

BASIX[®]Certificate

Building Sustainability Index www.basix.nsw.gov.au

Multi Dwelling

Certificate number: 952452M

This certificate confirms that the proposed development will meet the NSW government's requirements for sustainability, if it is built in accordance with the commitments set out below. Terms used in this certificate, or in the commitments, have the meaning given by the document entitled "BASIX Definitions" dated 06/10/2017 published by the Department. This document is available at www.basix.nsw.gov.au

Secretary

Date of issue: Thursday, 16 August 2018

To be valid, this certificate must be lodged within 3 months of the date of issue.



Project summary		
Project name	20331	
Street address	36-38 Rodley Avenue Penrith 2750	
Local Government Area	Penrith City Council	
Plan type and plan number	deposited 33490	
Lot no.	58-59	
Section no.	-	
No. of residential flat buildings	1	
No. of units in residential flat buildings	21	
No. of multi-dwelling houses	0	
No. of single dwelling houses	0	
Project score		
Water	✔ 42	Target 40
Thermal Comfort	✔ Pass	Target Pass
Energy	✔ 29	Target 25




Certificate Prepared by

Name / Company Name: Partners Energy Management

ABN (if applicable): 15418789019

Description of project

Project address	
Project name	20331
Street address	36-38 Rodley Avenue Penrith 2750
Local Government Area	Penrith City Council
Plan type and plan number	deposited 33490
Lot no.	58-59
Section no.	-
Project type	
No. of residential flat buildings	1
No. of units in residential flat buildings	21
No. of multi-dwelling houses	0
No. of single dwelling houses	0
Site details	
Site area (m ²)	1113
Roof area (m ²)	238
Non-residential floor area (m ²)	0.0
Residential car spaces	37
Non-residential car spaces	0

Common area landscape		
Common area lawn (m ²)	350.0	
Common area garden (m ²)	0.0	
Area of indigenous or low water use species (m ²)	0.0	
Assessor details		
Assessor number	20039	
Certificate number	0003068690	
Climate zone	28	
Project score		
Water	 42	Target 40
Thermal Comfort	 Pass	Target Pass
Energy	 29	Target 25

Description of project

The tables below describe the dwellings and common areas within the project

Residential flat buildings - Building, 21 dwellings, 6 storeys above ground

Dwelling no.	No. of bedrooms	Conditioned floor area (m ²)	Unconditioned floor area (m ²)	Area of garden & lawn (m ²)	Indigenous species (min area m ²)
01	2	73.0	0.0	0.0	0.0
12	2	81.5	0.0	0.0	0.0
22	2	81.5	0.0	0.0	0.0
32	2	81.5	0.0	0.0	0.0
42	2	81.5	0.0	0.0	0.0
52	2	75.8	4.0	0.0	0.0

Dwelling no.	No. of bedrooms	Conditioned floor area (m ²)	Unconditioned floor area (m ²)	Area of garden & lawn (m ²)	Indigenous species (min area m ²)
02	3	94.4	0.0	0.0	0.0
13	3	94.4	0.0	0.0	0.0
23	3	94.4	0.0	0.0	0.0
33	3	94.4	0.0	0.0	0.0
43	3	94.4	0.0	0.0	0.0

Dwelling no.	No. of bedrooms	Conditioned floor area (m ²)	Unconditioned floor area (m ²)	Area of garden & lawn (m ²)	Indigenous species (min area m ²)
03	2	82.2	0.0	0.0	0.0
14	3	94.4	0.0	0.0	0.0
24	3	94.4	0.0	0.0	0.0
34	3	94.4	0.0	0.0	0.0
44	3	94.4	0.0	0.0	0.0

Dwelling no.	No. of bedrooms	Conditioned floor area (m ²)	Unconditioned floor area (m ²)	Area of garden & lawn (m ²)	Indigenous species (min area m ²)
11	2	81.5	0.0	0.0	0.0
21	2	81.5	0.0	0.0	0.0
31	2	81.5	0.0	0.0	0.0
41	2	81.5	0.0	0.0	0.0
51	2	83.0	6.1	0.0	0.0

Description of project

The tables below describe the dwellings and common areas within the project

Common areas of unit building - Building

Common area	Floor area (m ²)
Basement 1 - Car park	632.0
Basement 1 - Waste Room	41.0
Grd - Pump Room	8.0
All Circulation areas	130.0

Common area	Floor area (m ²)
Basement 2 - Car park area	649.0
Grd - Waste Room	17.0
Basement 2 - Storage	27.0

Common area	Floor area (m ²)
Lift car (No.1)	-
Grd - Bulky Waste	4.0
All Stairwells	102.0

Schedule of BASIX commitments

1. Commitments for Residential flat buildings - Building

(a) Dwellings

- (i) Water
- (ii) Energy
- (iii) Thermal Comfort

(b) Common areas and central systems/facilities

- (i) Water
- (ii) Energy

2. Commitments for multi-dwelling houses

3. Commitments for single dwelling houses

4. Commitments for common areas and central systems/facilities for the development (non-building specific)

- (i) Water
- (ii) Energy

Schedule of BASIX commitments

The commitments set out below regulate how the proposed development is to be carried out. It is a condition of any development consent granted, or complying development certificate issued, for the proposed development, that BASIX commitments be complied with.

1. Commitments for Residential flat buildings - Building

(a) Dwellings

(i) Water	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
(a) The applicant must comply with the commitments listed below in carrying out the development of a dwelling listed in a table below.			
(b) The applicant must plant indigenous or low water use species of vegetation throughout the area of land specified for the dwelling in the "Indigenous species" column of the table below, as private landscaping for that dwelling. (This area of indigenous vegetation is to be contained within the "Area of garden and lawn" for the dwelling specified in the "Description of Project" table).	✓	✓	
(c) If a rating is specified in the table below for a fixture or appliance to be installed in the dwelling, the applicant must ensure that each such fixture and appliance meets the rating specified for it.		✓	✓
(d) The applicant must install an on demand hot water recirculation system which regulates all hot water use throughout the dwelling, where indicated for a dwelling in the "HW recirculation or diversion" column of the table below.		✓	✓
(e) The applicant must install: <ul style="list-style-type: none"> (aa) a hot water diversion system to all showers, kitchen sinks and all basins in the dwelling, where indicated for a dwelling in the "HW recirculation or diversion" column of the table below; and (bb) a separate diversion tank (or tanks) connected to the hot water diversion systems of at least 100 litres. The applicant must connect the hot water diversion tank to all toilets in the dwelling. 		✓ ✓	✓ ✓
(e) The applicant must not install a private swimming pool or spa for the dwelling, with a volume exceeding that specified for it in the table below.	✓	✓	
(f) If specified in the table, that pool or spa (or both) must have a pool cover or shading (or both).		✓	
(g) The pool or spa must be located as specified in the table.	✓	✓	
(h) The applicant must install, for the dwelling, each alternative water supply system, with the specified size, listed for that dwelling in the table below. Each system must be configured to collect run-off from the areas specified (excluding any area which supplies any other alternative water supply system), and to divert overflow as specified. Each system must be connected as specified.	✓	✓	✓

