CONSULTATION

Endeavour Energy

Comments from Endeavour Energy were received on 29 August 2018, outlining requirements for connection of load and relocation of the existing power pole. These comments have been forwarded to the applicant as requested by Endeavour Energy and suitable conditions of consent are included in **Attachment 5** to address their requirements (refer Condition 11).

2 ENVIRONMENTAL PLANNING AND ASSESSMENT ACT 1979 – 4.15 EVALUATION

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

2.1.1 STATE ENVIRONMENTAL PLANNING POLICY NO. 55 - REMEDIATION OF LAND

A desktop audit of previous land uses does not indicate any historic use that would contribute to the contamination of the site. A desktop audit of previous land uses does not indicate any historic use that would contribute to the contamination of the site. The current dwelling was constructed in the early 1960's and from aerial photography the land appeared vegetated and vacant before this time. There is no change of use involved given that the existing residential use of the site will continue. Subject to the imposition of appropriate conditions including classification/disposal of excavated

material during works, no concerns are raised in regard to contamination as relates to the intended use of the land which is considered suitable for the proposed development under clause 7.

2.1.2 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.

2.1.3 STATE ENVIRONMENTAL PLANNING POLICY (INFRASTRUCTURE) 2007

Clause 45

The development involves the relocation of the existing power pole to construct the driveway. The development application was referred to Endeavour Energy for comment in accordance with Clause 45 of SEPP (Infrastructure) as it involves works within proximity of electricity infrastructure.

Endeavour Energy provided advice on 29 August 2018 raising no objection to the proposed development subject to the imposition of recommended conditions, which include the requirement to obtain approval from the relevant authorities for the provision of electricity to service the development and for relocation of the power pole.

2.1.4 WOLLONGONG LOCAL ENVIRONMENTAL PLAN 2009

Part 2 Permitted or prohibited development

(a) Clause 2.2 – zoning of land to which Plan applies

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

(b) 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 satisfactory with regard to the above objectives as multi-dwelling housing will provide for a range of housing types within the locality and is of a height and density that is consistent with a low density residential environment.

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; Semidetached dwellings; Seniors housing; Shop top housing; Signage; Veterinary hospitals

The proposal is categorised as a *multi dwelling housing* as described below and is permissible in the zone with development consent.

(c) <u>Clause 1.4 Definitions</u>

multi dwelling housing means 3 or more dwellings (whether attached or detached) on one lot of land, each with access at ground level, but does not include a residential flat building.

Clause 2.7 Demolition requires development consent

Demolition of the existing dwelling and ancillary structures are proposed under the current application, thereby satisfying the provisions of this clause.

Part 4 Principal development standards

Clause 4.3 Height of buildings

The proposed building height of 6.52m does not exceed the maximum of 9m permitted for the site.

Clause 4.4 Floor space ratio

Maximum FSR permitted for the zone: 0.5:1

Site area: 1012 m^2 GFA: 490 m^2

FSR: $490 \text{ m}^2/1012 \text{ m}^2 = 0.48:1$

The proposed development complies with the maximum 0.5:1 FSR.

Part 7 Local provisions – general

Clause 7.1 Public utility infrastructure

The site is already serviced by electricity, water and sewage services.

A condition is proposed requiring approval from the relevant authorities for the connection of electricity, water and sewage to service the site as well as conditions regarding relocation of the power pole.

Clause 7.5 Acid Sulfate Soils

The proposal is identified as being affected by class 5 acid sulphate soils. Suitable conditions of consent are recommended to manage acid sulfate soils if encountered during works.

Clause 7.6 Earthworks

The proposal comprises minor earthworks to facilitate a level building platform. Subject to conditions, the earthworks are not expected to have a detrimental impact on environmental functions and processes, neighbouring uses or heritage items and features surrounding land.

Clause 7.14 Minimum site width

The site has a width of 20.115m, thereby meeting the minimum 18m site width required for multidwelling housing under Clause 7.14(1).

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

None applicable.

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

2.3.1 WOLLONGONG DEVELOPMENT CONTROL PLAN 2009

The development has been assessed against the relevant chapters of WDCP2009 and found to be satisfactory. A full compliance table can be found at **Attachment 3** to this report and variations are discussed below:

CHAPTER A1 – INTRODUCTION

8 Variations to development controls in the DCP

Chapter B1 Residential Development

Applicable controls

Visitor parking within the front setback

Part 5.7.2(1) of Chapter B1 requires that:

"On-site car parking must be positioned to minimise impacts on the streetscape. Car parking must be located behind the building setback and be screened from view with well-designed structures and vegetation. Car parking may also be located within a basement"

Proposed variation

The development proposes the required visitor car space within the front setback, therefore not meeting this requirement.

Applicant's submission:

A variation statement has been submitted by the applicant justifying the variation on the following grounds (paraphrased):

Proposal is consistent with the objectives of Part 5.7.1 for the following reasons:

- Adequate car parking has been provided
- There is adequate vehicle access to and within the site
- The development is accessible to pedestrians, cyclists and motorists being relatively flat
- An acceptable streetscape will be provided as a new tree will be planted in front of the visitor's car space in addition to shrub planting. This will integrate the car parking design to minimise visual impacts.

Comment:

The location of the visitor's car space within the front setback will not compromise the streetscape as suitable landscaping between the open car space and the front boundary is provided. The large tree on the adjoining property (required to be protected) and the existing street trees also screen the visitor parking from view. The visitor car space is separated from the front dwelling by 2m and no windows or openings are proposed with a direct view to the visitor's car space in order to limit amenity impacts such as noise and headlight glare that would ordinarily occur. The objectives of this part are considered to be satisfied and a variation to the location of visitor parking space under Part 5.7.2 is supported in the circumstances.

2.3.2 WOLLONGONG CITY-WIDE DEVELOPMENT CONTRIBUTIONS PLAN (2018)

The estimated cost of works is >\$100,000 (\$913,000) and a levy of 1% is applicable under this plan as the threshold value is \$100,000.

2.4 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.

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

- <u>92</u> What additional matters must a consent authority take into consideration in determining a development application?
- (1) For the purposes of section 4.15 (1) (a) (iv) of the Act, the following matters are prescribed as matters to be taken into consideration by a consent authority in determining a development application:
 - (a) in the case of a development application for the carrying out of development:

- (i) in a local government area referred to in the Table to this clause, and
- (ii) on land to which the Government Coastal Policy applies, the provisions of that Policy,
- (b) in the case of a development application for the demolition of a building, the provisions of AS 2601.

Condition(s) of consent are recommended with regard to demolition works.

The site is located outside of the Coastal zone.

2.6 SECTION 4.15(A)(V) ANY COASTAL ZONE MANAGEMENT PLAN (WITHIN THE MEANING OF THE COASTAL PROTECTION ACT

Not applicable - the site is not located within the coastal zone.

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

There are not expected to be adverse environmental impacts on either the natural or built environments. There are also not expected to be any adverse social or economic impacts in the locality. The proposal is satisfactory with regard to the applicable planning controls as detailed in the body of this report. Submissions raised following notification would not preclude the development. Internal and external referrals are satisfactory subject to appropriate conditions of consent

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

Does the proposal fit in the locality?

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

Are the site attributes conducive to development?

There are no site constraints that would prevent the proposal.

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

Refer to Part 1.5 of this report.

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

The application is not expected to have any unreasonable impacts on the environment or the amenity of the locality. It is considered appropriate with consideration to the zoning and the character of the area and is therefore considered to be in the public interest.

3 CONCLUSION

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

The application involves a variation to Wollongong Development Control Plan 2009 with regard to a visitor car space located within the front setback. This variation has been adequately justified and given that the variation will not lead to adverse impacts, has been found worthy of support in this instance.

Internal referrals are satisfactory and submissions have been considered in the assessment. It is considered that the proposed development has otherwise been designed appropriately given the nature and characteristics of the site and is unlikely to result in significant adverse impacts on the character or amenity of the surrounding area.

The development relies on the creation of a drainage easement to the downslope property which is owned by Council who resolved to endorsed the creation of this easement as part of the development. A deferred commencement consent is recommended requiring the drainage easement to be created prior to the consent becoming operational.

4 RECOMMENDATION

It is recommended development DA-2018/848 be approved by way of a deferred commencement consent requiring the creation of the drainage easement and subject to the imposition of appropriate conditions of consent as outlined in **Attachment 5**.

Attachments

Attachment 1 – Aerial photo and Wollongong Local Environmental Plan 2009 zoning map

Attachment 2 - Plans

Attachment 3 - Compliance table for Wollongong Development Control Plan 2009

Attachment 4 - Council Meeting minutes agreeing to creation of easement over Council land

Attachment 5 - Recommended conditions of consent

Attachment 1: Aerial photo and zoning map under Wollongong Local Environmental Plan 2009





PROPOSED RESIDENTIAL DEVELOPMENT

AT

II CATHERINE STREET **GWYNNEVILLE NSW**

ARCHITECTURAL DRAWING SCHEDULE

No.	DESCRIPTION	SCALE @ A I
A000	TITLE SHEET	NTS
A001	SITE ANALYSIS	NTS
A002	DEMOLITION PLAN	1:200
AI00	SITE PLAN	1:200
AIOI	GROUND FLOOR PLAN	1:200
A102	LEVEL I FLOOR PLAN	1:200
A201	ELEVATIONS & SECTION	NTS
A301	shadow analysis	NTS
A302	COLOURS & MATERIALS SCHEDULE	NTS
A303	SOLAR ACCESS STUDY	NTS

DEVELOPMENT SUMMARY

SITE AREA	1012m²
PERMISSIBLE FSR	0.5 : I
PERMISSIBLE GROSS FLOOR AREA	506m²
PROPOSED FSR	0.48 : I
PROPOSED GROSS FLOOR AREA	494.3m²
GFA BREAKDOWN	
GROUND FLOOR	(183.0m²
LEVEL ONE	310.8m²
TOTAL	493.8 m²
REQUIRED LANDSCAPE AREA (30% OF SITE)	303.6m²
PROPOSED LANDSCAPE AREA	326.5m²

11 Catherine Street Gwynneville SUMMARY OF BASIX COMMITMENTS FOR EACH UNIT This is a summary of the BASIX Commitments as detailed in the BASIX Certificate. Refer to the CURRENT BASIX Certificate for Complete details. For definitions refer to basix.nsw.gov.au **WATER COMMITMENTS Fixtures** 3 Star Shower Heads 3 Star Kitchen / Basin Taps Yes 3 Star Toilet **Alternative Water** Minimum Tank Size (L) 1500 Collected from Roof Area (m2) 50 Tank Connected To: All Toilets No Laundry W/M Cold Tap Yes One Outdoor Tap Yes THERMAL COMFORT COMMITMENTS - Refer to TPA Specification on plans **ENERGY COMMITMENTS** Hot Water Gas Instantaneous 6 Star Living 4 Star 1 Phase A/C Cooling System Bedrooms 4 Star 1 Phase A/C Living 1 Phase A/C 4 Star Heating System 4 Star Bedrooms 1 Phase A/C 1 x Bathroom | Fan ducted to exterior Manual on/off Kitchen Fan ducted to exterior Manual on/off Ventilation N/A Laundry Natural ventilation Window/Skylight in Kitchen No Natural Lighting Window/Skylight in Bathrooms/Toilets 2 Yes to Dedicated Number of bedrooms Yes Artificial Lighting Number of Living/Dining rooms 2 Dedicated Yes (rooms to be Kitchen Yes Dedicated Yes primarily lit by All Bathrms/Toilets Dedicated Yes Yes fluorescent or Laundry Yes Dedicated Yes LED lights) All Hallways Yes Dedicated Yes OTHER COMMITMENTS Outdoor and indoor clothes line Yes | Ventilated refrigerator space | Yes Stove/Oven Gas cooktop & electric oven

July 2018				erence: 13733
Building Susta	ainability Assessments		Ph: (0	2) 4962 3439
enquiries@bu	ildingsustainability.net.au		uildingsustaina	ability.net.au
The fellowing on	Important No		wf	indiantad as
i ne iollowing spi the Assessor Ce	ecification was used to achieve the ertificate and takes precedence over	e mermai pe er anv other	rrormance values specification.	indicated on
If different const	ruction elements are applied then	the Assesso	or Certificate is no	longer valid.
The	rmal Performance Specification	s (does no	t apply to garag	e)
External Wall C	Construction	•		dded Insulation
Brick Veneer &	Lightweight			R2.0
Internal Wall C	onstruction		A	dded Insulation
Plasterboard or	n studs	F	R2.0 to walls adja	cent to garage
Plasterboard +	studs + shaft liner + studs + Plaste	erboard (par	ty walls)	R2.0 + R2.0
Ceiling Constru	ction		Ac	dded Insulation
Plasterboard		R3.5 to	ceilings adjacen	t to roof space
Roof Construct	ion Colour		Ad	lded Insulation
Metal	Any		Foil -	+ R1.0 blanket
Floor Construc	tion Covering		Ac	dded Insulation
Concrete	As drawn			None
Timber	As drawn	R2.0 to floo	ors where open be	elow (U4 only)
Windows	Glass and frame type	U Value	SHGC Range	Area sq m
ALM-001-01 A	Aluminium Type A Single clear	6.70	0.51 - 0.63	As drawn
ALM-002-01 A	Aluminium Type B Single clear	6.70	0.63 - 0.77	As drawn
	re awning windows, bifolds, casement			
Type B windows a	re double hung windows, sliding windo	ws & doors, fi	xed windows, stack	er doors, louvres
Skylights	Glass and frame type	U Val	ue SHGC	Area sq m
	lues are according to AFRC. Alter		s may be used if	the U value
is lower and the	e SHGC is within the range specifi	ed		
External Windo	w Shading (eaves, ver	andahs, per	golas, awnings et	tc)
All shade eleme	nts modelled as drawn			
Ceiling Penetra	tions (downlights	s, exhaust fa	ns, flues etc)	

No adjustment has been made for losses to insulation arising from ceiling penetrations.



o COPYRIGHT-These drawings remain the exclusive copyright of ADM Architects. Reproductions in any form whether dectronic, digital or otherwise shall not be allowed except by express permission granted in writing by ADM Architects. Holders users and operators of these drawings require proof evidenced in writing that ADM Architects has written permission to use these drawings or shall otherwise be in breach of the Copyright Act and become liable accordingly.

If GURED DIMENSIONS These drawings are not to be scaled, figured dimensions shall be used in all cases.