Dwelling no.	Fixtures					Appliances		Individual pool				Individual spa		
	All shower-heads	All toilet flushing systems	All kitchen taps	All bathroom taps	HW recirculation or diversion	All clothes washers	All dish-washers	Volume (max volume)	Pool cover	Pool location	Pool shaded	Volume (max volume)	Spa cover	Spa shaded
All dwellings	3 star (> 7.5 but <= 9 L/min)	4 star	4 star	4 star	no	3.5 star	4.5 star	-	-	-	-	-	-	-

Dwelling no.	Alternative water source							
	Alternative water supply systems	Size	Configuration	Landscape connection	Toilet connection (s)	Laundry connection	Pool top-up	Spa top-up
None	-	-	-	-	-	-	-	-

(ii) Energy	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
(a) The applicant must comply with the commitments listed below in carrying out the development of a dwelling listed in a table below.			
(b) The applicant must install each hot water system specified for the dwelling in the table below, so that the dwelling's hot water is supplied by that system. If the table specifies a central hot water system for the dwelling, then the applicant must connect that central system to the dwelling, so that the dwelling's hot water is supplied by that central system.	✓	✓	✓
(c) The applicant must install, in each bathroom, kitchen and laundry of the dwelling, the ventilation system specified for that room in the table below. Each such ventilation system must have the operation control specified for it in the table.		✓	✓
(d) The applicant must install the cooling and heating system/s specified for the dwelling under the "Living areas" and "Bedroom areas" headings of the "Cooling" and "Heating" columns in the table below, in/for at least 1 living/bedroom area of the dwelling. If no cooling or heating system is specified in the table for "Living areas" or "Bedroom areas", then no systems may be installed in any such areas. If the term "zoned" is specified beside an air conditioning system, then the system must provide for day/night zoning between living areas and bedrooms.		✓	✓
(e) This commitment applies to each room or area of the dwelling which is referred to in a heading to the "Artificial lighting" column of the table below (but only to the extent specified for that room or area). The applicant must ensure that the "primary type of artificial lighting" for each such room in the dwelling is fluorescent lighting or light emitting diode (LED) lighting. If the term "dedicated" is specified for a particular room or area, then the light fittings in that room or area must only be capable of being used for fluorescent lighting or light emitting diode (LED) lighting.		✓	✓

(ii) Energy	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
(f) This commitment applies to each room or area of the dwelling which is referred to in a heading to the "Natural lighting" column of the table below (but only to the extent specified for that room or area). The applicant must ensure that each such room or area is fitted with a window and/or skylight.	✔	✔	✔
(g) This commitment applies if the applicant installs a water heating system for the dwelling's pool or spa. The applicant must: (aa) install the system specified for the pool in the "Individual Pool" column of the table below (or alternatively must not install any system for the pool). If specified, the applicant must install a timer, to control the pool's pump; and (bb) install the system specified for the spa in the "Individual Spa" column of the table below (or alternatively must not install any system for the spa). If specified, the applicant must install a timer to control the spa's pump.		✔ ✔	
(h) The applicant must install in the dwelling: (aa) the kitchen cook-top and oven specified for that dwelling in the "Appliances & other efficiency measures" column of the table below; (bb) each appliance for which a rating is specified for that dwelling in the "Appliances & other efficiency measures" column of the table, and ensure that the appliance has that minimum rating; and (cc) any clothes drying line specified for the dwelling in the "Appliances & other efficiency measures" column of the table.		✔ ✔ ✔	✔
(i) If specified in the table, the applicant must carry out the development so that each refrigerator space in the dwelling is "well ventilated".		✔	

	Hot water	Bathroom ventilation system		Kitchen ventilation system		Laundry ventilation system	
Dwelling no.	Hot water system	Each bathroom	Operation control	Each kitchen	Operation control	Each laundry	Operation control
All dwellings	central hot water system 1	individual fan into central duct + VSD	interlocked to light	individual fan, not ducted	manual switch on/off	individual fan into central duct + VSD	interlocked to light

Dwelling no.	Cooling		Heating		Artificial lighting						Natural lighting	
	living areas	bedroom areas	living areas	bedroom areas	No. of bedrooms &/or study	No. of living &/or dining rooms	Each kitchen	All bathrooms/toilets	Each laundry	All hallways	No. of bathrooms &/or toilets	Main kitchen
03	1-phase airconditioning EER 3.5 - 4.0	1-phase airconditioning EER 3.5 - 4.0	1-phase airconditioning EER 3.5 - 4.0	1-phase airconditioning EER 3.5 - 4.0	2 (dedicated)	1 (dedicated)	yes (dedicated)	yes (dedicated)	yes (dedicated)	yes (dedicated)	0	no
51, 52	1-phase airconditioning EER 3.5 - 4.0	1-phase airconditioning EER 3.5 - 4.0	1-phase airconditioning EER 3.5 - 4.0	1-phase airconditioning EER 3.5 - 4.0	2 (dedicated)	1 (dedicated)	yes (dedicated)	yes (dedicated)	yes (dedicated)	yes (dedicated)	1	no
01, 11, 12, 21, 22, 31, 32, 41, 42	1-phase airconditioning EER 3.5 - 4.0	1-phase airconditioning EER 3.5 - 4.0	1-phase airconditioning EER 3.5 - 4.0	1-phase airconditioning EER 3.5 - 4.0	2 (dedicated)	1 (dedicated)	yes (dedicated)	yes (dedicated)	yes (dedicated)	yes (dedicated)	0	yes
All other dwellings	1-phase airconditioning EER 3.5 - 4.0	1-phase airconditioning EER 3.5 - 4.0	1-phase airconditioning EER 3.5 - 4.0	1-phase airconditioning EER 3.5 - 4.0	3 (dedicated)	1 (dedicated)	yes (dedicated)	yes (dedicated)	yes (dedicated)	yes (dedicated)	0	no

Dwelling no.	Individual pool		Individual spa		Appliances & other efficiency measures							
	Pool heating system	Timer	Spa heating system	Timer	Kitchen cooktop/oven	Refrigerator	Well ventilated fridge space	Dishwasher	Clothes washer	Clothes dryer	Indoor or sheltered clothes drying line	Private outdoor or unsheltered clothes drying line
All dwellings	-	-	-	-	gas cooktop & electric oven	-	yes	-	-	-	no	no

(iii) Thermal Comfort	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
(a) The applicant must attach the certificate referred to under "Assessor details" on the front page of this BASIX certificate (the "Assessor Certificate") to the development application and construction certificate application for the proposed development (or, if the applicant is applying for a complying development certificate for the proposed development, to that application). The applicant must also attach the Assessor Certificate to the application for a final occupation certificate for the proposed development.			