INOMINATED ARCHITECT. The nominated Architect for ADM Projects (Australia) Pty Ltd TIAS ADM Architects is Angel D I Martino ARB No.7608

ISSUE	DATE	DESCRIPTION
Α	10.07.18	ISSUE FOR DEVELOPMENT APPLICATIO
В	[4.09. 8	RE-ISSUED FOR DA
С	17.09.18	RE-ISSUED FOR DA

NOT FOR CONSTRUCTION



94 Kembla St, Wollongong NSW 2500 PO Box 3061 Wollongong ph: 02 4228 6400 fax: 02 4228 6455 www.admarchitects.com.au

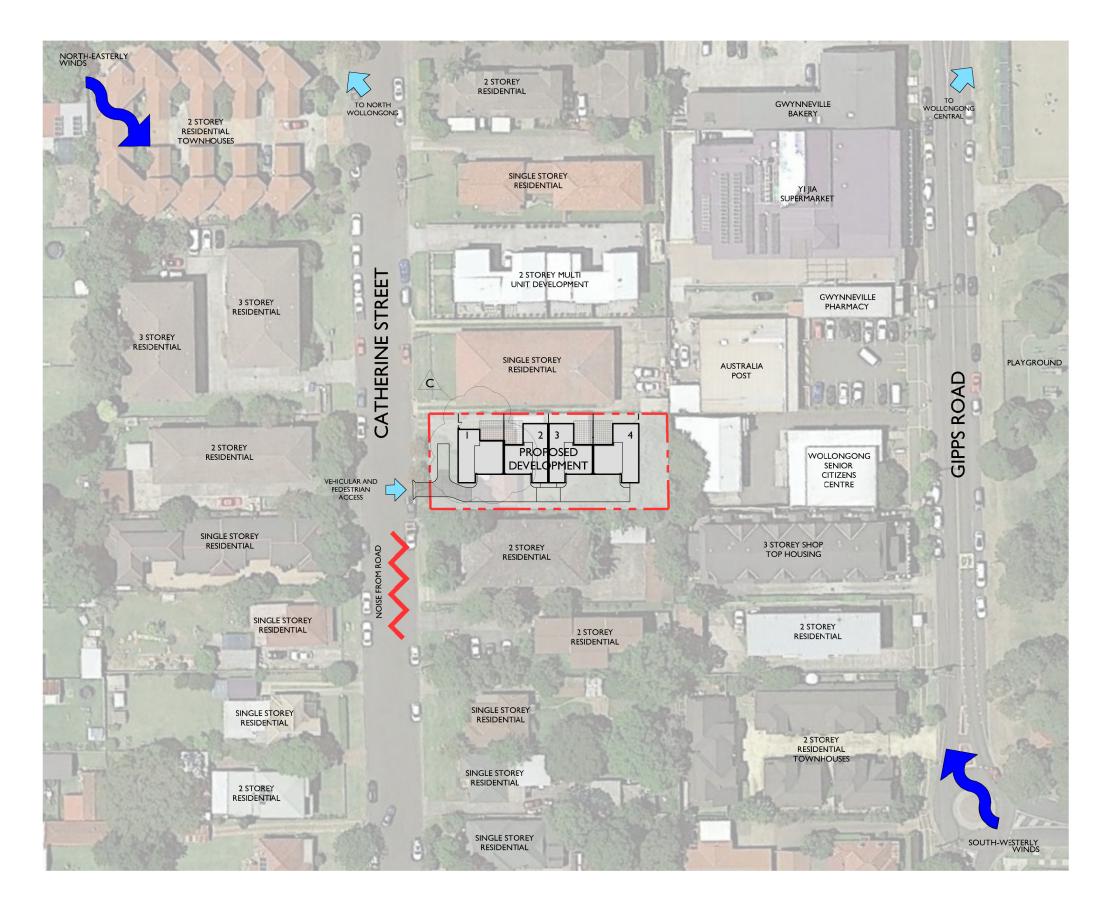
PROPOSED RESIDENTIAL DEVELOPMENT

II CATHERINE STREET

KOSTOVSKI & BLAZEVSKI

Title DEVELOPN TITLE SHEI	 LICATION
Scale	Date
NTS	

NTS		SEPTEM	BER 2018
Drawn		Checked	
MC SP		ADM	
Project No.	Drawing	No.	Issue
2017-35	A-000		С





ISSUE	DATE	DESCRIPTION
Α	10.07.18	ISSUE FOR DEVELOPMENT APPLICATION
В	03.09.18	RE-ISSUED FOR DA
С	17.09.18	RE-ISSUED FOR DA

NOT FOR CONSTRUCTION



94 Kembla St, Wollongong NSW 2500 PO Box 3061 Wollongong ph: 02 4228 6400 fax: 02 42266455 www.admarchitects.com.au

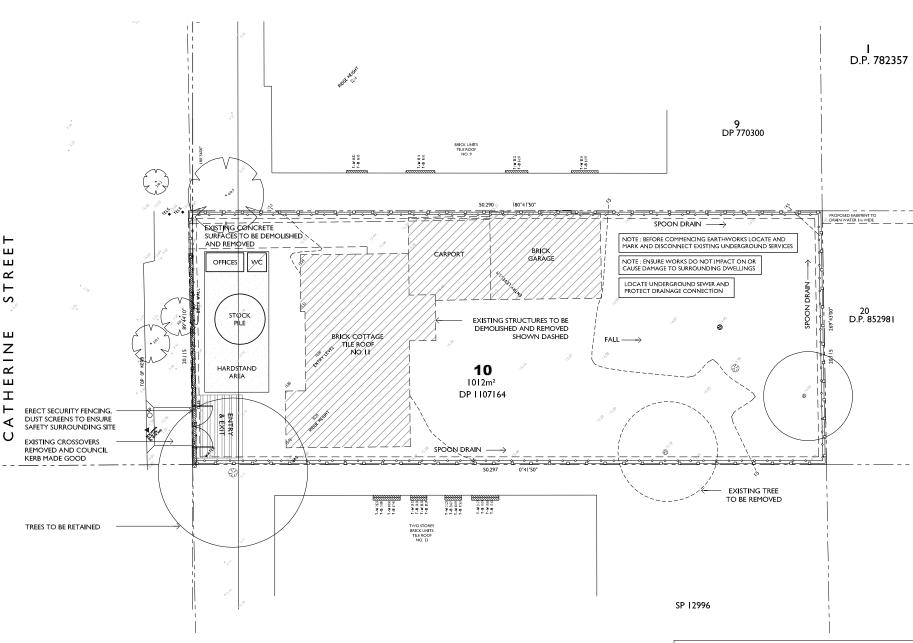
PROPOSED RESIDENTIAL DEVELOPMENT

II CATHERINE STREET
GWYNNEVILLE

KOSTOVSKI & BLAZEVSKI

DEVELOPMENT APPLICATION SITE ANALYSIS

Scale		Date	
NTS		SEPTEM	1BER 2018
Drawn		Checked	
MC SP DQ		ADM	
Project No.	Drawing I	No.	Issue
2017-35	A-001		С



LEGEND

SEDIMENT FENCE

HARD STAND AREA

TO BE DEMOLISHED & REMOVED

TREE TO BE REMOVED

DEMOLITION AND CONTAMINATION

DEMOLITION AND CONTAMINATION

The bulder is to carry out necessity demolition and on-site clearance and preparation of the site for the specified construction works.

This is applicable to demolition of existing buildings, structures ans services including planning and execution of the work, protection and support of adjacent structures and removal of demolithed materials. Its amount amerials are including planning and execution of the work, protection and support of adjacent structures and removal of demolithed materials. Benefits duraterials, hazardous materials are encountered, appropriate and qualified personal shall be employed to remove from site and dispose of such materials in approved manner in accordance with the provisions of all applicable legislation and with any relevant recommendations published by the National Occupational Health and Safety Commission (Worksate). The bulder shall be responsible for maintaining security fencing around the perimeter of the demolition site and any additional precautionary measures taken as may be necessary to prevent work. The bulder is to carry out the work in accordance with AS 260 (Demolition of Structures) in the event that the site indicates the bulder is to follow the directions and recommendation of the site contamination consultant to ensure that the site is un-contaminated prior to any building works taking place on the site.



NO. II BRICK COTTAGE TILE ROOF TO BE DEMOLISHED



requirements of the local council and RTA, 4. During construction phase as area is set aside on site for use of mobile crane or concrete pump, All construction materials are to be stored on site. A designated area has been allowed; All site accommodation and amenities as required will be located within the site. Some site sheds maybe relocated on the podium level in the final

CONSTRUCTION MANAGEMENT POINTS

DEMOLITION, SITE CLEARING & CONTAMINATION

GENERAL NOTES

phase of construction; and 7. A dilapidation survey will be carried out by the contractor before the commencement of any work on site.

Applicable Australian Standards
AS2601 - Demolition of structures
AS2436 - Guide to noise control...demolition sites
AS3798 - Guide to earthworks....residential developments
AS1289 - Methods of testing soils for engineering purpose
AS1725 - Galvanised railess chalmwire security fencing

AS1725 - Galvanised rates or training account sources Extlletion and a second source and the extlletion and to a length of 5.0 metres from the street kerb, so as to ensure soil and excavated materials are not transported off-site.

Storage Areas
Storage areas will be front yard open space.
Rubblsh Disposal

Trade waste will be contained on site until removal.
SIIt Barrier

Sediment will be prevented from washing off-site by geotextile fabric with metal support and/or continuous straw bales, placed in 100mm deep trench and fixed with stakes. All silt barriers are to be wholly with the site area.

Existing Paving and Vegetation
Existing pavement and vegetation will be retained as much as possible to minimise the amount of exposed soil.

Trade waste to be separated to recycle products, timber, glass and paper.
 Builder to relocate site shed, amenities, storage facilities, etc. as required during the construction process.
 Additional carparking to be provided on site following construction of basement carparking area.
 All vehicles to leave the site in a forward direction.

existing structures) and asbestos shall be removed from site prior to any new construction work taking place on site.

If hazardous materials are encountered, appropriate and qualified personnel shall be employed to remove from site and dispose of such materials in approved manner in accordance with the provisions of all applicable legislation and with any relevant recommendations published by the National Occupational Health and Safety Commission (Worksafe Australia). If hazardous materials are encountered underground, appropriate and qualified personnel shall be employed to remove from site and dispose of such materials in approved manner in accurace with the provisions of all applicable legislation and with any relevant recommendations published by the National Occupational Health and Safety Commission (Worksafe National Occupational Health And Safety Commission (Works

The Contractor shall be responsible for maintaining security fencing around the perimeter of the site and any additional precautionary measures taken as may be necessary to prevent unauthorised entry to the site at all times during the demolition period. Safe access to and agress from adjoining properties shall be maintained at all times for the duration of the demolition work, in the event that the site is found to be contaminated Contractor is to follow the directions and recommendations of a site contamination consultant to ensure that the site is un-contaminated prior to

1. Note that all proposed works will be undertaken whilst the building and site is vacant;
2. All site fencing and sediment control used during demolition phase shall be retained for the construction phase and shall be extended as detailed

3. A new hard stand area and shaker grid shall be constructed on corkwood circuit frontage during all phases of the project. All to confirm with the

SECTION DETAIL

PLAN

1.5 m star pickets at max. 2.5 m centres

Direction of

Construct sediment fences as close as possible to being purallel to the contours of the airc but with small returns as shown in the drawing to limit disc catchinent area of any one section. The catchinent area should be small enough to limit water flow for concentrated at one point to 50 litrics per second in the design storm event, usually the [O-year event. Care 150-min deep returned langth equipage line of the factors for the bottom of the fabric to Care 150-min deep returned langth equipage line of the factors for the bottom of the fabric to Care 150-min deep returned langth equipage line of the factors for the bottom of the fabric to Care 150-min deep returned langth equipage line of the factors for the bottom of the fabric to Care 150-min deep returned langth equipage line of the factors for the bottom of the fabric to Care 150-min deep returned langth equipage line of the factors for the bottom of the fabric to Care 150-min deep returned langth equipage line of the factors for the bottom of the fabric to Care 150-min deep returned langth equipage line of the factors for the bottom of the fabric to Care 150-min deep returned langth equipage line of the fabric for the bottom of the fabric to Care 150-min deep returned langth equipage line of the fabric for the bottom of the fabric to Care 150-min deep returned langth equipage line of the fabric for the fabric langth equipage line of the fabric langth equipage

2. Cut a 150-mm deep trench along the upslope line of the fence for the bottom of the fibrite to be entrenched.
3. Drive 1.5 metre long star pickets into ground at 2.5 metre internals (max) at the downslope edge of the trench. Ensure any star pickets are fitted with safety caps.
4. Fix self-supporting geoexetic to the upslope side of the posts ensuring it goes to the base of the trench. Fix the geoexetie with were test or as recommended by the mandaturer. Only use geotestical separation produced for sediment fencing. The use of shade doth for this respective control of the produced for sediment fencing. The use of shade doth for this respective control of the produced for sediment fencing.

SEDIMENT FENCE NOTES

Material Stockpiles
Stockpiles of loose materials (gravel, sand, etc.) will be contained undercover and water courses and within a suitable barrier, Footpaths and road surfaces will not be used for material stockpiles. Cleaning of Tools and Equipment
Tools and equipments will be cleaned away form drainage lines, road and pavement.

SOIL & WALER MANAGEMENT.

This plan shall be read in conjunction with the engineering plans, and any other plans or written instructions that may be issued relating to the future development at the subject site. The contractor shall ensure that all soil and water management works are located as Indicated on this drawing, All sub-contractors shall be made aware of their responsibilities in minimising the potential for soil erosion and pollution to down-slope lands and water ways. Where practical, the soil erosion hazard on the site shall be kept as low as possible to this end. Works should be undertaken in the following

sequence:
a) install any necessary security/boundary fences for this site;
b) construct silt fencing as detailed along boundaries and contours.

During windy weather, large unprotected areas shall be kept motst (not wet) by sprinkling with water to keep the dust under control. Final site landscaping shall be undertaken as soon as possible, and within 20 working days from completion of construction activities. Any sand used in the concrete curing process (spread over the surface) shall be removed as soon as possible, and within 10 working days from placement. Water shall be prevented from entering the permanent drainage system, unless it is sediment free: i.e. - the catchment area has been permanently landscaped and/or any likely sediment has been filtered through an approved structure.

Temporary soil and water management structures shall be removed only after the lands they protected are rehabilitated. The contractors shall provide acceptable receptors for concrete and mortar sturies, paints acid washings, lightweight waste materials and titter. Receptors for concrete an mortar sturies, paints, acid washings, light-weight waste materials and litter are to be emptied as necessary. Disposal of waste shall be in a manner

At least weekly the contractor shall inspect the site, providing particular attention to the following matters:
c) ensure drains operate freely, and initiate repair or maintenance as required;
d) remove spilled sand (or other materials) from hazard areas, including lands closer than 2 metres from likely areas of concentrated or high-velocity
flows such as waterways, gutters, paved areas and driveways;
e) construct additional erosion and/or sediment works as necessary to ensure the desired protection is given to downslope lands and waterways i.e.
male ongoing changes to the plan;
flome maintain erosion and sediment control measures in a functioning conditioning condition until all earthwork activities are completed and the site
rehabilitated; and
o) Remove temporary self conservation structures as a last activity in the republikation programme.

move temporary soil conservation structures as a last activity in the rehabilitation programme.

The contractor shall keep a log book, making entries at least weekly, and after rainfall and/or site closure record:

i) the conditions of any soil and water management works;

The book shall be kept on site and made available to any authorised person on request.

EROSION AND SEDIMENTATION CONTROL NOTES

The Contractor shall provide sediment fencing material during construction to be installed inside site fencing on low sides of site to contain all site water run off and prevent erosion. Tie sediment fencing material to security fencing. Sediment control fabric shall be an approved material (e.g. humes propex silt stop) standing 500min above ground and extending 150 below ground. Silt barriers, silt traps, saltation screens and the like shall be constructed with geotextile sediment fabric attached to steel star pickets or security fencing, or with Hesslan bags. All to conform with the requirements of the local council and RTA.

The Contractor shall ensure all droppable soil and sediment is removed prior to construction traffic exiting the site. Builder shall ensure all construction traffic entering and leaving the site do so in a forward direction as much as possible. Site security fencing to consist of 1800m galvanised chain mesh panels fixed to galvanised pipe frame and supported on concrete "feet".

a COPYRIGHT-These drawings remain the exclusive copyright of ADM Architects. Reproductions in any form whether dectronic, digital or otherwise shall not be allowed oxcept by express permission granted in writing by ADM Architects. Holders users and operators of these drawings require proof evidenced in writing that ADM Architects has written permission to use these drawings or shall otherwise be in breach of the Copyright Act and become liable accordingly.

If ICINED DIMENSIONS- These drawings are not to be scale, figured dimensions shall be used in all cases.