(iii) Thermal Comfort	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
(b) The Assessor Certificate must have been issued by an Accredited Assessor in accordance with the Thermal Comfort Protocol.			
(c) The details of the proposed development on the Assessor Certificate must be consistent with the details shown in this BASIX Certificate, including the details shown in the "Thermal Loads" table below.			
(d) The applicant must show on the plans accompanying the development application for the proposed development, all matters which the Thermal Comfort Protocol requires to be shown on those plans. Those plans must bear a stamp of endorsement from the Accredited Assessor, to certify that this is the case.	✔		
(e) The applicant must show on the plans accompanying the application for a construction certificate (or complying development certificate, if applicable), all thermal performance specifications set out in the Assessor Certificate, and all aspects of the proposed development which were used to calculate those specifications.		✔	
(f) The applicant must construct the development in accordance with all thermal performance specifications set out in the Assessor Certificate, and in accordance with those aspects of the development application or application for a complying development certificate which were used to calculate those specifications.		✔	✔
(g) Where there is an in-slab heating or cooling system, the applicant must: (aa) Install insulation with an R-value of not less than 1.0 around the vertical edges of the perimeter of the slab; or (bb) On a suspended floor, install insulation with an R-value of not less than 1.0 underneath the slab and around the vertical edges of the perimeter of the slab.	✔	✔	✔
(h) The applicant must construct the floors and walls of the development in accordance with the specifications listed in the table below.	✔	✔	✔

Thermal loads		
Dwelling no.	Area adjusted heating load (in mJ/m ² /yr)	Area adjusted cooling load (in mJ/m ² /yr)
01	32.7	26.6
02	49.1	29.6
03	41.8	28.0
11	14.8	25.6
12	8.2	26.0
13	34.6	31.4
14	21.3	28.1
21	15.3	25.3

Dwelling no.	Thermal loads	
	Area adjusted heating load (in mJ/m ² /yr)	Area adjusted cooling load (in mJ/m ² /yr)
22	8.6	25.7
23	35.6	31.0
24	22.1	27.6
31	15.7	25.0
32	8.8	25.5
33	36.0	30.8
34	22.4	27.4
41	18.0	22.9
42	10.5	22.8
43	38.9	27.3
44	24.9	25.7
51	50.5	34.5
All other dwellings	37.2	37.9

(b) Common areas and central systems/facilities

(i) Water	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
(a) If, in carrying out the development, the applicant installs a showerhead, toilet, tap or clothes washer into a common area, then that item must meet the specifications listed for it in the table.		✓	✓
(b) The applicant must install (or ensure that the development is serviced by) the alternative water supply system(s) specified in the "Central systems" column of the table below. In each case, the system must be sized, be configured, and be connected, as specified in the table.	✓	✓	✓
(c) A swimming pool or spa listed in the table must not have a volume (in kLs) greater than that specified for the pool or spa in the table.	✓	✓	
(d) A pool or spa listed in the table must have a cover or shading if specified for the pool or spa in the table.		✓	
(e) The applicant must install each fire sprinkler system listed in the table so that the system is configured as specified in the table.		✓	✓
(f) The applicant must ensure that the central cooling system for a cooling tower is configured as specified in the table.		✓	✓

Common area	Showerheads rating	Toilets rating	Taps rating	Clothes washers rating
All common areas	no common facility	no common facility	3 star	no common laundry facility

Central systems	Size	Configuration	Connection (to allow for...)
Fire sprinkler system (No. 1)	-	-	-
Fire sprinkler system (No. 2)	-	-	-

(ii) Energy	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
(a) If, in carrying out the development, the applicant installs a ventilation system to service a common area specified in the table below, then that ventilation system must be of the type specified for that common area, and must meet the efficiency measure specified.		✓	✓

(ii) Energy	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
(b) In carrying out the development, the applicant must install, as the "primary type of artificial lighting" for each common area specified in the table below, the lighting specified for that common area. This lighting must meet the efficiency measure specified. The applicant must also install a centralised lighting control system or Building Management System (BMS) for the common area, where specified.		✔	✔
(c) The applicant must install the systems and fixtures specified in the "Central energy systems" column of the table below. In each case, the system or fixture must be of the type, and meet the specifications, listed for it in the table.	✔	✔	✔

Common area	Common area ventilation system		Common area lighting		
	Ventilation system type	Ventilation efficiency measure	Primary type of artificial lighting	Lighting efficiency measure	Lighting control system/BMS
Basement 1 - Car park	ventilation (supply + exhaust)	carbon monoxide monitor + VSD fan	light-emitting diode	motion sensors	No
Basement 2 - Car park area	ventilation (supply + exhaust)	carbon monoxide monitor + VSD fan	light-emitting diode	motion sensors	No
Lift car (No.1)	-	-	light-emitting diode	none	No
Basement 1 - Waste Room	ventilation exhaust only	-	light-emitting diode	motion sensors	No
Grd - Waste Room	ventilation exhaust only	-	light-emitting diode	motion sensors	No
Grd - Bulky Waste	ventilation exhaust only	-	light-emitting diode	motion sensors	No
Grd - Pump Room	ventilation exhaust only	interlocked to light	light-emitting diode	manual on / manual off	No
Basement 2 - Storage	no mechanical ventilation	-	light-emitting diode	manual on / timer off	No
All Stairwells	no mechanical ventilation	-	light-emitting diode	motion sensors	No
All Circulation areas	no mechanical ventilation	-	light-emitting diode	daylight sensor and motion sensor	No

Central energy systems	Type	Specification
Central hot water system (No. 1)	gas instantaneous	Piping insulation (ringmain & supply risers): (a) Piping external to building: R1.0 (~38 mm); (b) Piping internal to building: R0.6 (~25 mm)