NOMINIATED ARCHITECT. The nominated Architect for ADM Projects (Australia) Pty Ltd TIAS ADM Architects is Angelo Di Martino ARB No.7608

The Contractor is to carry out necessary demolition and on-site clearance in accordance with AS 2601 (Demolition of Structures) on the subject site. This is applicable to demolition of existing buildings, structures and services including planning and excustion of the work, protection and support of adjacent structures and removal of detmiles the material. Demolished materials, hazardous materials (particularly if found in the renovations to the

ISSUE	DATE	DESCRIPTION
Α	I 0.07.18	ISSUE FOR DEVELOPMENT APPLICATION

NOT FOR CONSTRUCTION



94 Kembla St, Wollongong NSW 2500 PO Box 3061 Wollongong ph: 02 4228 6400 fax: 02 4228 6455 www.admarchitects.com.au

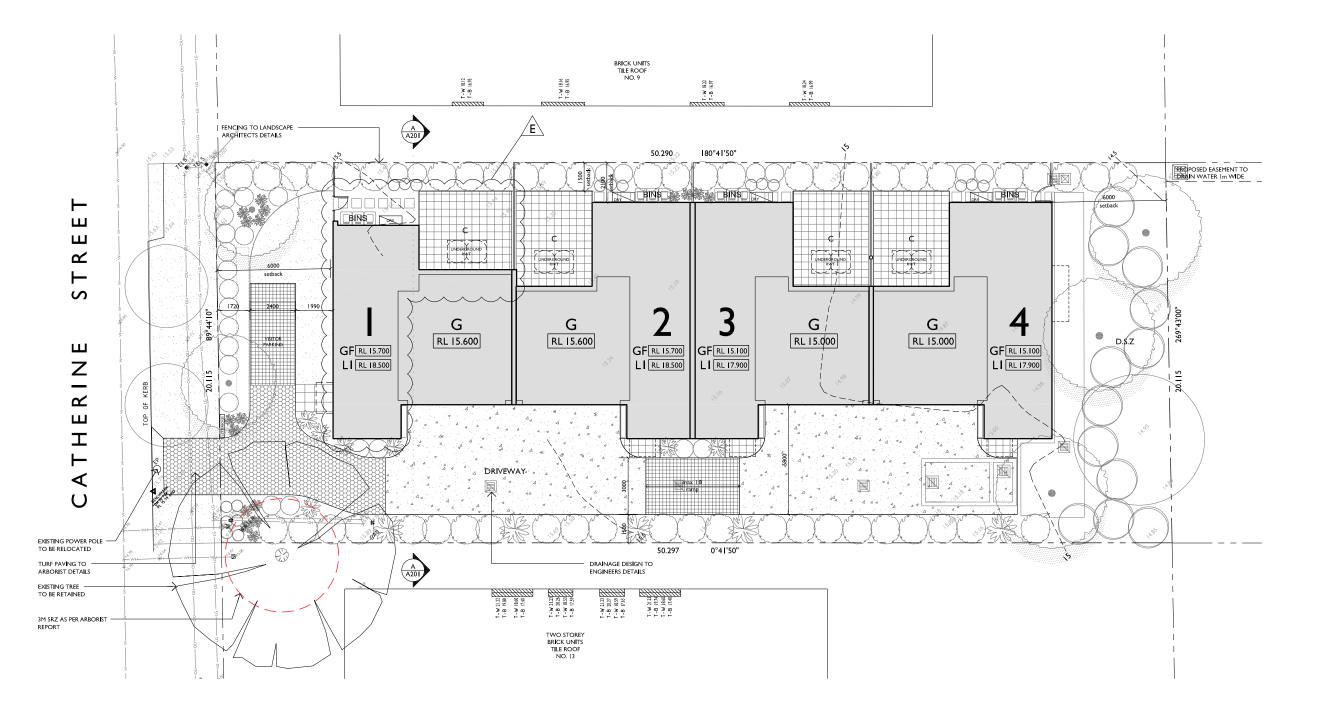
PROPOSED RESIDENTIAL DEVELOPMENT

II CATHERINE STREET **GWYNNEVILLE**

KOSTOVSKI & BLAZEVSKI

DEVELOPMENT APPLICATION DEMOLITION & SITE MANAGEMENT PLAN

Scale		Date	
NTS		JULY 20	18
Drawn		Checked	
MC SP DQ		ADM	
Project No. Drawing		No.	Issue
2017-35	7-35 A-002		A





SITE PLAN

REFER TO CIVIL ENGINEER'S DOCUMENTATION FOR STORMWATER COLLECTION & ALL EXTERNAL SURFACE LEVELS.

o COPYRIGHT-These drawings remain the exclusive copyright of ADM Architects. Reproductions in any form whether electronic, digital or otherwise shall not be allowed except by express permission granted in writing by ADM Architects. Holders users and operators of these drawings require proof evidenced in writing that ADM Architects has written permission to use these drawings or shall otherwise be in breach of the Copyright Act and become liable accordingly.

I RIGURED DIMENSIONS. These drawings are not to be scaled, figured dimensions shall be used in all cases.

I NOMINITED ARCHITECT. The nominated Architect for ADM Projects (Australia) Fly Ltd T/AS ADM Architects is Angelo Di Martino ARB No.7608

ISSUE	DATE	DESCRIPTION
Α	10.07.18	ISSUE FOR DEVELOPMENT APPLICATION
В	03.09.18	RE-ISSUED FOR DA
С	13.09.18	RE-ISSUED FOR DA
D	1 4.09.18	RE-ISSUED FOR DA
E	[7.09. 8	RE-ISSUED FOR DA

NOT FOR CONSTRUCTION

GFA BREAKDOWN		
UNIT I		
	GROUND	= 45.7m ²
	LEVEL I	= 76.3m ²
	TOTAL	= [22.0m ²
UNIT 2		
	GROUND	= 47.3m ²
	LEVEL I	= 77.6m ²
	TOTAL	= [24.9m ²
UNIT 3		
	GROUND	= 47.3m ²
	LEVEL	= 77.6m ²
	TOTAL	= 124.9m ²
UNIT 4		
	GROUND	= 45.7m ²
	LEVEL I	= 76.3m ²
	TOTAL	= [22.0m ²
OVERALL GFA		
	TOTAL	= 493.8m ²



94 Kembla St, Wollongong NSW 2500 PO Box 3061 Wollongong ph: 02 4228 6400 fax: 02 4228 6455 www.admarchitects.com.au

PROPOSED RESIDENTIAL DEVELOPMENT

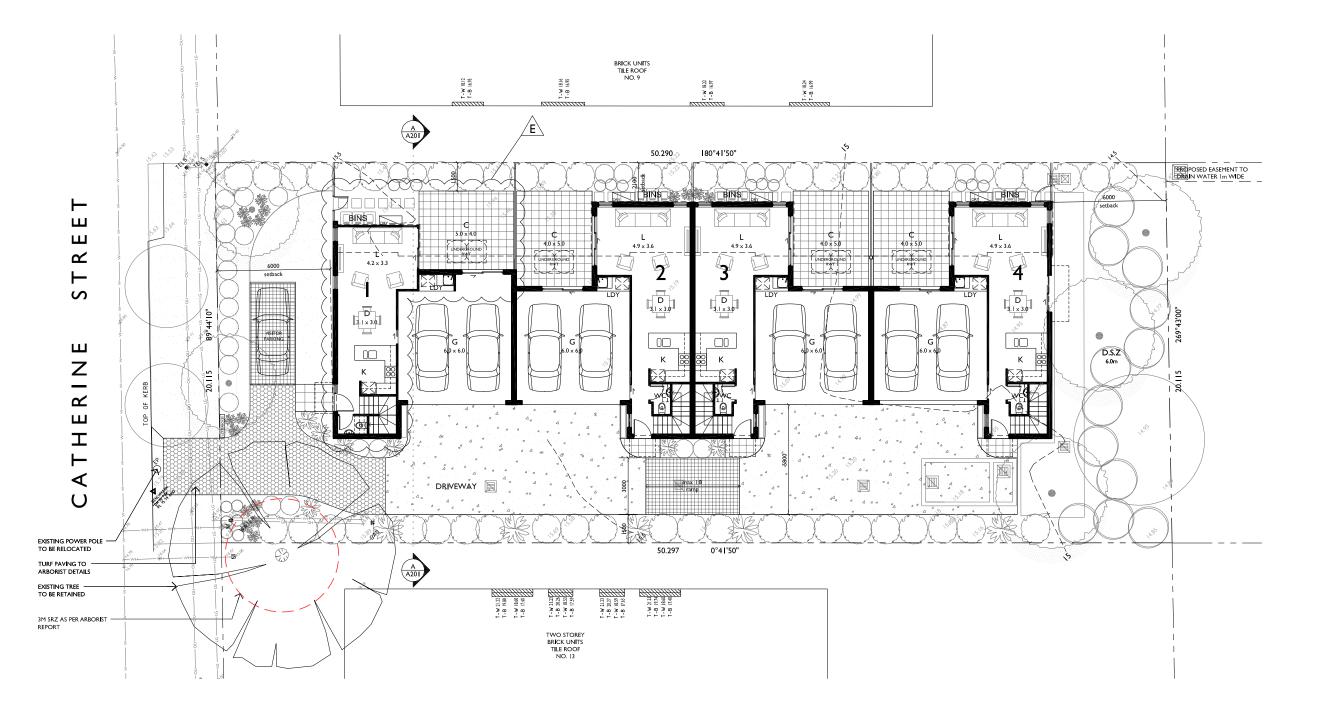
II CATHERINE STREET

GWYNNEVILLE

KOSTOVSKI & BLAZEVSKI

DEVELOPMENT APPLICATION SITE PLAN

Scale	D	ate
I:200 @ A3	SI	EPTEMBER 2018
Drawn	С	hecked
MC SP	A	DM
Project No.	Drawing No	. Issue
2017-35	A-100	E





o COPYRIGHT-These drawings remain the exclusive copyright of ADM Architects. Reproductions in any form whether dectronic, digital or otherwise shall not be allowed except by express permission granted in writing by ADM Architects. Holders users and operators of these drawings require proof evidenced in writing that ADM Architects has written permission to use these drawings or shall otherwise be in breach of the Copyright Act and become liable accordingly.

of IGURED DIMENSIONS- These drawings are not to be scaled, figured dimensions shall be used in all cases.

NOMINATED ARCHITECT: The nominated Architect for ADM Projects (Australia) Pty Ltd TIAS ADM Architects is Angelo Di Martino ARB No.7608

·				
ISSUE	DATE	DESCRIPTION		
Α	10.07.18	ISSUE FOR DEVELOPMENT APPLICATION		
В	03.09.18	RE-ISSUED FOR DA		
С	13.09.18	RE-ISSUED FOR DA		
D	1 4.09.18	RE-ISSUED FOR DA		
Е	[7.09. 8	RE-ISSUED FOR DA		

NOT FOR CONSTRUCTION



94 Kembla St, Wollongong NSW 2500 PO Box 3061 Wollongong ph: 02 4228 6400 fax: 02 4228 6455 www.admarchitects.com.au

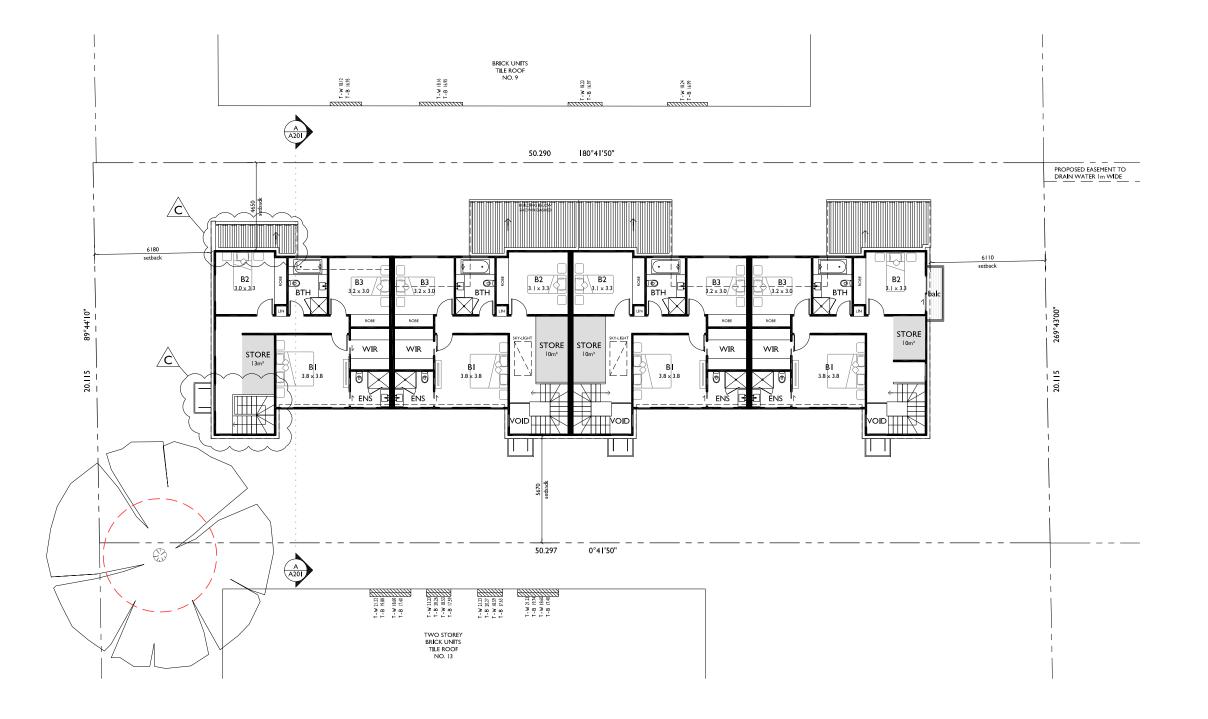
PROPOSED RESIDENTIAL DEVELOPMENT

II CATHERINE STREET GWYNNEVILLE

KOSTOVSKI & BLAZEVSKI

DEVELOPMENT APPLICATION GROUND FLOOR PLAN

Scale		Date	
I:200 @ A3		SEPTEM	IBER 2018
Drawn		Checked	
MC SP		ADM	
Project No.	Drawing	No.	Issue
2017-35	A-101		E





o COPYRIGHT-These drawings remain the exclusive copyright of ADM Architects. Reproductions in any form whether electronic, digital or otherwise shall not be allowed except by express permission granted in writing by ADM Architects. Holders users and operators of these drawings require proof evidenced in writing that ADM Architects has written permission to use these drawings or shall otherwise be in breach of the Copyright Act and become liable accordingly.

I RIGURED DIMENSIONS. These drawings are not to be scaled, figured dimensions shall be used in all cases.

I NOMINITED ARCHITECT. The nominated Architect for ADM Projects (Australia) Fly Ltd T/AS ADM Architects is Angelo Di Martino ARB No.7608

	ISSUE	DATE	DESCRIPTION		
	Α	I0.07.18	ISSUE FOR DEVELOPMENT APPLICATION		
	В	1 4.09.18	RE-ISSUED FOR DA		
	С	17.09.18	RE-ISSUED FOR DA		

NOT FOR CONSTRUCTION



94 Kembla St, Wollongong NSW 2500 PO Box 3061 Wollongong ph: 02 4228 6400 fax: 02 4228 6455 www.admarchitects.com.au

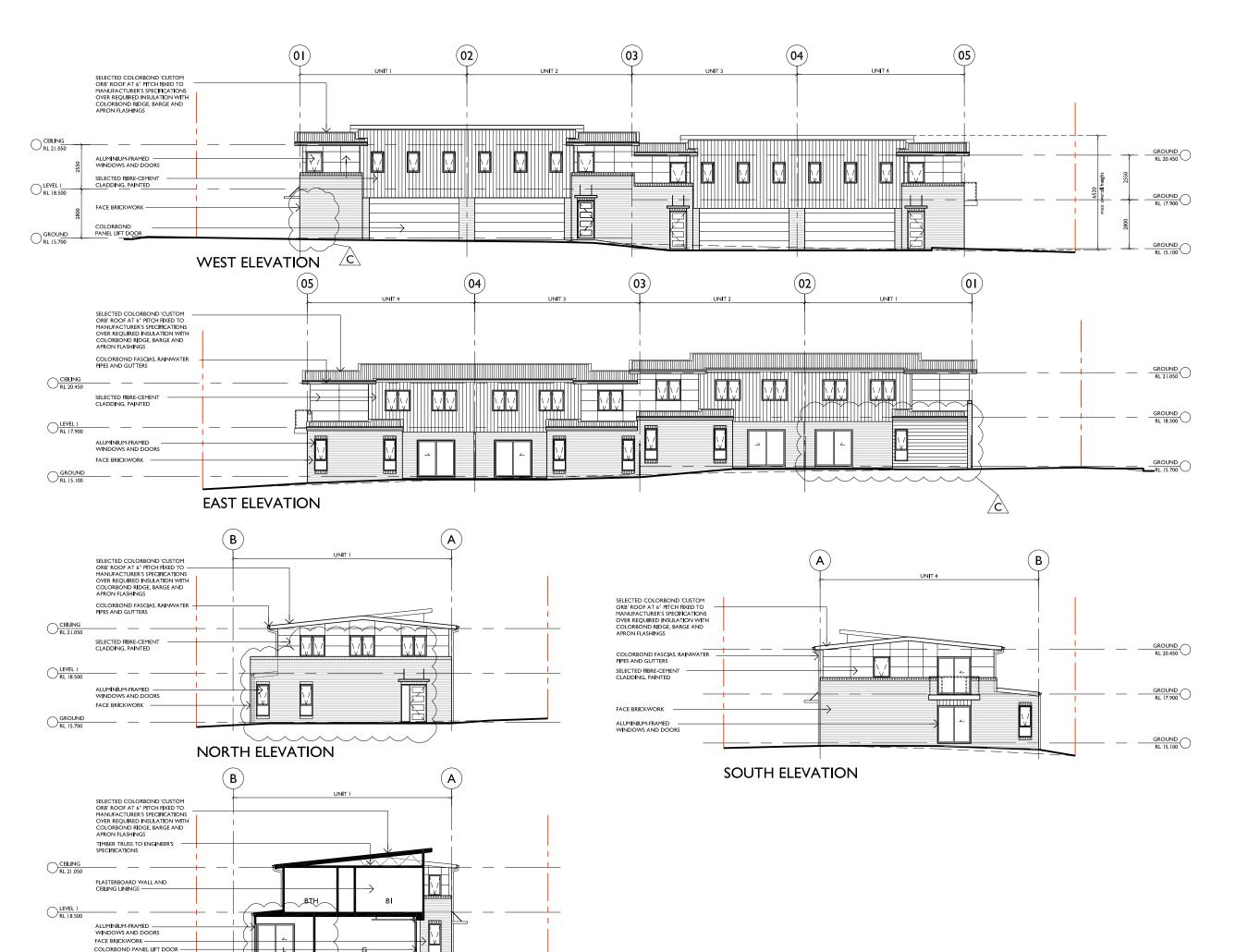
PROPOSED RESIDENTIAL DEVELOPMENT

II CATHERINE STREET GWYNNEVILLE

KOSTOVSKI & BLAZEVSKI

DEVELOPMENT APPLICATION LEVEL I FLOOR PLAN

Scale		Date	
I:200 @ A3		SEPTEM	IBER 2018
Drawn		Checked	
MC SP		ADM	
Project No.	Drawing	No.	Issue
2017-35 A-102			С



CONCRETE SLAB & FOOTINGS TO ENGINEERS DETAILS NATURAL GROUND LEVEL

SECTION AA

<u>/c\</u>

o COPYRIGHT-These drawings remain the exclusive copyright of ADM Architects. Reproductions in any form whether dectronic, digital or otherwise shall not be allowed except by express permission granted in writing by ADM Architects. Holders users and operators of these drawings require proof evidenced in writing that ADM Architects has written permission to use these drawings or shall otherwise be in breach of the Copyright Act and become liable accordingly.

I RIGURED DIMENSIONS- These drawings are not to be scale, figured dimensions shall be used in all cases.

I NOMINATED ARCHITECT. The nominated Architect for ADM Projects (Australia) By Ltd TIAS ADM Architects is Angelo DI Martino ARB No.7608

SSUE	DATE	DESCRIPTION
Α	10.07.18	ISSUE FOR DEVELOPMENT APPLICATION
В	I4.09.18	RE-ISSUED FOR DA
С	17.09.18	RE-ISSUED FOR DA

NOT FOR CONSTRUCTION



94 Kembla St, Wollongong NSW 2500 PO Box 3061 Wollongong ph: 02 4228 6400 fax: 02 4228 6455 www.admarchitects.com.au

PROPOSED RESIDENTIAL DEVELOPMENT

II CATHERINE STREET GWYNNEVILLE

KOSTOVSKI & BLAZEVSKI

DEVELOPMENT APPLICATION **ELEVATIONS & SECTION**

Scale		Date	
I:200 @ A3		SEPTEMBER 2018	
Drawn		Checked	
MC SP		ADM	
Project No. Drawing I		No.	Issue
2017-35 A-201			С

(Australia) Pty Ltd 1/AS ADM Architects is Angelo Di Martino ARB No.			
ISSUE	DATE	DESCRIPTION	
Α	10.07.18	ISSUE FOR DEVELOPMENT APPLICATION	
В	12.09.18	RE-ISSUED FOR DA	
С	17.09.18	RE-ISSUED FOR DA	

NOT FOR CONSTRUCTION







3pm



94 Kembla St, Wollongong NSW 2500 PO Box 3061 Wollongong ph: 02 4228 6400 fax: 02 4228 6455 www.admarchitects.com.au

PROPOSED RESIDENTIAL DEVELOPMENT

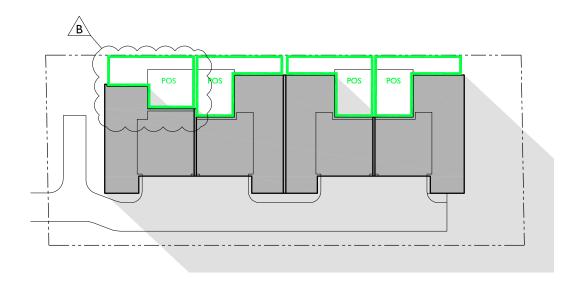
I I CATHERINE STREET GWYNNEVILLE

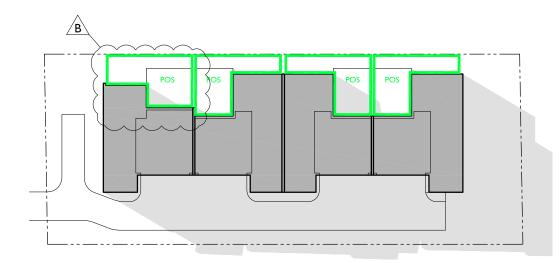
KOSTOVSKI & BLAZEVSKI

DEVELOPMENT APPLICATION SHADOW ANALYSIS

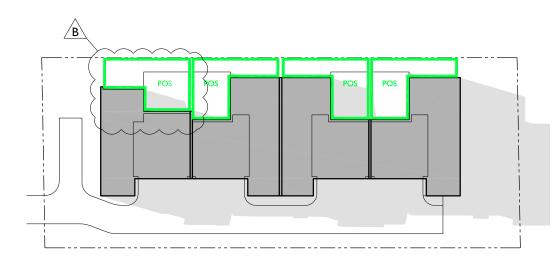
Scale		Date	
NTS		SEPTEM	IBER 2018
Drawn		Checked	
MC SP DQ		ADM	
Project No.	Drawing I	No.	Issue
2017-35	A-301		С

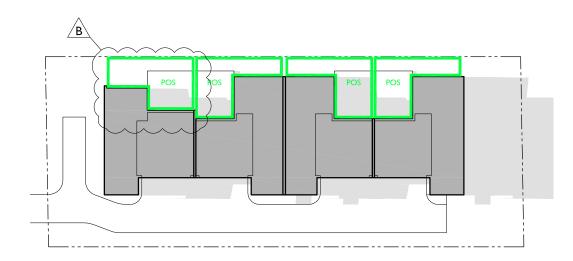
SHADOW ANALYSIS - 21ST OF JUNE





10:00am





12:00pm



09:00am



SOLAR ACCESS STUDY - 21ST OF JUNE

POS INDICATES LOCATION OF PRIVATE OPEN SPACES

(Austral	(Australia) Pty Ltd T/AS ADM Architects is Angelo Di Martino ARB No./608					
ISSUE DATE DESCRIPTION						
Α	1 4.09.18	ISSUED FOR DA				
В	1 7.09.18	RE-ISSUED FOR DA				

NOT FOR CONSTRUCTION



94 Kembla St, Wollongong NSW 2500 PO Box 3061 Wollongong ph: 02 4228 6400 fax: 02 4228 6455 www.admarchitects.com.au

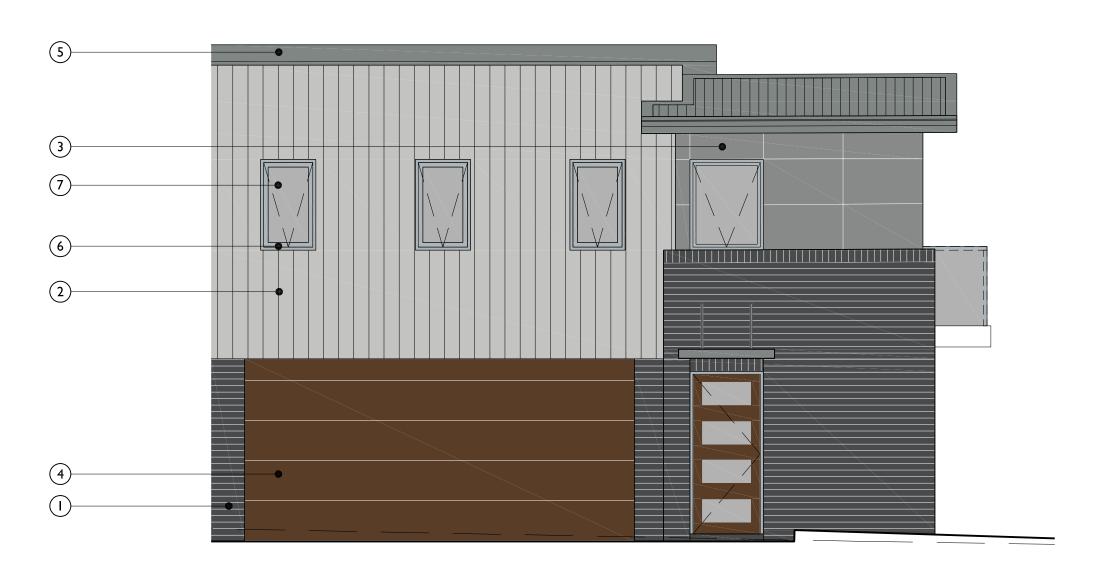
PROPOSED RESIDENTIAL DEVELOPMENT

II CATHERINE STREET GWYNNEVILLE

KOSTOVSKI & BLAZEVSKI

Title
DEVELOPMENT APPLICATION
SOLAR ACCESS STUDY

Scale		Date	
NTS		SEPTEM	1BER 2018
Drawn		Checked	
MC SP DQ		ADM	
Project No.	Drawing I	No.	Issue
2017-35	A-303		В



COLOUR & MATERIALS SCHEDULE



o COPYRIGHT-These drawings remain the exclusive copyright of ADM Architects. Reproductions in any form whether dectronic, digital or otherwise shall not be allowed except by express permission granted in writing by ADM Architects. Holders users and operators of these drawings require proof evidenced in writing that ADM Architects has written permission to use these drawings or shall otherwise be in breach of the Copyright Act and become liable accordingly.

of RGURED DIMENSIONS- These drawings are not to be scaled, figured dimensions shall be used in all cases.

NOMINATED ARCHITECT: The nominated Architect for ADM Projects (Australia) Pty Ltd TIAS ADM Architects is Angelo Di Martino ARB No.7608

ISSUE	DATE	DESCRIPTION
Α	I 0.07.18	ISSUE FOR DEVELOPMENT APPLICATION

NOT FOR CONSTRUCTION



94 Kembla St, Wollongong NSW 2500 PO Box 3061 Wollongong ph: 02 4228 6400 fax: 02 4228 6455 www.admarchitects.com.au

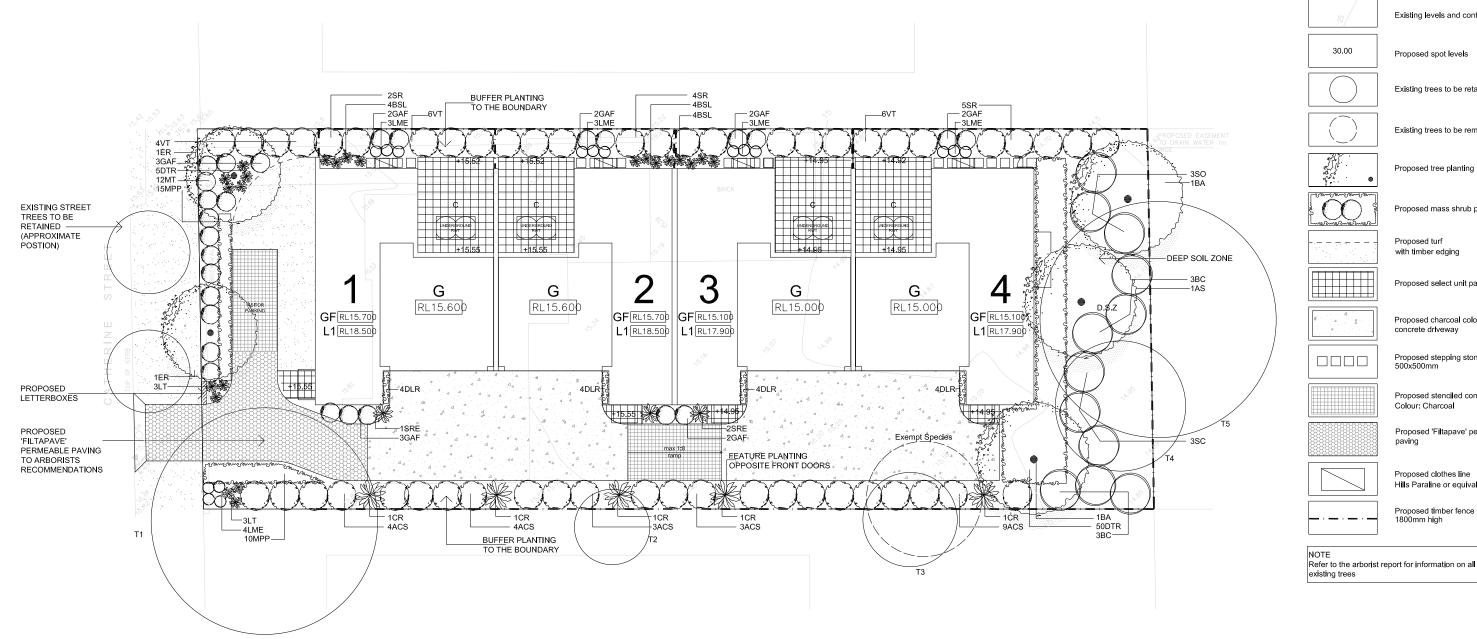
PROPOSED RESIDENTIAL DEVELOPMENT

II CATHERINE STREET GWYNNEVILLE

KOSTOVSKI & BLAZEVSKI

DEVELOPMENT APPLICATION
COLOUR & MATERIALS SCHEDULE

Scale		Date	
NTS		JULY 2018	
Drawn		Checked	
MC SP DQ		ADM	
Project No.	Drawing	No.	Issue
2017-35	A-302		Α



וכ	A NIT	SCHEDULE	
ᆫ	жи.	SCHEDULE	_

PLAI	NI SCHEDULE				
CODE	BOTANIC NAME	COMMON NAME	Nos	POT SIZE	STAKES
	TREES				
As	Acmena smithii	Lilly Pilly	1	75 Litre	1 OF
Er	Elaeocarpus reticulatus 'Prima Donna'	Blueberry Ash	2	75 Litre	1 OF
Ва	Brachychiton acerifolius	IIIwarra Flame Tree	2	75 Litre	1 OF
	SHRUBS				
Acs	Acmena 'Cherry Surprise'	Dwarf Lilly Pilly	6	200mm	
Bc	Backhousia citriodora	Lemon Myrtle	6	200mm	
Cr	Cycas revoluta	Japanese Sago	5	200mm	
Gaf	Gardenia augusta 'Florida'	Gardenia	16	200mm	
Mt	Metrosideros 'Tahiti'	NZ Xmas Bush	12	200mm	
Sc	Syzigium 'Cascade'	Brush Cherry	11	200mm	
Sr	Syzigium 'Resilience'	Brush Cherry	3	200mm	
So	Syzlglum oleosum	Brush Cherry	3	200mm	
Sre	Strelitzia reginae	Bird of Paradise	3	200mm	
Vt	Viburnum tinus	Sweet Viburnum	16	200mm	
	GROUND COVERS AND ACCENTS				
Bsl	Blechnum 'Silver lady'	Silver Fern	12	150mm	
Dtr	Dianella 'Tas Red'	Paroo Lilly	55	150mm	
D i r	Dianella 'Little Rev'	Paroo Lilly	16	150mm	
Lme	Liriope 'Evergreen Giant'	Turf Lilly	16	150mm	
Мрр	Myoporum parvifolium 'Purpurea'	Creeping Boobialla	25	150mm	
Lt	Lomandra 'Tanika'	Fan Flower	6	150mm	

NOTES

The Landscape Plan to be read in conjunction with Site Plan, Landscape Details, and Stormwater Plan.