Central energy systems	Type	Specification
Lift (No. 1)	geared traction with V V A C motor	Number of levels (including basement): 8

4. Commitments for common areas and central systems/facilities for the development (non-building specific)

(b) Common areas and central systems/facilities

(i) Water	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
(a) If, in carrying out the development, the applicant installs a showerhead, toilet, tap or clothes washer into a common area, then that item must meet the specifications listed for it in the table.		✓	✓
(b) The applicant must install (or ensure that the development is serviced by) the alternative water supply system(s) specified in the "Central systems" column of the table below. In each case, the system must be sized, be configured, and be connected, as specified in the table.	✓	✓	✓
(c) A swimming pool or spa listed in the table must not have a volume (in kLs) greater than that specified for the pool or spa in the table.	✓	✓	
(d) A pool or spa listed in the table must have a cover or shading if specified for the pool or spa in the table.		✓	
(e) The applicant must install each fire sprinkler system listed in the table so that the system is configured as specified in the table.		✓	✓
(f) The applicant must ensure that the central cooling system for a cooling tower is configured as specified in the table.		✓	✓

Common area	Showerheads rating	Toilets rating	Taps rating	Clothes washers rating
All common areas	no common facility	no common facility	3 star	no common laundry facility

(ii) Energy	Show on DA plans	Show on CC/CDC plans & specs	Certifier check
(a) If, in carrying out the development, the applicant installs a ventilation system to service a common area specified in the table below, then that ventilation system must be of the type specified for that common area, and must meet the efficiency measure specified.		✓	✓
(b) In carrying out the development, the applicant must install, as the "primary type of artificial lighting" for each common area specified in the table below, the lighting specified for that common area. This lighting must meet the efficiency measure specified. The applicant must also install a centralised lighting control system or Building Management System (BMS) for the common area, where specified.		✓	✓
(c) The applicant must install the systems and fixtures specified in the "Central energy systems" column of the table below. In each case, the system or fixture must be of the type, and meet the specifications, listed for it in the table.	✓	✓	✓

Central energy systems	Type	Specification
Other	Active power factor correction installed?: yes	-

Notes

1. In these commitments, "applicant" means the person carrying out the development.
2. The applicant must identify each dwelling, building and common area listed in this certificate, on the plans accompanying any development application, and on the plans and specifications accompanying the application for a construction certificate / complying development certificate, for the proposed development, using the same identifying letter or reference as is given to that dwelling, building or common area in this certificate.
3. This note applies if the proposed development involves the erection of a building for both residential and non-residential purposes (or the change of use of a building for both residential and non-residential purposes). Commitments in this certificate which are specified to apply to a "common area" of a building or the development, apply only to that part of the building or development to be used for residential purposes.
4. If this certificate lists a central system as a commitment for a dwelling or building, and that system will also service any other dwelling or building within the development, then that system need only be installed once (even if it is separately listed as a commitment for that other dwelling or building).
5. If a star or other rating is specified in a commitment, this is a minimum rating.
6. All alternative water systems to be installed under these commitments (if any), must be installed in accordance with the requirements of all applicable regulatory authorities. NOTE: NSW Health does not recommend that stormwater, recycled water or private dam water be used to irrigate edible plants which are consumed raw, or that rainwater be used for human consumption in areas with potable water supply.

Legend

1. Commitments identified with a "✔" in the "Show on DA plans" column must be shown on the plans accompanying the development application for the proposed development (if a development application is to be lodged for the proposed development).
2. Commitments identified with a "✔" in the "Show on CC/CDC plans and specs" column must be shown in the plans and specifications accompanying the application for a construction certificate / complying development certificate for the proposed development.
3. Commitments identified with a "✔" in the "Certifier check" column must be certified by a certifying authority as having been fulfilled. (Note: a certifying authority must not issue an occupation certificate (either interim or final) for a building listed in this certificate, or for any part of such a building, unless it is satisfied that each of the commitments whose fulfilment it is required to monitor in relation to the building or part, has been fulfilled).

PROPOSED RESIDENTIAL FLAT BUILDING

36-38 Rodley Avenue, Penrith, NSW, 2750



THERMAL PERFORMANCE SPECIFICATIONS: (20331 - 36 Rodley Ave)
 The following specifications take precedence over other plan notations for the construction of this building.
 NOTE: In addition to BASIX commitments, building compliance is required to comply with the 'New South Wales Act' in the current edition of the NCC - Vol. 1, at the time of building.
 This includes New South Wales Part J(A). Specifically:
 - Building thermal construction is in accordance with part J1.2
 - Basis of ceiling insulation is compensated for by increased roof insulation in accordance with Part J1.3(c)
 - Where metal frames are used that thermal breaks are installed in accordance with Part J1.3(c) and J1.5(c)
 - Any roof lights, windows, doors and exhaust fans are sealed in accordance Part J3
 - Any new air-conditioning system is installed in accordance with Parts J5.2(a), J5.2(b), J5.2(c), J5.2(d), J5.2(e) & J5.2(g)
 - Any new mechanical ventilation system is installed in accordance with Part J5.3
 - Any new mechanical exhaust system is installed in accordance with Part J5.4
 - Any new hot water system is installed in accordance Part J7.2
 - Energy monitoring equipment is installed in accordance Part J8.3
WINDOWS (Total product specification - glass + frame)
 U-value 0.70 for less than 6000mm² and 0.75 for more than 6000mm² (Single Plain Glass in ALU frame)
EXTERNAL WALL (Medium colour)
 Brick Veneer - R2.5 - 90mm thick bulk insulation with reflective airgap
INTERNAL WALL
 Cavity Frame/Concrete - No Insulation
 Partition walls - No thermal insulation required
EXTERNAL FLOOR
 Concrete Slab on ground - No insulation
 Suspended Concrete (above Basement areas) - R1.3 Bulk insulation
EXTERNAL CEILING/ROOF (Medium colour)
 Concrete / Polystyrene - R1.3 bulk insulation (where rooftop or balcony above)
RATED either with NO DOWNLIGHTS or with LED downlights which do not penetrate ceiling insulation (ie. IC rated)

Certificate no.: 003068890
 Assessor Name: David Howard
 Accreditation no.: 20039
 Certificate date: 15 August 2018
 Declaring Address: 36-38 Rodley Ave
 Penrith, NSW 2750
 www.nabers.gov.au

DEVELOPMENT DETAILS		
Site Area	1115m ²	
Gross Floor Area (GFA)	2095m ²	
Zoning	R4 High Density Residential	
	Allowable	Proposed
Floor Space Ratio (FSR)*	n/a	1.88:1
Total Storeys	6	6