No changes to be made to nominated species in Planting Schedule without prior approval of the Landscape Architect. No variegated species to be used

Before landscape work is commenced, the Contractor is to establish the position of all service lines Service Ilds, vents and hydrants shall be left exposed and not covered by any landscape finishes (turfing, paving, garden beds etc.) Phone Dial-before-you-dig prior to commencement of works on site

SPECIFICATION

GROUND PREPARATION: Eradicate grass and weeds using a non residual glyphosate herbicide at the

recommended rate.

All mass planted beds shall be cultivated by ripping or harrowing. Do not rip within the dripline of trees and

An inass planted uses steam of curvated by injury of inationary. On the light with the strain of the

2 PLANTING MIXTURE shall be three parts by volume on-site topsoil and one part organic compost mixed to a homogenous blend prior to installation and spread to a minimum depth of 250mm. Test pH levels to ensure a reading of between 6 - 7, Higher or lower pH levels shall be adjusted in consultation with the project Landsape Architect.

Planting mix in raised planters shall be equal to Australian Native Landsapes or Soilco Planter mix.

Spread planting mixture or topsoil on the prepared subsoil and grade evenly. Ensure that finished levels are achieved after light compaction. Grass areas shall be finished flush with adjacent hard surfaces including paths, kerbs and mowing strips or garden edging.

Compact lightly in uniform 150mm layers and ensure final surface is graded to drain freely without ponding. Topsoil shall be spread to typical depths: 225mm for planting areas, 100mm for grass areas.

TURF shall be of an even thickness, free from weeds and other foreign matter and shall be layed within 36 hours of cutting. Lay turf in stretcher bond pattern to finish flush after tamping with adjacent finished surfaces. Water immediately after laying until the topsoil is moistened to full depth.

PLANTS shall have large healthy root systems with no root curl, restriction or damage. Plants shall be vigorous, well established, free from pests and disease, of good form, consistent with species. Plants will be hardened off and trees, unless required to be multi-stemmed, shall have a single leading shoot. Do not plant in extreme heat, cold, wind or rain. Thoroughly water plants before and immediately after planting.

FERTILISER shall be slow release type 'Agriform' (R) 21 gram size (or equal approved) pellets of N:P:K analysis 20:10:5.

MULCH shall be placed evenly to a consolidated depth of 75mm over all mass planted areas and shall be equal to hardwood chip or as otherwise specified. Place mulch clear of stems, rake surface flush with the surrounding finished levels.

STAKES shall be straight hardwood, free from knots or twists and pointed at one end. Drive stakes into the ground at least one third of their length, avoiding damage to the root system. Provide 50mm hessian webbing stapled to the stake to stabilise the plant. Refer to plant schedule

MAINTENANCE

- Watering sufficient to maintain continuous vigorous growth of plant material.

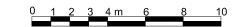
- Watering sufficient to maintain continuous vigorous growth of plant material. Remove all weeds and make good mulch in garden beds as necessary.
 Spray to control pests and diseases with non residual chemical.
 Replace plants which fail to establish with plants of similar size and quality as the originals.
 Adjust stakes and ties to plants as necessary. Ensure that strangulation of plants does not occur.
 Prune and shape trees and plants as directed or where necessary to maintain shape.
 Check once a week to ensure irrigation system is operating ownerful (fil installed).
 Make good any defects or faults arising out of defective workmanship or materials.
 Make good any eroston or soll subsidence which may occur.
 Remove all rubbish from garden beds on a weekly basis.
 Maintain 75mm depth mulch layer in planting areas. Replace mulch
 as necessary with the same materials to maintain 75mm depth over the soil surface.
 Mow all grass areas every 2 weeks in summer and spring, and every 5 weeks in winter and autumn
 Adjust mowing periods as required in unseasonal growing periods
 Maintain works for a period of 52 weeks or as otherwise directed by the Landscape Architect.

EXISTING TREE SCHEDULE

No	Botanical Name	Action
T1 T2 T3 T4 T5	Eucalyptus saligna x botryoides Grevillea spp. Grevillea spp. Brachychiton acerifolius Glochidion ferdinandi	Retain Retain Retain Retain Retain

NOTE: The above tree schedule has been extracted from the arborist's report prepared by Allied Tree Consultancy dated June 2018. Refer to the arborist's report for further details on the

NOTE: Existing trees numbers T2, T3 and T5 are indicative only and are subject to survey.





LEGEND

Existing levels and contours

Existing trees to be retained

Existing trees to be removed

Proposed mass shrub planting

Proposed select unit paving

Proposed charcoal coloured

Proposed stepping stones 500x500mm

Proposed stenciled concrete driveway

Proposed 'Filtapave' permeable

Proposed tree planting

Proposed turf

with timber edging

concrete driveway

Colour: Charcoal

Proposed clothes line Hills Paraline or equivalent

Proposed timber fence 1800mm high

paving

Proposed spot levels

ISSUE: Amended Development Application 04.09.18 ISSUE: Development Application 10.07.18 ISSUE: For Co-ordination 29.05.18

REV.A. Amend driveway and landscape 04.09.18



ochre landscape architects

PO Box 395 Wollongong NSW 2520 Level 1, 126 Crown Street Wollongong NSW 2500 Level 1, 126 Crown Street Wollongong NSW 2500 Tel. 02 4227 6427 Fax. 02 4227 6876 Email: design@ochre.net.au

PROJECT

Proposed Residential Development 11 Catherine Street GWYNNEVILLE

DRAWING TITLE

Landscape Plan

CLIENT

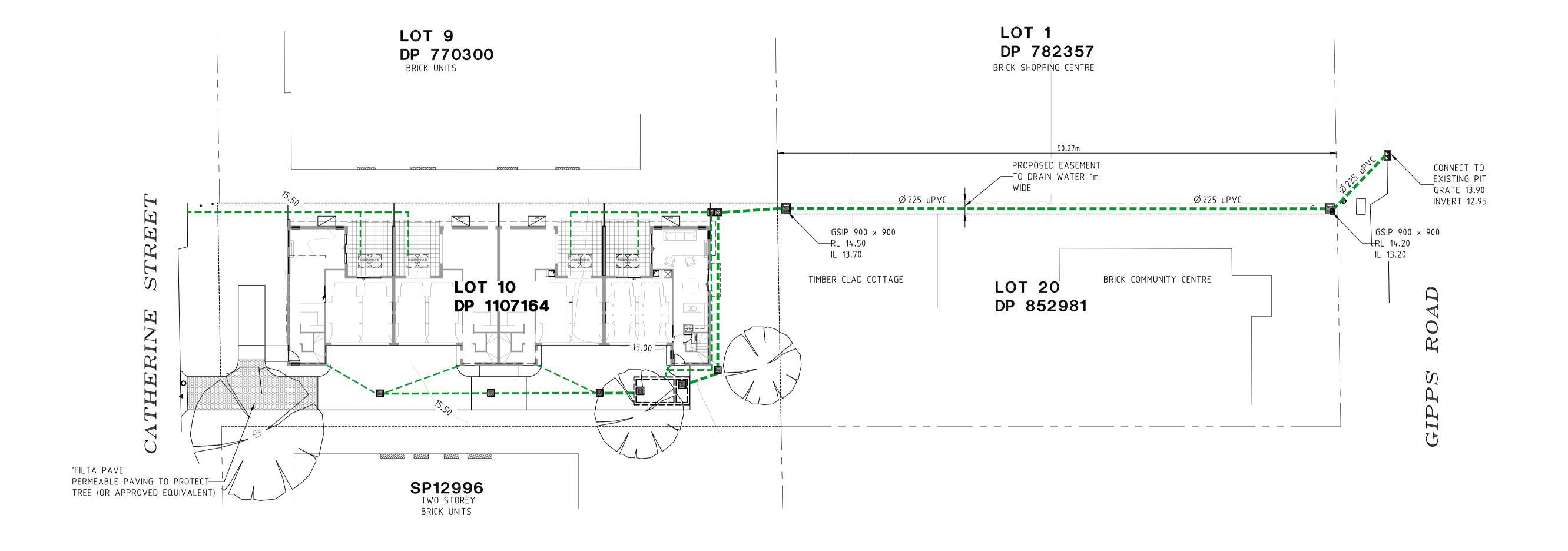
Kostovski and Blazevski

1861-LD01A

SCALE: 1:100 @ A1, 1:200 @ A3

CHECKED: TW

DATE.29.05.18





AMDI	DATE	БІ	DESCRIPTION	AMDT	DATE	БТ	DESCRIPTION
AMDT	DATE	BY	DESCRIPTION	AMDT	DATE	BY	DESCRIPTION
PI	06.06.18	DJ	ISSUED FOR INFORMATION	P4	11.07.18	Z	ISSUED FOR DEVELOPMENT APPROVAL
P2	13.06.18	DJ	ISSUED FOR INFORMATION				
P3	20.06.18	DJ	ISSUED FOR INFORMATION				





DESIGN:	DJ	CIVIL DESIGN
DRAWN:	DJ	SITE STORMWATE
DATE:	JUNE 18	SILE SIURIWWAIE
DRG SIZE:	A1	LAYOUT PLAN
SCALE:	NTS	

PROPOSED RESIDENTIAL DEVELOPMENT 11 CATHERINE STREET, LOT 10 1107164

18020026

CIVIL

STRUCTURAL

BUILDING SERVICES

DANIEL KOSTOVSKI

ATTACHMENT 3: COMPLIANCE TABLE FOR WOLLONGONG DEVELOPMENT CONTROL PLAN 2009

CHAPTER A2 - ECOLOGICALLY SUSTAINABLE DEVELOPMENT

Development controls to improve the sustainability of development throughout Wollongong are integrated into the relevant chapters of this DCP.

Generally speaking, the proposal is considered to be consistent with the principles of Ecologically Sustainable Development.

CHA	APTER B1 – RESIDENTIAL DEVELOPMENT		
4.0	General Residential controls		
Con	trols/objectives	Comment	Compliance
4.4	Site coverage	NA- applies to single dwellings, dual occupancies and secondary dwellings	N/A
4. F	ences		
•	Fences must be constructed to allow natural	The site is not flood affected.	Yes, subject
	flow of stormwater or runoff.	No details of fencing proposed –	to conditions
•	Fences within front and secondary building lines should be mainly constructed of transparent fence materials.	capable of being conditioned to comply.	
•	Any fence or related retaining wall within the front setback from the primary road frontage must be a max 1.2m in height	No retaining walls proposed	
4.10	Car parking and Access		
•	1 space per dwelling with a GFA of less than	Refer chapter E3 for parking rates	Yes
	125m²	2 car spaces required per dwelling = 8	
•	2 spaces per dwelling with a GFA of greater than 125m ²	resident spaces required which are provided in the form of double garages	
•	Car parking spaces may be open hard stand space, driveway, carport or a garage.		
•	Garage door facing roads–not greater than 50% of the width of the dwelling.		
	Carports must be setback behind the front building line.	No garage doors directly face the street	
	Garages must be setback min of 5.5 from front boundary.	NA	
	Driveways shall be separated from side boundaries by a minimum of 1m.	Complies Minimum 1.5m setback from side	
	Driveways shall have a max cross-over width of	boundaries	
	3m.	5.5m crossover width - satisfactory	
4.11	l Storage Facilities		
•	3 bedroom- 10m3 storage volume to 5m2 storage area	Each townhouse has a dedicated 10m ³ storage area to allow for adequate provision of storage.	Yes

4.12 Site Facilities

· letterboxes in an accessible location	Capable of being conditioned to	Yes, subject
 air-con, satellite dishes and other ancillary structures to be located away from street frontage, not in a place where they are a skyline feature and adequately setback 	comply.	to conditions
4.13 Fire Brigade Servicing		
 All dwellings located within 60m of a fire hydrant 	Existing hydrant located 20m to the west of the site	Yes, subject to conditions
4.14 Services		
 Encourage early consideration of servicing requirements 	Can be conditioned	Yes, subject to conditions
4.15 Development near the coastline		
	NA	NA
4.16 View sharing		
 To protect and enhance view sharing, significant view corridors 	No unreasonable view impacts are anticipated from the development given the building height is well below	Yes
 A range of view sharing measures to be considered for building design 	the maximum 9m height and slopes towards the north-east.	
4.17 Retaining walls		
 To ensure well designed retaining walls that are structurally sound 	No retaining walls proposed	NA
 Maximum height of 600mm at any distance up to 900mm setback from side or rear boundary 		
 Maximum 1m height where the toe of the retaining wall is setback greater than 900mm 		
 Retaining walls over 1m in height to be designed by structural engineer 		
4.18 Swimming pools and spas	Not applicable	NA
4.19 Development near railway corridors and major		
roads	The site does not adjoin a rail corridor	NA
The objectives are:	or major road.	
 To ensure that development near rail corridors and major roads are protected from noise and vibration 		
To ensure development does not affect the operation or rail corridors or their safety		
 To ensure compliance with the SEPP Infrastructure. 		

5.0 Attached dwellings and multi -dwelling housing

Controls/objectives Comment Compliance

5.1 Minimum Site Width Requirement

Minimum 18m site width required for multi-dwelling development as measured for the full width of the site, perpendicular to the side boundaries. This control may be varied for irregular shaped lots are where the development meets the requirements of setbacks, private open space, visual amenity, solar access, built form and landscaping.

Within R1 and R3 zones, development must not create an isolated lot

5.2 Number of Storeys

R2 low density residential zone - maximum two storeys

5.3 Front Setbacks

A minimum 6m front setback to the front façade of the building is required.

Balconies, front courtyard fences and other building extrusions may be set back up to 900mm closer.