Communal Open Space	25%	63.1m ²	6%
Deep Soil Zones	7%	390m ²	35%

*LEP REQUIREMENT
 *SEPP 65 REQUIREMENT
 REFER SHEET DA02 FOR DETAILS

UNITS TYPES	
Type	Count
2B	9
2B Adaptable	3
3B	9
TOTAL APARTMENTS: 21	

GROSS FLOOR AREA	
Level	Area
GROUND LEVEL	277.0 m ²
LEVEL 1	403.5 m ²
LEVEL 2	403.5 m ²
LEVEL 3	403.5 m ²
LEVEL 4	395.5 m ²
LEVEL 5	212.1 m ²
Grand total: 6	2095.3 m ²

COMMON OPEN SPACE	
Area	% of Site
63.1 m ²	5.66

DEEP SOIL AREA	
Area	% the Site
390.1 m ²	34.99

CAR SPACES REQUIRED	
2 Bed units: 9	9
2 Bed units Adaptable: 3	3
3 Bed units: 9	18
Visitors (1/5)	4
Service vehicles (1/40)	1
Washing bay (1/50)	1
Grand total	36

CAR SPACES - TYPES	
Type	Number
Disabled - 2400w x 5400d	3
Service - 2500w x 5400d	1
STANDARD - 2500w x 5400d	29
Visitor - 2500w x 5400d	4
Grand total: 37	37



Document Set ID: 8369395
 Version: 1, Version Date: 05/09/2018

Compliance Schedule (SEPP65-2015 Apartment Design Guide - Design Criteria & Objectives)