5.4 Side and Rear Setbacks

Side and Rear Boundary Setbacks Attached and Multi-Dwelling Development				
Zone	Minimum side and rear setback	Minimum side and rear setbacks where balconies or windows of living areas face the rear boundary at first floor level or above		
All zones	1.5m	1.5m		
R2 Low Density Residential Zone	0.8 x ceiling height	1.0 x ceiling height		

Site achieves a minimum site width of 20.115m along front boundary.

NA – isolated lot provisions do not apply to the R2 Low Density Residential zone

All dwellings are 2 Yes storeys

The front setback to Townhouse 1 is 6m – complies.

The entry awning to Townhouse 1 is forward of the 6m setback, but not by more than 900mm.

Side setbacks

Eastern boundary

Ground floor

2.5m ceiling height= min. 2.1m setback required. 2.1m setback proposed to lounge rooms - complies

First floor

5.4m ceiling height = min 4.3m setback required (no upper floor living areas). 4.65m minimum setback proposed to bedrooms – complies

Western boundary

Yes

Yes

Yes

Ground floor

5.3m setback proposed (driveway on western side) - complies.

First floor

5.67m proposed complies

Rear setbacks

6.1m rear setback proposed - complies with minimum 5.4m. Balcony of townhouses' bedroom 2 faces deep soil zone however satisfies rear setback requirement of 5.4m.

5.5 Building Character and Form

Objectives

- (a) To design residential development to respond to the streetscape character. The Site and Context Analysis must inform the development proposal.
- (b) To complement and enhance the visual character of the street and neighbourhood through appropriate building scale, form and detail.
- (c) To reduce the visual dominance of garages as viewed from the street.
- (d) To promote high quality architectural design that is contemporary and innovative.
- (e) To ensure corner sites are developed as visually significant elements to promote a strong and legible character.
- To provide an identifiable and desirable street address to each building and dwelling.
- (g) To define the street edge by creating a clear transition between private and public spaces along the street frontage.
- To allow for outlook and surveillance towards the street (h) and the public domain.

All dwellings are two storeys. The front townhouse has living and dining areas facing the street to allow for outlook and surveillance towards the street.

The entrances to the dwellings are visible from the street to provide casual surveillance of the common driveway areas and the public domain.

5.6 Access / Driveway Requirements

Objectives

- (a) To provide adequate and safe vehicular access to all dwellings.
- (b) To encourage driveways to be provided from lanes or secondary streets instead of major roads or primary street frontages, where such alternate access is available.

A single driveway access is proposed on the western side of the site which will enable adequate sight Yes

Yes

i. **Controls**

- (b) Provide driveways to parking areas from lanes and secondary streets rather than the primary road or street, wherever practicable.
- (c) The number of access points to a development must be kept to a minimum.

4 - 6m maximum cross over width

distances.

5.5m driveway crossover width proposed which has been supported by Traffic Council's engineer.

5.7 Car Parking Requirements

In accordance with Part E3 of WDCP 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

Resident spaces $>110m^2 = 4$ units (8)

spaces)

Visitor spaces

 $0.2 \times 4 \text{ units} = (0.8) \ 1$ space

TOTAL required = spaces

Total provided = 9 (8 resident + 1 visitor).

5.8 Landscaping Requirements

30% landscaped area required Min. landscape width 1.5m

Site area = 1012m²

Min. $30\% = 304 \text{ m}^2$

318m² landscaped area provided (excluding areas < 1.5m wide) (31%)

5.9 Deep Soil Planting

15% site area required

Minimum DSZ dimension 6m.

Located centrally to allow overlooking, or at rear of site or elsewhere so as to retain maximum existing vegetation.

The deep soil zone may be located in any position on the site, other than forward of the building line, subject to this area having a minimum dimension of 6m.

No structures, basement carparks, driveways, hard paving, decks, balconies or drying areas are permitted within the deep DSZ.

DSZ must be a continuous area

Site area = 1012m²

Min. $15\% = 152m^2$

Deep soil zone with 6m depth is proposed along boundary rear complies

Drainage infrastructure extend into deep soil zone adjacent to eastern boundary however deep soil zone area meets the objective given it covers the rear portion of the site and retains existing Yes

Yes

Yes

	trees.	
5.10 Communal Open Space		
Required for development with more than 10 dwellings	Not required as 4 dwellings proposed	NA
5.11 Private Open Space		
POS must be provided for each unit, whether as ground floor courtyard or upper floor balcony.	POS provided to each unit in the form of	Yes
If ground level, minimum dimension 4 x5m and separated from boundary by 1.5m landscaping.	ground floor courtyards with minimum dimensions of 4m x 5m with 1.5m wide	
If balcony, minimum 8m ² and minimum dimension 2m		
Primary balcony must not address side setbacks	landscaping between POS and eastern side	
Minimum 70% of all primary POS must achieve minimum 3hrs solar access	boundary.	
POS should be sited in location which provides privacy, solar access and pleasing outlook and has a limited impact on adjoining neighbours.	The private open space of Units 1, 2 and 4 achieve 3 hours solar	
POS should be direct extension of living areas.	access (=70%) - complies	
Balconies must constitute maximum 25% of the building floor space.	All POS are located as a direct extension off living areas.	
	Clothes lines indicated as being outside POS areas	
5.12 Solar Access Requirements		
1. Windows to living rooms of adjoining dwellings must receive 3 hours of sunlight between 9.00am and 3.00pm on 21 June.	Given the north-south orientation of the site, the shadow diagrams indicate that the development will overshadow the adjoining western property (flat building)	Yes
2. At least 50% of the private open areas of adjoining residential properties must receive at least 3 hours of sunlight between 9.00am and 3.00pm on June 21.	between 9am and 11am and the adjoining eastern site in the afternoon. Adequate solar access will be maintained to both adjoining properties.	
3 The primary balcony of at least 70% of the dwellings within a multi dwelling housing development shall receive a minimum of three hours of direct sunlight between 9.00am and 3.00pm on June 21.	No balconies proposed as primary POS – refer Part 5.11 for assessment of solar access to private	

4. Windows to north facing living rooms for each of the subject dwellings in the development must receive at least 3 hours of sunlight between 9.00am and 3.00pm on 21 June.	Windows to north facing living rooms of Townhouses 1 will receive 3 hours sunlight access.	
5. At least 50% of the private open space area for each of the subject dwellings in the development must receive at least 3 hours of sunlight between 9.00am and 3.00pm on 21 June.	Townhouses 1, 2 and 4 receive at least 3 hours sunlight to 50% of their POS areas (refer solar access study in Attachment 2).	
6. Shadow diagrams will be required for hourly intervals between 9.00 am and 3.00 pm for the 21 June winter solstice period which show the extent of overshadowing upon dwellings and rear private open space areas of adjoining dwellings. In certain cases, Council may require additional hourly interval shadow diagrams for the equinox period where it is necessary to determine the full extent of overshadowing upon the dwelling and / or private open space area of an adjoining property.	The adjoining western block of flats has their balconies facing the street which will not be overshadowed by the development. The adjoining eastern site will receive shadowing in the afternoon however no units have a defined areas of private open space and the rear of the site contains open car parking.	
5.13 Additional Control for Multi Dwelling Housing - Dwelling Mix and Layout	NA – these controls relate to MDH containing more than 10 dwellings. Only 4 dwellings proposed.	NA
5.14 Additional Control for Multi Dwelling Housing - Adaptable Housing	NA – 4 dwellings proposed.	NA
5.15 Additional Control for Multi Dwelling Housing – Crime Prevention through Environmental Design		
Required to comply with Chapter E2	Good internal surveillance within the site from habitable rooms having a view of internal driveway.	Yes
	Passive surveillance over front of site gained from Townhouse 1 facing the street and the rear townhouse having a	

open space areas

view of the deep soil zone area.

CHAPTER D1: CHARACTER STATEMENTS

Gwynneville's existing character is low to medium density residential suburb which includes a small retail village centre on Gipps Road. The desired future character identifies the suburb as retaining a low to medium density character, with new medium density housing around North Wollongong railway station, Wollongong University and TAFE. The subject site is well located for medium density housing and meets the desired future character under this chapter.

CHAPTER E2: CRIME PREVENTION THROUGH ENVIRONMENTAL DESIGN				
Control/objective	Comment	Compliance		
3.1 Lighting	Can be conditioned for suitable lighting to be provided for common areas	Yes		
3.2 Natural surveillance and sightlines	Natural surveillance of internal driveway areas provided by habitable windows and entrances. Natural surveillances of the street is available through balconies and living areas facing the street.	Yes		
3.4 Building design	The front dwellings have their living areas oriented towards the street. This provides good casual surveillance of the public domain and common areas within the site. Entrances to the front dwellings are located at the front which provides additional activity and surveillance within the site.	Yes		
3.5 Landscaping	Low level landscaping within the front setback will allow for visibility to/from the site from the street.	Yes		

CHAPTER E3: CAR PARKING, ACCESS, SERVICING/LOADING FACILITIES AND TRAFFIC MANAGEMENT

The provisions of this chapter have been considered by Council and found satisfactory. The development provides for adequate parking to meet the requirements of this chapter, as outlined under B2 Residential Development. Vehicular access to the site is via a single driveway and adequate manoeuvrability within the site is available. No objection was raised to the revised driveway design from Council's Development Engineer (i.e. repositioned so that it is outside the structural root zone of the significant tree on the adjoining western site).

A variation to the location of the visitor parking space is sought and assessed as satisfactory as outlined in part 2.3.1 of the assessment report.

With regard to waste servicing, the site has sufficient width to accommodate the bins on collection day without occupying more than 50% of the site's frontage.

Council's Development Engineer has assessed the proposal as satisfactory, subject to conditions.

CHAPTER E6: LANDSCAPING

The provisions of this chapter have been considered by Council and found satisfactory. A landscape plan has been provided for the proposed development that meets the requirements for multi dwelling housing. Suitable conditions are recommended on the consent as outlined in Attachment 5.

CHAPTER F7: WASTE MANAGEMENT

The provisions of this chapter have been considered by Council and found satisfactory. A Site Waste Minimisation and Management Plan has been provided and suitable conditions for the disposal and handling of waste recommended to be imposed on the consent. Waste generated from the development post construction will be collected from Catherine Street.

CHAPTER E14 STORMWATER MANAGEMENT

A concept drainage plan has been submitted to Council in accordance with the provisions of this chapter which is included as part of Attachment 2. The rear of the site will drain to an inter-allotment drainage easement through the Council owned property at 192 Gipps Street, Gwynneville. On-site detention is also required.

The proposal has been found satisfactory by Council's Stormwater Engineers and appropriate conditions of consent will be imposed on the consent. A deferred commencement consent is recommended requiring creation of the drainage easement prior to the consent becoming operational (refer Attachment 5). It is noted that Council agreed to the easement burdening 192 Gipps Road, Gwynneville in favour of 11 Catherine Street at the Council meeting on 11 December 2017 (refer Attachment 4).

CHAPTER E17 PRESERVATION AND MANAGEMENT OF TREES AND VEGETATION

The provisions of this chapter have been considered by Council and found satisfactory. The development involves the removal of one (1) tree which is an exempt species. Council's Landscape Officer has considered the submitted Arborist Report and agrees with the recommendations, particularly regarding the protection measures required for the significant tree on the adjacent western site. The design of the driveway has been revised during the course of the assessment to locate it outside the structural root zone of this tree. Also, permeable paving in the vicinity of the tree is proposed to minimise impacts on the tree. This approach has been supported by Council's Landscape Officer and Development Engineer.

CHAPTER E21 DEMOLITION AND ASBESTOS MANAGEMENT

The provisions of this chapter have been considered by Council and found satisfactory. Conditions of consent are recommended in regard to appropriate demolition and asbestos management control measures to be in place during demolition works.

CHAPTER E22 SOIL EROSION AND SEDIMENT CONTROL

The provisions of this chapter have been considered by Council and found satisfactory. Conditions of consent are recommended in regard to appropriate sediment and erosion control measures to be in place during works.

Attachment 4 - Council Meeting minutes agreeing to creation of easement over Council land



Minutes of Ordinary Meeting of Council

11 December 2017



ITEM 21 - PROPOSED GRANT OF EASEMENT TO DRAIN WATER OVER LOT 20 DP 852981 NO 192 GIPPS ROAD, GWYNNEVILLE

The following staff recommendation was adopted as part of the Block Adoption of Items (refer Minute No 165).

COUNCIL'S RESOLUTION -

- 1 Council approve the grant of an Easement to Drain Water 1m wide over Lot 20 DP 852981 No 192 Gipps Road, Gwynneville, being the Wollongong Senior Citizens Centre and Wollongong Workshop Theatre, in favour of Lot 10 DP 1107164 No 11 Catherine Street, Gwynneville, as shown on the attachment to this report.
- Council accept the payment in the amount of \$54,000 (GST free) from the owner of Lot 10 DP 1107164 No 11 Catherine Street, Gwynneville as compensation for the grant of the easement.
- The creation of the easement be subject to approval of the applicant's development application for the redevelopment of his property at No 11 Catherine Street, Gwynneville and payment by him of all costs in the creation of the easement.
- Approval be granted to affix the Common Seal of Council to the survey plan, Section 88B Instrument and any other documentation required to give effect to this resolution.

Attachment 5 - Recommended Conditions

Consent has been granted for deferred commencement.

The development application has been determined by granting deferred commencement consent subject to the following conditions:

(i) The Development Consent shall not operate until Council has been satisfied as to the following matters:

a Creation of Drainage Easement

Documentary evidence must be provided demonstrating that the 1m wide interallotment drainage easement over Lot 20 DP 852981 (192 Gipps Road, Gwynneville) has been created

- (ii) The developer must satisfy Council, within 12 months of the date shown on the top of this consent, that the matters specified in condition number (i) have been complied with. Failure to satisfy Council within that time period will lapse this development consent.
- (iii) If compliance with the matters contained in condition number (i) results in a substantial variation to the development approved deferred commencement, a new development application must be submitted.

Once Council is satisfied that the matters contained in condition number (i) have been complied with and the developer has been notified in writing of such compliance, the following conditions shall apply in respect of the approved development:

Conditions imposed by Council as part of this Development Consent are:

Approved Plans and Specifications

The development shall be implemented substantially in accordance with the details and specifications set out on Project No 2017-35 Drawings A-100-E, A-101-E, A-102-C, A-201-C dated 17 September 2018 and A-002-A, A-302-A dated 10 July 2018 prepared by ADM Architects and any details on the application form, and with any supporting information received, except as amended by the conditions specified and imposed hereunder.

General Matters

2 Building Work - Compliance with the Building Code of Australia

All building work must be carried out in compliance with the provisions of the Building Code of Australia.

3 Construction Certificate

A Construction Certificate must be obtained from Council or an Accredited Certifier prior to work commencing.

A Construction Certificate certifies that the provisions of Clauses 139-148 of the Environmental Planning and Assessment Amendment Regulations, 2000 have been satisfied, including compliance with all relevant conditions of Development Consent and the Building Code of Australia.

Note: The submission to Council of two (2) copies of all stamped Construction Certificate plans and supporting documentation is required within **two (2)** days from the date of issue of the Construction Certificate, in the event that the Construction Certificate is not issued by Council.

4 Mailboxes

The developer must install mailboxes along street frontage of the property boundary in accordance with Australia Post Guidelines. Prominent house numbers are to be displayed, with a minimum number size of 150 mm in height for each number and letter in the alphabet.

5 Maintenance of Access to Adjoining Properties

Access to all properties not the subject of this approval must be maintained at all times and any alteration to access to such properties, temporary or permanent, must not be commenced until such time as written evidence is submitted to Council or the Principal Certifying Authority indicating agreement by the affected property owners.

6 Occupation Certificate

An Occupation Certificate must be issued by the Principal Certifying Authority prior to occupation or use of the development. In issuing an Occupation Certificate, the Principal Certifying Authority must be satisfied that the requirements of section 6.9 of the Environmental Planning and Assessment Act 1979, have been complied with as well as all of the conditions of the Development Consent.

7 Tree Retention

The developer shall retain the existing tree(s) indicated on the Landscape Plan, Ochre Landscape Architects, issue A date 4 September 2018 and/or Arborist report prepared by Allied Trees dated June 2018 consisting of tree(s) numbered 1, 2, 3, 4 and 5.

Any branch pruning, which has been given approval, must be carried out by a qualified arborist in accordance with Australian Standard AS4373-2007.

All tree protection measures are to be installed in accordance with Australian standard AS4790-2009 Protection of Trees on development Sites.

All recommendations in Arborist's Report by Allied Trees dated June 2018 pages no. 8 to 14 to be implemented including and not restricted to: remedial tree pruning, deadwooding, fencing and signage, sediment buffer, stem protection, establishing tree protection zones and watering.

8 Street Tree Removal

The developer shall remove the existing street trees.

Tree removal costs are to be borne by developer. The removal of trees, including stumps, is to be carried out by suitably qualified tree contractor. This contractor must be appropriately insured to indemnify Council against any loss or damage incurred during the above works. They must also have appropriate WH&S policies and procedures (including traffic control) to ensure that works are carried out in a safe manner and in accordance in Council's own WH&S policies.

The developer must apply for (and be granted) permission under section 138 of the roads act to work within the road reserve. Tree removal must be carried out to the satisfaction of WCC Manager of Works.

Prior to the Issue of the Construction Certificate

9 Section 73 Compliance Certificate

A Section 73 Compliance Certificate under the Sydney Water Act 1994 must be obtained from Sydney Water Corporation. Application must be made through an authorised Water Servicing Coordinator. Please refer to the "Builders and Developers" section of the web site www.sydneywater.com.au then search to "Find a Water Servicing Coordinator". Alternatively, telephone 13 20 92 for assistance.

Following application, a "Notice of Requirements" will advise of water and sewer infrastructure to be built and charges to be paid. Please make early contact with the Coordinator, since building of water/sewer infrastructure can be time consuming and may impact on other services and building, driveway or landscape design.

The Notice of Requirements must be submitted to the Principal Certifying Authority prior to issue of the Construction Certificate.

10 Endeavour Energy Requirements

The submission of documentary evidence from Endeavour Energy to the Principal Certifying Authority is required confirming that satisfactory arrangements have been made with Endeavour Energy for the provision of electricity supplies to the development prior to the release of the Construction Certificate.

Note: Applications should be made to Customer Connections – South Coast, Endeavour Energy PO Box 811 Seven Hills NSW 1730.

11 Relocation of Power Pole

The existing power pole within the verge is to be relocated to the satisfaction of Endeavour Energy prior to the release of the Construction Certificate. The design and civil works are to be carried out by an approved Electrical Engineer. All works are to be carried out at no cost to Council. Details of such compliance are to be reflected on the Construction Certificate plans.

12 Telecommunications

The submission of documentary evidence from an approved telecommunications carrier to the Principal Certifying Authority confirming that underground telecommunication services are available for this development is required prior to the issue of the Construction Certificate.

13 Car Parking and Access

The development shall make provision for a total of 9 car parking spaces. This requirement shall be reflected on the Construction Certificate plans. Any change in above parking numbers shown on the approved DA plans shall be dealt with via a section 4.55 modification to the development. The approved car parking spaces shall be maintained to the satisfaction of Council, at all times.

- The parking dimensions, internal circulation, aisle widths, kerb splay corners, head clearance heights, ramp widths and grades of the car parking areas are to be in conformity with the current relevant Australian Standard AS2890.1, except where amended by other conditions of this consent. Details of such compliance are to be reflected on the Construction Certificate plans.
- The car parking areas and internal access roads shall be separated from the landscaped bays by means of a kerb or concrete dwarf wall. All kerbs required to act as wheel stops shall have a maximum height of 100 mm above ground. These details shall be reflected on the Construction Certificate plans.

16 Structures Adjacent to Driveway

Any proposed structures adjacent to the driveway shall comply with the requirements of the current relevant Australian Standard AS2890.1 (figure 3.2 and 3.3) to provide for adequate pedestrian and vehicle sight distance. This includes, but is not limited to, structures such as signs, letterboxes, retaining walls, dense planting etc. This requirement shall be reflected on the Construction Certificate plans.

The depth and location of all services (ie gas, water, sewer, electricity, telephone, traffic lights, etc) must be ascertained and reflected on the Construction Certificate plans and supporting documentation.

18 Details of Proposed Pit and Pipeline

Details of the proposed connecting pipeline to the Council pit, within the existing drainage system shall be provided in conjunction with the detailed drainage design for the site. Connection is to be made in accordance with Wollongong City Council Standard Drawings. This requirement shall be reflected on the Construction Certificate plans and supporting documentation.

- 19 The submission of a final Landscape Plan to the Principal Certifying Authority, prior to the release of the Construction Certificate. The final Landscape Plan shall address the following requirements:
 - a schedule of proposed planting, including botanic name, common name, expected mature height and staking requirements as well as number of plants and pot sizes;
 - b the location of all proposed and existing overhead and underground service lines. The location of such service lines shall be clear of the dripline of existing and proposed trees; and
 - the driveway proposed under the canopy of existing tree 1 as described in submitted arborist report prepared by Allied Tree Consultancy dated June 2018 shall be permeable equal to 'Filtapave' and must be laid such that the finished surface levels match the existing level. Permeable paving is to be installed in accordance with the manufacturer's recommendations.

The completion of the landscaping works as per the final approved Landscape Plan is required, prior to the issue of Occupation Certificate.

The submission of certification from a suitably qualified and experienced landscape designer and drainage consultant to the Principal Certifying Authority prior to the release of the Construction Certificate, confirming that the landscape plan and the drainage plan are compatible.

21 Tree Protection and Management

The existing trees are to be retained upon the subject property and any trees on adjoining properties shall not be impacted upon during the excavation or construction phases of the development. This will require the installation and maintenance of appropriate tree protection measures, including (but not necessarily limited to) the following:

- a Installation of Tree Protection Fencing Protective fencing shall be 1.8 metre cyclone chainmesh fence, with posts and portable concrete footings. Details and location of protective fencing must be indicated on the architectural and engineering plans to be submitted to the Principal Certifying Authority prior to release of the Construction Certificate.
- b Mulch Tree Protection Zone: Areas within a Tree Protection Zone are to be mulched with minimum 75 mm thick 100% recycled hardwood chip/leaf litter mulch.

22 **Dust Suppression Measures**

The submission of details of the proposed dust suppression measures for the demolition, excavation and construction phases of the development to the Principal Certifying Authority, prior to issue of the Construction Certificate.

23 **Development Contributions**

Pursuant to Section 4.17 of the Environmental Planning and Assessment Act 1979 and the Wollongong City-Wide Development Contributions Plan (2018), a monetary contribution of \$9,130.00 (subject to indexation) must be paid to Council towards the provision of public amenities and services, prior to the release of any associated Construction Certificate.

This amount has been calculated based on the estimated cost of development and the applicable percentage rate.

The contribution amount will be subject to indexation until the date of payment. The formula for indexing the contribution is:

Contribution at time of payment = $C \times (CP2/CP1)$

Where:

\$C is the original contribution as set out in the Consent

CP1 is the Consumer Price Index; All Groups CPI; Sydney at the time the consent was issued

CP2 is the Consumer Price Index; All Groups CPI; Sydney at the time of payment

Details of CP1 and CP2 can be found in the Australian Bureau of Statistics website – Catalogue No. 6401.0 - Consumer Price Index, Australia.

The following payment methods are available:

METHOD	HOW	PAYMENT TYPE
Online	http://www.wollongong.nsw.gov.au/applicationpayments	☐ Credit Card
	Your Payment Reference: 1009418	
In Person	Wollongong City Council	☐ Cash
	Administration Building - Customer Service Centre	☐ Credit Card
	Ground Floor 41 Burelli Street, WOLLONGONG	☐ Bank Cheque
PLEASE MAKE BANK CHEQUE PAYABLE TO: Wollongong City Council		
(Personal or company cheques are not accepted)		

A copy of the Wollongong City-Wide Development Contributions Plan (2018) and accompanying Fact Sheet may be inspected or obtained from the Wollongong City Council Administration Building, 41 Burelli Street, Wollongong during business hours or on Council's web site at www.wollongong.nsw.gov.au

24 Payment of S94A Levy

Prior to release of any associated construction certificate the certifier must ensure that the S94A levy has been paid in full. In this regard the certifier must submit to Council, with the construction certificate documentation, receipts which will specify whether the levy has been paid by cash or bank cheque.

25 Property Addressing Policy Compliance

Prior to the issue of any construction certificate, the developer must ensure that any site addressing complies with Council's **Property Addressing Policy** (as amended). Where appropriate, the developer must also lodge a written request to Council's **Infrastructure Systems** & Support – Property Addressing (propertyaddressing@wollongong.nsw.gov.au), for the site addressing prior to the issue of the construction certificate. Enquiries regarding property addressing may be made by calling 4227 8660.

26 Street Trees

The developer must address the street frontage by installing street tree planting. The number and species for this development is two *Callistemon viminalis* 200 litre container size, in accordance with AS 2303:2015 Tree stock for landscape use. Street trees are to be installed in accordance with Wollongong Development Control Plan 2009 – Chapter E6: Landscaping. 'Dial Before You Dig' must be consulted prior to any excavation on site. Pot holing must be carried out to determine service location. Tree pits must be adequately mulched, plants installed and staking installed to the satisfaction of WCC Manager of Works. Staking is to consist of min. 3 x 2400 x 50 x 50mm hardwood stakes driven min 600mm into firm ground. Hessian webbing is to be utilised to secure plant stock to industry standard.

These requirements shall be reflected on the Construction Certificate plans and any supporting documentation.

27 Roofwater Drainage

All roof gutters and downpipes shall be designed to cater for a 1 in 100 year ARI storm event in accordance with the current version of AS 3500.3 - Plumbing and Drainage (Stormwater Drainage). Details of gutter/downpipe sizes and downpipe locations shall be reflected on the Construction Certificate plans.

28 Stormwater Drainage Design

A detailed drainage design for the development must be submitted to and approved by the Principal Certifying Authority prior to the release of the Construction Certificate. The detailed drainage design must satisfy the following requirements:

- Be prepared by a suitably qualified civil engineer in accordance with Chapter E14 of Wollongong City Council's Development Control Plan 2009, Subdivision Policy, conditions listed under this consent, and generally in accordance with the concept plan/s lodged for development approval, prepared by Jones Nicholson, Job No 18020026, Rev P4, dated June 2018.
- b Include details of the method of stormwater disposal. Stormwater from the development must be piped to the street stormwater pit.
- Engineering plans and supporting calculations for the stormwater drainage system are to be prepared by a suitably qualified engineer and be designed to ensure that stormwater runoff from upstream properties is conveyed through the site without adverse impact on the development or adjoining properties. The plan must indicate the method of disposal of all stormwater and must include rainwater tanks, existing ground levels, finished surface levels on all paved areas, estimated flow rates, invert levels and sizes of all pipelines.

d Overflow paths shall be provided to allow for flows of water in excess of the capacity of the pipe/drainage system draining the land, as well as from any detention storage on the land. Blocked pipe situations with 1 in 100 year ARI events shall be incorporated in the design. Overflow paths shall also be provided in low points and depressions. Each overflow path shall be designed to ensure no entry of surface water flows into any building and no concentration of surface water flows onto any adjoining property. Details of each overflow path shall be shown on the detailed drainage design.

29 On-Site Stormwater Detention (OSD) Design

The developer must provide on-site stormwater detention (OSD) storage for stormwater runoff from the development. The design and details of the OSD system must be provided in conjunction with the detailed drainage design and approved by the Principal Certifying Authority prior to the release of the Construction Certificate. The OSD design and details must satisfy the following requirements:

- a Must be prepared by a suitable qualified engineer in accordance with Chapter E14 of the Wollongong DCP 2009.
- b Must include details of the Site Storage Requirement (SSR) and Permissible Site Discharge (PSD) values for the site in accordance with Section 12.2.4 of Chapter E14 of the Wollongong DCP2009.
- c The OSD facility must be designed to withstand the maximum loadings occurring from any combination of traffic (with consideration to residential and heavy vehicles), hydrostatic, earth, and buoyancy forces. Details must be provided demonstrating these requirements have been achieved.
- d The OSD facility shall incorporate a minimum 900mm x 900mm square lockable grate for access and maintenance purposes, provision for safety, debris control screen, and a suitably graded invert to the outlet to prevent ponding.
- e Must include discharge control calculations (i.e. orifice/weir calculations) generally in accordance with Section 12.2.6 and 12.5.4 of Chapter E14 of the Wollongong DCP2009.
- f Details of the orifice plate including diameter of orifice and method of fixing shall be provided.
- Must include details of a corrosion resistant identification plaque for location on or close to the OSD facility. The plaque shall include the following information and shall be installed prior to the issue of the occupation certificate:
 - The structure is an OSD facility, being part of the stormwater drainage network, and is not to be tampered with.
 - Identification number DA-2018/848.
 - Any specialist maintenance requirements.
- h Must include a maintenance schedule for the OSD system, generally in accordance with Chapter E14 of the Wollongong DCP2009.

30 **Designated Overland Flow Paths**

Details of each overland flow path located on the site shall be provided with the detailed drainage design. Each overland flow path shall be capable of catering for the 1 in 100 year storm event flows from the contributing catchment area, and where required, direct these flows to the on-site stormwater detention facility. The overland flow path shall be free of any vegetation and/or structures that are likely to impede natural overland flow, or make provision for such obstructions, so there will be no adverse stormwater impacts upon the subject land and adjoining properties. Full Manning's calculations shall be provided on the capacity of each overland flow path. These requirements shall be reflected on the Construction Certificate plans and supporting documentation.

31 Council Footpath Reserve Works

All redundant vehicular crossings and laybacks rendered unnecessary by this development must be reconstructed to normal kerb and gutter or existing edge of carriageway treatment to match the existing. The verge from the back of kerb to the boundary must be removed and the area appropriately graded, topsoiled and turfed in a manner that conforms with adjoining road reserve. The area forward of the front boundary must be kept smooth, even and free from any trip hazards. All alterations of public infrastructure where necessary are at the developer's expense.

All new driveway laybacks and driveway crossings must be designed in accordance with Wollongong City Council Standards. Details and locations are to be shown on the Construction Certificate Plans.

32 Fencing

The development is to be provided with side and rear boundary fencing at full cost to the developer as follows:

a rear and side property boundaries (behind the building line) and private rear courtyards are to be provided with minimum 1.8 metre high brick, timber lapped and capped or colorbond fences.

This requirement is to be reflected on the Construction Certificate plans.

Prior to the Commencement of Works

33 Appointment of Principal Certifying Authority

Prior to commencement of work, the person having the benefit of the Development Consent and a Construction Certificate must:

- Appoint a Principal Certifying Authority (PCA) and notify Council in writing of the appointment irrespective of whether Council or an accredited private certifier is appointed; and
- b notify Council in writing of their intention to commence work (at least two days notice is required).

The Principal Certifying Authority must determine when inspections and compliance certificates are required.

Residential Building Work - Compliance with the Requirements of the Home Building Act 1989

Building work involving residential building work within the meaning of the Home Building Act 1989 must not be carried out unless the Principal Certifying Authority for the development to which the work relates

- a in the case of work to be done by a licensee under that Act:
 - has been informed in writing of the licensee's name, contractor license number and contact address details (in the case of building work undertaken by a contractor under the Home Building Act 1989); and
 - ii is satisfied that the licensee has complied with the requirements of Part 6 of the Home Building Act 1989; or
- b in the case of work to be done by any other person:
 - i has been informed in writing of the persons name, contact address details and owner-builder permit number; and
 - has been given a declaration signed by the property owner(s) of the land that states that the reasonable market cost of the labour and materials involved in the work is less than the amount prescribed for the purposes of the definition of owner-builder work in Section 29 of the Home Building Act 1989 and is given appropriate information and declarations under paragraphs (a) and (b) whenever arrangements for the doing of the work are changed in such a manner as to render out of date any information or declaration previously given under either of those paragraphs.