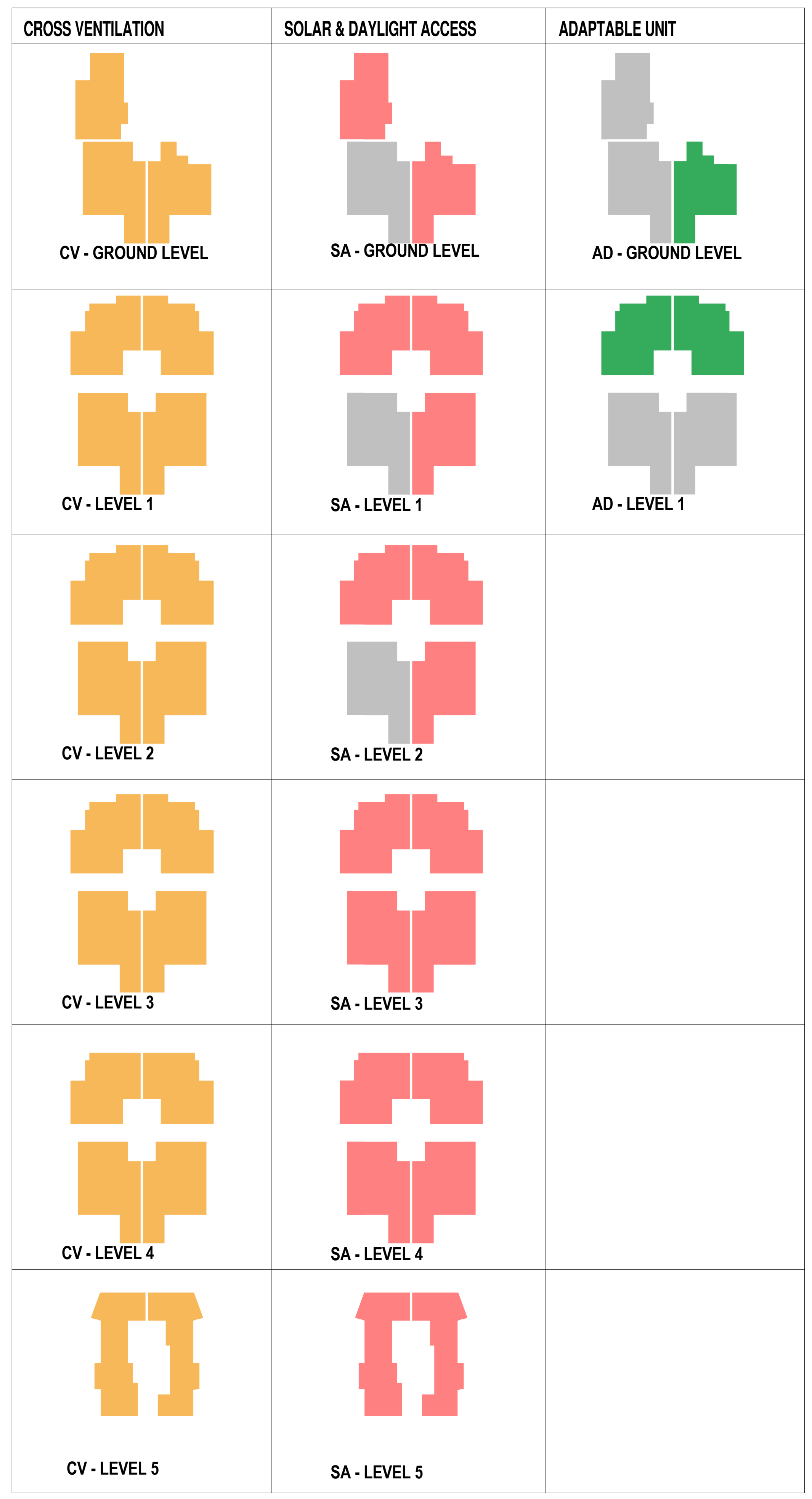
Design Criteria	Compliance	Proposal	Design Criteria	Compliance	Proposal															
3D-1 1. Communal open space has a minimum area equal to 25% of the site 2. Developments achieve a minimum of 50% direct sunlight to the principal usable part of the communal open space for a minimum of 2 hours between 9 am and 3 pm on 21 June (mid winter)	- Yes	1. The Common Open Space is 63.1m ² comprising 6% of the site. The communal open space is well designed and integrated into an overall landscaped setting that is both interactive for the residents and provides amenity. The space exceeds the minimum 3m width and is co-located with the deep soil zones to ensure tree planting. All balconies and private open space areas exceed the minimum areas outlined in the ADG. It faces North and has adequate sunlight access. 2. Morning sun requirement is achieved in the common open space.	4D-1 1. Apartments are required to have the following minimum internal areas : <table border="1"> <thead> <tr> <th>Apartment type</th> <th>Minimum internal area</th> </tr> </thead> <tbody> <tr> <td>Studio</td> <td>35m²</td> </tr> <tr> <td>1 bedroom</td> <td>50m²</td> </tr> <tr> <td>2 bedroom</td> <td>70m²</td> </tr> <tr> <td>3 bedroom</td> <td>90m²</td> </tr> </tbody> </table> The minimum internal areas include only one bathroom. Additional bathrooms increase the minimum internal area by 5m ² each 2. Every habitable room must have a window in an external wall with a total minimum glass area of not less than 10% of the floor area of the room. Daylight and air may not be borrowed from other rooms.	Apartment type	Minimum internal area	Studio	35m ²	1 bedroom	50m ²	2 bedroom	70m ²	3 bedroom	90m ²	Yes	Minimal internal areas are in accordance with the design criteria					
Apartment type	Minimum internal area																			
Studio	35m ²																			
1 bedroom	50m ²																			
2 bedroom	70m ²																			
3 bedroom	90m ²																			
3E-1 1. Deep soil zones are to meet the following minimum requirements: <table border="1"> <thead> <tr> <th>Site Area</th> <th>Min. Dimension</th> <th>Deep Soil Zone (% of site Area)</th> </tr> </thead> <tbody> <tr> <td><650m²</td> <td>-</td> <td rowspan="3">7%</td> </tr> <tr> <td>650m²-1,500m²</td> <td>3m</td> </tr> <tr> <td>>1,500m²</td> <td>6m</td> </tr> </tbody> </table>	Site Area	Min. Dimension	Deep Soil Zone (% of site Area)	<650m ²	-	7%	650m ² -1,500m ²	3m	>1,500m ²	6m	Yes	1. Deep soil zones are provided well exceeded for the development. The site provides for a total area of 390m ² of deep soil zone or 35% of total site.		Yes						
Site Area	Min. Dimension	Deep Soil Zone (% of site Area)																		
<650m ²	-	7%																		
650m ² -1,500m ²	3m																			
>1,500m ²	6m																			
3F-1 Separation between windows and balconies is provided to ensure visual privacy is achieved. Min required separation distances from buildings to the side and rear boundaries are as follows: <table border="1"> <thead> <tr> <th>Building Height</th> <th>Habitable rooms and balconies</th> <th>Non-habitable rooms</th> </tr> </thead> <tbody> <tr> <td>up to 12m (4 storeys)</td> <td>6m</td> <td>3m</td> </tr> <tr> <td>up to 25m (5-8 storey)</td> <td>9m</td> <td>4.5m</td> </tr> <tr> <td>over 25m (9+ storey)</td> <td>12m</td> <td>6m</td> </tr> </tbody> </table> Gallery access circulation treated as habitable space when measuring privacy separation distances between neighbouring properties.	Building Height	Habitable rooms and balconies	Non-habitable rooms	up to 12m (4 storeys)	6m	3m	up to 25m (5-8 storey)	9m	4.5m	over 25m (9+ storey)	12m	6m	-	Setbacks: Northern Boundary: [NOTE: Street Frontage of Rodley Ave, residential housing across the road] Setback from 4.7m to 5.5m [Ground-Level 4] Setback from 6.0m to 6.1m [Level 5] Southern Boundary: Setback from 3.0m to 3.8m [Ground-Level 4] Setback 6.74m to 8.14 [Levels 5] Western Boundary: Setback from 5.0m to 7.3m [Ground-Level 4] Setback from 8.28m to 9.99m [Levels 5] Eastern Boundary: Setback from 5.0m to 7.3m [Ground-Level 4] Setback from 8.28m to 9.99m [Levels 5]	4D-2 1. Habitable room depths are limited to a maximum of 2.5 x the ceiling height 2. In open plan layouts (where the living, dining and kitchen are combined) the maximum habitable room depth is 8m from a window	Yes	Habitable room depths are in accordance with the design criteria			
Building Height	Habitable rooms and balconies	Non-habitable rooms																		
up to 12m (4 storeys)	6m	3m																		
up to 25m (5-8 storey)	9m	4.5m																		
over 25m (9+ storey)	12m	6m																		
4A-1 1. Living rooms and private open spaces of at least 70% of apartments in a building receive a minimum of 2 hours direct sunlight between 9 am and 3 pm at mid winter in the Sydney Metropolitan Area and in the Newcastle and Wollongong local government areas. 3. A maximum of 15% of apartments in a building receive no direct sunlight between 9 am and 3 pm at mid winter	Yes	1. 85.7% [18-21] of apartments receive 2 hours. 3. None of apartments receive no direct sunlight between 9am & 3pm at mid winter	4D-3 1. Master bedrooms have a minimum area of 10m ² and other bedrooms to have 9m ² (excluding wardrobe space) 2. Bedrooms have a minimum dimension of 3m (excl. wardrobe space) 3. Living rooms or combined living/dining rooms have a minimum width of: • 3.6m for studio and 1 bed apartments • 4m for 2 and 3 bedroom apartments	Yes	All bedrooms are 9m ² & Master bedrooms 10m ² .															
4B-3 1. At least 60% of apartments are naturally cross ventilated in the first nine storeys of the building. Apartments at ten storeys or greater are deemed to be cross ventilated only if any enclosure of the balconies at these levels allows adequate natural ventilation and cannot be fully enclosed 3. Overall depth of a cross-over or cross-through apartment does not exceed 18m, measured glass line to glass line	Yes n/a	1. 95% [20-21] of apartments are cross-ventilated	4E-1 1. All apartments are required to have primary balconies as follows: <table border="1"> <thead> <tr> <th>Dwelling type</th> <th>Minimum area</th> <th>Minimum depth</th> </tr> </thead> <tbody> <tr> <td>Studio apartments</td> <td>4m²</td> <td>-</td> </tr> <tr> <td>1 bedroom apartments</td> <td>6m²</td> <td>2m</td> </tr> <tr> <td>2 bedroom apartments</td> <td>10m²</td> <td>2m</td> </tr> <tr> <td>3+ bedroom apartments</td> <td>12m²</td> <td>2.4m</td> </tr> </tbody> </table> The minimum balcony depth to be counted as contributing to the balcony area is 1m. 2. For apartments at ground level or on a podium or similar structure, a private open space is provided instead of a balcony. It must have a minimum area of 15m ² and a minimum depth of 3m	Dwelling type	Minimum area	Minimum depth	Studio apartments	4m ²	-	1 bedroom apartments	6m ²	2m	2 bedroom apartments	10m ²	2m	3+ bedroom apartments	12m ²	2.4m	Yes	1. Balconies provided to apartments are in accordance with this design criteria. 2. Terraces provided to apartments are in accordance with this design criteria.
Dwelling type	Minimum area	Minimum depth																		
Studio apartments	4m ²	-																		
1 bedroom apartments	6m ²	2m																		
2 bedroom apartments	10m ²	2m																		
3+ bedroom apartments	12m ²	2.4m																		
4C-1 Measured from finished floor level to finished ceiling level, minimum ceiling heights are: <table border="1"> <thead> <tr> <th>Minimum ceiling height for apartment and mixed use buildings</th> <th></th> </tr> </thead> <tbody> <tr> <td>Habitable rooms</td> <td>2.7m</td> </tr> <tr> <td>Non-habitable</td> <td>2.4m</td> </tr> <tr> <td>For 2 storey apartments</td> <td>2.7m for main living area 2.4m for second floor, where its area does not exceed 50% of the apt area.</td> </tr> </tbody> </table>	Minimum ceiling height for apartment and mixed use buildings		Habitable rooms	2.7m	Non-habitable	2.4m	For 2 storey apartments	2.7m for main living area 2.4m for second floor, where its area does not exceed 50% of the apt area.	Yes	Minimum ceiling heights are in accordance with the design criteria	4F-1 1. The maximum number of apartments off a circulation core on a single level is eight 2. For buildings of 10 storeys and over, the maximum number of apartments sharing a single lift is 40	Yes	1. All levels provide 3 or less apartments off a circulation core.							
Minimum ceiling height for apartment and mixed use buildings																				
Habitable rooms	2.7m																			
Non-habitable	2.4m																			
For 2 storey apartments	2.7m for main living area 2.4m for second floor, where its area does not exceed 50% of the apt area.																			
			4G-1 1. In addition to storage in kitchens, bathrooms and bedrooms, the following storage is provided: <table border="1"> <thead> <tr> <th>Apartment type</th> <th>Storage size volume</th> </tr> </thead> <tbody> <tr> <td>Studio</td> <td>4m³</td> </tr> <tr> <td>1 bedroom</td> <td>6m³</td> </tr> <tr> <td>2 bedroom</td> <td>9m³</td> </tr> <tr> <td>3+ bedroom</td> <td>10m³</td> </tr> </tbody> </table> At least 50% of the required storage is to be located within the apartment	Apartment type	Storage size volume	Studio	4m ³	1 bedroom	6m ³	2 bedroom	9m ³	3+ bedroom	10m ³	Yes	All storage requirements are in accordance with this design criteria					
Apartment type	Storage size volume																			
Studio	4m ³																			
1 bedroom	6m ³																			
2 bedroom	9m ³																			
3+ bedroom	10m ³																			