Note: A certificate issued by an approved insurer under Part 6 of the Home Building Act 1989 that states that the specific person or licensed contractor is the holder of an insurance policy

issued for the purposes of that Part of the Act is, for the purposes of this condition, sufficient evidence that the person has complied with the requirements of that Part of the Act.

35 Sign – Supervisor Contact Details

Before commencement of any work, a sign must be erected in a prominent, visible position:

- a stating that unauthorised entry to the work site is not permitted;
- b showing the name, address and telephone number of the Principal Certifying Authority for the work; and
- c showing the name and address of the principal contractor in charge of the work site and a telephone number at which that person can be contacted at any time for business purposes.

This sign shall be maintained while the work is being carried out and removed upon the completion of the construction works.

36 Temporary Toilet/Closet Facilities

Toilet facilities are to be provided at or in the vicinity of the work site on which work involved in the erection or demolition of a building is being carried out at the rate of one toilet for every 20 persons or part of 20 persons employed at the site.

Each toilet provided must be:

- a a standard flushing toilet; and
- b connected to either:
 - i the Sydney Water Corporation Ltd sewerage system or
 - ii an accredited sewage management facility or
 - iii an approved chemical closet.

The toilet facilities shall be provided on-site, prior to the commencement of any works.

37 Structural Engineer's Details

Structural engineer's details for all structurally designed building works such as reinforced concrete footings, reinforced concrete slabs and structural steelwork must be submitted to the Principal Certifying Authority, prior to the commencement of any works on the site.

38 Enclosure of the Site

The site must be enclosed with a suitable security fence to prohibit unauthorised access, to be approved by the Principal Certifying Authority. No building work is to commence until the fence is erected.

39 **Demolition Works**

The demolition of the existing structures shall be carried out in accordance with Australian Standard AS2601 (2001): The Demolition of Structures or any other subsequent relevant Australian Standard and the requirements of the SafeWork NSW.

No demolition materials shall be burnt or buried on-site. The person responsible for the demolition works shall ensure that all vehicles leaving the site carrying demolition materials have their loads covered and do not track soil or waste materials onto the road. Any unforeseen hazardous and/or intractable wastes shall be disposed of to the satisfaction of the Principal Certifying Authority. In the event that the demolition works may involve the obstruction of any road reserve/footpath or other Council owned land, a separate application shall be made to Council to enclose the public place with a hoarding or fence over the footpath or other Council owned land.

40 Demolition Notification to Surrounding Residents

Demolition must not commence unless at least two (2) days written notice has been given to adjoining residents of the date on which demolition works will commence.

41 Consultation with SafeWork NSW – Prior to Asbestos Removal

A licensed asbestos removalist must give written notice to SafeWork NSW at least five (5) days before licensed asbestos removal work is commenced.

42 Contaminated Roof Dust

Any existing accumulations of dust in ceiling voids and wall cavities must be removed prior to any demolition work commencing. Removal must take place by the use of an industrial vacuum fitted with a high efficiency particulate air (HEPA) filter.

43 Waste Management

The developer must provide an adequate receptacle to store all waste generated by the development pending disposal. The receptacle must be regularly emptied and waste must not be allowed to lie or accumulate on the property other than in the receptacle. Consideration should be given to the source separation of recyclable and reusable materials.

44 All-weather Access

An all-weather stabilised access point must be provided to the site to prevent sediment leaving the site as a result of vehicular movement. Vehicular movement should be limited to this single accessway.

45 Supervising Arborist – Tree Inspection and Installation of Tree Protection Measures

Prior to the commencement of any demolition, excavation or construction works, the supervising arborist must certify in writing that tree protection measures have been inspected and installed in accordance with the arborist's recommendations and relevant conditions of this consent.

46 Certification from Arborist - Adequate Protection of Trees to be Retained

A qualified arborist is required to be engaged for the supervision of all on-site excavation or land clearing works. The submission of appropriate certification from the appointed arborist to the Principal Certifying Authority is required which confirms that all trees and other vegetation to be retained are protected by fencing and other measures, prior to the commencement of any such excavation or land clearing works.

47 Application for Occupation, Use, Disturbance or Work on Footpath/Roadway

Any occupation, use, disturbance or work on the footpath or road reserve for construction purposes, which is likely to cause an interruption to existing pedestrian and/or vehicular traffic flows requires Council consent under Section 138 of the Roads Act 1993. An application must be submitted and approved by Council prior to the works commencing where it is proposed to carry out activities such as, but not limited to, the following:

- a Digging or disruption to footpath/road reserve surface;
- b Loading or unloading machinery/equipment/deliveries;
- c Installation of a fence or hoarding;
- d Stand mobile crane/plant/concrete pump/materials/waste storage containers;
- e Pumping stormwater from the site to Council's stormwater drains;
- f Installation of services, including water, sewer, gas, stormwater, telecommunications and power;
- g Construction of new vehicular crossings or footpaths;
- h Removal of street trees;
- i Carrying out demolition works.

The arrangements and costs associated with any adjustment to a public utility service shall be borne by the applicant/developer. Any adjustment, deletion and/or creation of public utility easements associated with the approved works are the responsibility of the applicant/developer. The submission of documentary evidence to the Principal Certifying Authority which confirms that satisfactory arrangements have been put in place regarding any adjustment to such services is required prior to any works commencing on site.

49 Relocation of State Survey Marks

In accordance with Section 24(1) of the Surveying and Spatial Information Act 2002 a person must not remove, damage, destroy, displace, obliterate or deface any survey mark unless authorised to do so by the Surveyor General. In this regard any proposed construction work that may affect a State Survey Mark cannot be undertaken until a registered surveyor is engaged to

arrange its relocation, in accordance with the requirements of the NSW Government Land and Property Information.

50 **Dilapidation Report**

The developer shall submit a Dilapidation Report recording the condition of the existing streetscape, street trees and adjoining reserve prior to work commencing and include a detailed description of elements and photographic record.

51 Works in Road Reserve - Minor Works

Approval, under Section 138 of the Roads Act must be obtained from Wollongong City Council's Development Engineering Team prior to any works commencing or any proposed interruption to pedestrian and/or vehicular traffic within the road reserve caused by the construction of this development.

The application form for Works within the Road Reserve – Section 138 Roads Act can be found on Council's website. The form outlines the requirements to be submitted with the application, to give approval to commence works under the roads act. It is advised that all applications are submitted and fees paid, 5 days prior to the works within the road reserve are intended to commence. The Applicant is responsible for the restoration of all Council assets within the road reserve which are impacted by the works/occupation. Restoration must be in accordance with the following requirements:

- a All restorations are at the cost of the Applicant and must be undertaken in accordance with Council's standard document, "Specification for work within Council's Road reserve".
- b Any existing damage within the immediate work area or caused as a result of the work/occupation, must also be restored with the final works.

52 Protection of Public Infrastructure

Council must be notified in the event of any existing damage to any of its infrastructure such as the road, kerb and gutter, road shoulder, footpath, drainage structures and street trees fronting the development site, prior to commencement of any work.

Adequate protection must be provided for Council infrastructure prior to work commencing and during building operations.

Any damage to Council's assets shall be made good, prior to the issue of any Occupation Certificate or commencement of the operation.

During Demolition, Excavation or Construction

No Adverse Run-off Impacts on Adjoining Properties

The design of the development shall ensure there are no adverse effects to adjoining properties as a result of flood or stormwater run-off. Attention must be paid to ensure adequate protection for buildings against the ingress of surface run-off.

Allowance must be made for surface run-off from adjoining properties. Any redirection or treatment of that run-off must not adversely affect any other property.

54 Copy of Consent to be in Possession of Person carrying out Tree Removal

The applicant/developer must ensure that any person carrying out tree removal/vegetation clearance is in possession of this development consent and/or the approved landscape plan, in respect to the trees/vegetation which have/has been given approval to be removed in accordance with this consent.

55 Restricted Hours of Construction Work

The developer must not carry out any work, other than emergency procedures, to control dust or sediment laden runoff outside the normal working hours, namely, 7.00 am to 5.00 pm, Monday to Saturday, without the prior written consent of the Principal Certifying Authority and Council. No work is permitted on public holidays or Sundays.

Any request to vary these hours shall be submitted to the Council in writing detailing:

- a the variation in hours required (length of duration);
- b the reason for that variation (scope of works);

- c the type of work and machinery to be used;
- d method of neighbour notification;
- e supervisor contact number;
- f any proposed measures required to mitigate the impacts of the works.

Note: The developer is advised that other legislation may control the activities for which Council has

granted consent, including but not limited to, the Protection of the Environment Operations Act 1997.

Asbestos – Removal, Handling and Disposal Measures/Requirements Asbestos Removal by a Licensed Asbestos Removalist

The removal of any asbestos material must be carried out by a licensed asbestos removalist if over 10 square metres in area of non-friable asbestos, or if any type of friable asbestos in strict accordance with SafeWork NSW requirements (http://www.safework.nsw.gov.au).

57 Asbestos Waste Collection, Transportation and Disposal

Asbestos waste must be prepared, contained, transported and disposed of in accordance with SafeWork NSW and NSW Environment Protection Authority requirements. Asbestos waste must only be disposed of at a landfill site that can lawfully receive this this type of waste. A receipt must be retained and submitted to the Principal Certifying Authority, and a copy submitted to Council (in the event that Council is not the Principal Certifying Authority), prior to commencement of the construction works.

58 Acid Sulfate Soils

The Wollongong Local Environmental Plan 2009 Acid Sulfate Soils Map has identified that this property may be affected by classes 3, 4 or 5 Acid Sulfate Soils. Acid Sulfate Soils contain iron sulfides which, when exposed to air due to drainage or disturbance, may produce sulfuric acid and release toxic quantities of iron, aluminium and heavy metals. The Acid Sulfate Soils Map is an indication only and you are advised that you may encounter acid sulfate soils during the excavation for the proposed development.

Any spoil material extracted or excavated from the foundations must be neutralised with commercial lime (calcium bicarbonate) be the addition of 10 kilograms of lime per 1 cubic metre of spoil material before it is disposed of or re-used on-site. Lime is to be added by evenly distributing over all exposed surface areas, drilled piers and footing trenches on the site, prior to pouring concrete.

Council suggests the applicant refer to the Acid Sulfate Soils Assessment Guidelines contained in the Acid Sulfate Soils Manual, prepared by NSW Acid Sulfate Management Advisory Committee, August 1998 for further information.

59 **Provision of Waste Receptacle**

The developer must provide an adequate receptacle to store all waste generated by the development, pending disposal. The receptacle must be regularly emptied and waste must not be allowed to lie or accumulate on the property other than in the receptacle. Consideration should be given to the source separation of recyclable and re-usable materials.

60 Excess Excavated Material – Disposal

Excess excavated material shall be classified according to the NSW Environment Protection Authority's Waste Classification Guidelines – Part 1: Classifying Waste (2014) prior to being transported from the site and shall be disposed of only at a location that may lawfully receive that waste

61 **BASIX**

All the commitments listed in each relevant BASIX Certificate for the development must be fulfilled in accordance with Clause 97A(2) of the Environmental Planning & Assessment Regulation 2000.

A relevant BASIX Certificate means:

- A BASIX Certificate that was applicable to the development when this development consent was granted (or, if the development consent is modified under section 4.55 of the Environmental Planning & Assessment Act 1979, a BASIX Certificate that is applicable to the development when this development consent is modified); or
- if a replacement BASIX Certificate accompanies any subsequent application for a construction certificate, the replacement BASIX Certificate; and
- BASIX Certificate has the meaning given to that term in the Environmental Planning & Assessment Regulation 2000."

62 Provision of Taps/Irrigation System

The provision of common taps and/or an irrigation system is required to guarantee that all landscape works are adequately watered. The location of common taps and/or irrigation system must be implemented in accordance with the approved Landscape Plan.

63 **Pipe Connections**

All pipe connections to existing stormwater drainage systems within the road reserve shall be constructed flush with the pit wall in accordance with good engineering practice. The developer shall ensure that the condition of the existing stormwater drainage system is not compromised and that the service life of the existing stormwater drainage system is not reduced as a result of the connection.

64 Mature Plant Stock

In accordance with the tree species identified on the landscape plan, five (5) x 200 litre container mature plant stock shall be placed in appropriate locations within the property boundary of the site, including the deep soil zone.

Prior to the Issue of the Occupation Certificate

65 **Drainage**

The developer must obtain a certificate of Hydraulic Compliance (using Council's M19 form) from a suitably qualified civil engineer, to confirm that all stormwater drainage and on-site detention works have been constructed in accordance with the approved plans. In addition, full works-as-executed plans, prepared and signed by a Registered Surveyor must be submitted. These plans and certification must satisfy all the stormwater requirements stated in Chapter E14 of the Wollongong DCP2009. This information must be submitted to the Principal Certifying Authority prior to the issue of the final Occupation Certificate.

66 Restriction on Use – On-site Detention System

The applicant must create a restriction on use under the Conveyancing Act 1919 over the on-site detention system. The following terms must be included in an appropriate instrument created under the Conveyancing Act 1919 for approval of Council:

"The registered proprietor of the lot burdened must not make or permit or suffer the making of any alterations to any on-site stormwater detention system on the lot(s) burdened without the prior consent in writing of the authority benefited. The expression 'on-site stormwater detention system' shall include all ancillary gutters, pipes, drains, walls, kerbs, pits, grates, tanks, chambers, basins and surfaces designed to temporarily detain stormwater as well as all surfaces graded to direct stormwater to those structures.

Name of the authority having the power to release, vary or modify the restriction referred to is Wollongong City Council."

The instrument, showing the restriction, must be submitted to the Principal Certifying Authority for endorsement prior to the issue of the final Occupation Certificate and the use of the development.

67 BASIX

A final occupation certificate must not be issued unless accompanied by the BASIX Certificate applicable to the development. The Principal Certifying Authority must not issue the final occupation certificate unless satisfied that selected commitments have been complied with as specified in the relevant BASIX Certificate. NOTE: Clause 154B of the Environmental Planning

and Assessment Regulation 2000 provides for independent verification of compliance in relation to certain BASIX commitments.

68 Positive Covenant – On-Site Detention Maintenance Schedule

A positive covenant shall be created under the Conveyancing Act 1919, requiring the property owner(s) to undertake maintenance in accordance with the Construction Certificate approved On-Site Stormwater Detention System and Maintenance Schedule (application number to be referenced).

The instrument, showing the positive covenant must be submitted to the Principal Certifying Authority for endorsement prior to the issue of the final Occupation Certificate and the use of the development.

69 On-Site Detention – Structural Certification

The submission of a certificate from a suitably qualified practising civil and/or structural engineer to the Principal Certifying Authority is required prior to the issue of the final Occupation Certificate. This certification is required to verify the structural adequacy of the on-site detention facility and that the facility has been constructed in accordance with the approved Construction Certificate plans.

70 Completion of Landscape Works

The completion of the landscaping works as per the final approved Landscape Plan is required prior to the issue of Occupation Certificate.

Operational Phases of the Development/Use of the Site

71 Deep Soil Zone to be Maintained

The deep soil zone area approved by this consent is required to be retained as part of the development and must be maintained as a deep soil zone area at all times.

The deep soil area is defined as follows:

An area of the site that is not to be built upon, or underneath, thereby leaving an area of deep, soft soil for substantial deep-rooted vegetation, natural vegetation and natural drainage.