Design Statement (SEPP65-2015 SCHEDULE 1 - Design Quality Principles)

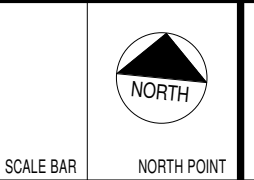
Principle 1: Context and Neighbourhood Character	Principle 2: Built Form and Scale	Principle 3: Density	Principle 4: Sustainability
<p>Low-density Residential. The remaining neighbouring properties to the North, along Rodley Ave to the East, and South side of Rodley Ave, predominantly consist of low density single and two storey residential dwellings (houses and townhouses). The majority of these lots contain single low-density housing located on long rectangular lots with the short boundary addressing the street. Scattered throughout the low-density housing are some medium-density villa and townhouse developments which are generally consist of central 'gun-barrel' driveways with terraces on either side.</p> <p>Short term to future growth pattern: We note the urban fabric is changing from a low-density to an urban high-density with recent legislative amendments in the Penrith LGA. To clarify, the change in scale is from a one or two storey single dwelling per lot to a 5-6 storey residential development; 10 times the density of the existing residential neighbourhood.</p> <p>Context, Neighbourhood Character and UDRP recommendations have been taken into consideration during the design. It is believed that the design responds and contributes to its context, setting a good example for the future proposed developments in the area.</p>	<p>The design responds to its associated context (identified in Principle 1). Our response to the ADG controls is to maximize the extents of the allowable building envelope. The proposal is to construct a single tower addressing Rodley Ave. The facade is well articulated and the footprint sits well within the regular shaped site, mimicking the layout pattern of dwellings along Rodley Ave. Common open space is in between the two towers. The result is an outcome which allows cross ventilation and natural light to the common area and large number of the units. The cross ventilation meets the minimum requirements as well as the direct sunlight between 9am & 3pm at mid winter.</p> <p>UDRP panel recommended design solutions have been taken on board and integrated into the design. Facade articulation and stepping is successfully achieved through both form and colours avoiding a bulky appearance. The design achieves a positive outcome for built form, scale, context and neighbouring character.</p> <p>R4 zoning and SEPP65 setbacks and height controls have been generally adopted in the proposal. In order to accommodate the stepping of upper storeys and for the building to be well articulated, proposed setbacks and height may vary in parts from the minimum SEPP65 requirements. It is assumed that the proposed setbacks and heights would be found acceptable. The highest height intrusion is the top of lift shaft at nominal 1.68m above the allowable 18m height control and has an RL 48.840. The lift shafts have no impact.</p>	<p>The Penrith LGA has recently seen an upzoning of residential areas to R4 High-Density Residential. The subject site lies within such an area with several Development Applications having already been submitted to Council in the close proximity of Devlin's Parade and Vista Streets.</p> <p>As there is no FSR control on the site, the density of the proposed development is controlled by the height limits and setbacks as per the Penrith DCP2014. In addition, separation between buildings on the site as well as potential future neighbouring R4 developments defined by SEPP 65 Apartment Design Guide (ADG) 2015, also have a bearing on allowable density on the site.</p> <p>Moreover, Communal Open Spaces and Deep Soils zones in the proposed development meet the minimum requirements of the ADG, further controlling the allowable density on the site.</p> <p>The proposal consists of a nice mixture of well sized 1, 2 and 3 bedroom apartments.</p> <p>It is believed that the proposed development seeks full compliance in this SEPP 65 Principle.</p>	<p>The Apartment Design Guide 2015 aims to deliver improved sustainability through better traffic and transport solutions, greater building adaptability and robustness, improved energy efficiency and water sensitive urban design.</p> <p>The proposed development aims to exceed the minimum standards of the ADG 2015 wherever possible. Consideration has been given to the increased apartment areas throughout the development to facilitate future sustainable growth of Sydney's outer suburbs.</p> <p>Bicycle parking has been located on basement 1 to promote the use of active transport to the Penrith area in lieu of vehicle use. (See Principle 6 for details). The development also features landscape areas in accordance with the requirements of the ADG 2015 design criteria. (See Principle 5 for details).</p> <p>The development also features well designed apartments with cross ventilation and solar access to the vast majority of the apartments, and well exceeds the minimum ADG 2015 requirements. Use of awnings will reduce the energy consumption in summer months by protecting west-facing apartments and controlling the internal conditions of the apartments.</p>
Principle 5: Landscape	Principle 6: Amenity	Principle 7: Safety	Principle 8: Housing Diversity & Social Interaction
<p>Deep soil planting has been embellished along all boundaries allowing full height trees to grow and provide privacy between the neighbouring properties and potential future adjacent developments.</p> <p>Deep soil pockets were maximized and replacement trees are proposed to accommodate landscaping complementing the design and street frontages.</p> <p>The carparking levels have been designed to minimize the footprint but accommodate all the necessary carparking and services.</p> <p>The common open area has been positioned at the North-Western corner of the development and has a complimentary landscape design. Planting has been designed to further enhance the outdoor garden feel and to achieve required separation between the ground level units and neighbouring properties.</p> <p>Sunshade has also been introduced to improve the internal environment of each apartment, exceeding minimum standards with regards to BASIX compliance.</p> <p>A common area has been provided at Ground Floor Level. Minimum solar access is achieved for mid-winter period.</p>	<p>Penrith Progression 2015 identifies walking & cycling as a "Shaping Element" to make Penrith an Active City (Z.7).</p> <p>The site is located about 1.1km walking distance to the Penrith Train Station and 0.4km to Penrith Westfields. On site Bicycle Parking has been provided to promote active transport in and around the Penrith CBD.</p> <p>This design consideration is intended to improve the amenity of the internal living areas of the apartments by maximizing the amount of daylight access and natural cross ventilation, as per the ADG minimum requirements.</p> <p>The apartment layouts are efficient and meet the minimum ADG requirements. Minimum number of accessible units have also been provided as per the code requirements.</p> <p>Sunshade has also been introduced to improve the internal environment of each apartment, exceeding minimum standards with regards to BASIX compliance.</p> <p>A common area has been provided at Ground Floor Level. Minimum solar access is achieved for mid-winter period.</p>	<p>Secure pedestrian entry into the site has been logically located and expressed in the facade to read as such. Intercom access & CCTV at the entry provides security from street.</p> <p>Side gates, used primarily for fire egress, allow access out of the site from the Common Open Areas. The gates are keyed so that only occupants can enter the property through these side gates. Ground Floor apartment along at the North facade uses screening elements allowing the overlooking of the footpath along Rodley Ave. Both aspects provide passive street surveillance.</p> <p>The Common Open Area is to be accessible via the ground lobby entry. Side walkways, combined with ground floor courtyards, provide ample of passive surveillance for common areas.</p>	<p>Residential areas of Penrith have traditionally included a mix of detached housing (3br+) with a scattering of villa developments closer to the Penrith CBD (2br+). With the recent rezoning to R4 High-Density Residential, the proposed development aligns itself to the existing demographic while providing increase density to respond to the demands of the growing outer suburban ring of Western Sydney.</p> <p>The development features a mix of 1br, 2br & 3br apartments which also responds to current market demands in the area. Located in Western Sydney, apartments prices are considerably lower than inner city equivalents which facilitates affordability by default.</p> <p>Social interaction between residents of the development is enriched by the design of the open area and surrounding landscaped common walkways. Private courtyards have a visual connection to residents who walk past in the common areas, promoting interaction and a sense of community within the development. Apartments on upper levels overlooking the common areas further enhance the experience.</p>
Principle 9: Aesthetics			
<p>The character of the building reflects the context in which it is located (as identified in Principle 1).</p> <p>Rodley Ave frontage is set in a moderately quiet residential context. The composition of facade elements is sympathetic to the scale of the surrounding residential houses and lower scale buildings.</p> <p>The combination of facade articulation and landscaping successfully emphasize the building entry.</p> <p>The facades of the building define a hierarchy for the site. Rodley Ave facade is primary and the facades looking to the side setbacks maintain a secondary role. However, through materials & facade articulation & colour, both facades pursue rationality, clarity, proportion and rhythm which results in a simple elegance (values frequently lost).</p>			



SEPP 65 COMPLIANCE TABLE						
No.	Type	Area	Cross Ventilation	Solar & Daylight Access	Kitchen 8m from Window	Adaptable Unit
GROUND LEVEL						
01	2B	75.2 m ²	Yes	Yes	Yes	No
02	3B	96.7 m ²	Yes	No	Yes	No
03	2B Adaptable	83.8 m ²	Yes	Yes	Yes	Yes
LEVEL 1						
11	2B Adaptable	84.5 m ²	Yes	Yes	Yes	Yes
12	2B Adaptable	84.5 m ²	Yes	Yes	Yes	Yes
13	3B	96.7 m ²	Yes	No	Yes	No
14	3B	96.7 m ²	Yes	Yes	Yes	No
LEVEL 2						
21	2B	84.5 m ²	Yes	Yes	Yes	No
22	2B	84.5 m ²	Yes	Yes	Yes	No
23	3B	96.7 m ²	Yes	No	Yes	No
24	3B	96.7 m ²	Yes	Yes	Yes	No
LEVEL 3						
31	2B	84.5 m ²	Yes	Yes	Yes	No
32	2B	84.5 m ²	Yes	Yes	Yes	No
33	3B	96.7 m ²	Yes	Yes	Yes	No
34	3B	96.7 m ²	Yes	Yes	Yes	No
LEVEL 4						
41	2B	80.6 m ²	Yes	Yes	Yes	No
42	2B	80.6 m ²	Yes	Yes	Yes	No
43	3B	96.7 m ²	Yes	Yes	Yes	No
44	3B	96.7 m ²	Yes	Yes	Yes	No
LEVEL 5						
51	2B	80.6 m ²	Yes	Yes	Yes	No
52	2B	89.7 m ²	Yes	Yes	Yes	No
UNITS: 21		1868.0 m ²	100%	85.7%	14.2%	



ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION



PROJECT
PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS
 36-38 Rodley Avenue, Penrith, NSW, 2750

CLIENT
 Inglow Investments



SHEET SIZE: A1
 SCALE: DATE
 As Indicated

SHEET NAME
SEPP 65 COMPLIANCE SCHEDULE

DRAWING NUMBER
DA03
 ISSUE NO.
P1



1 SITE PLAN - 1500
DA14 1:1500



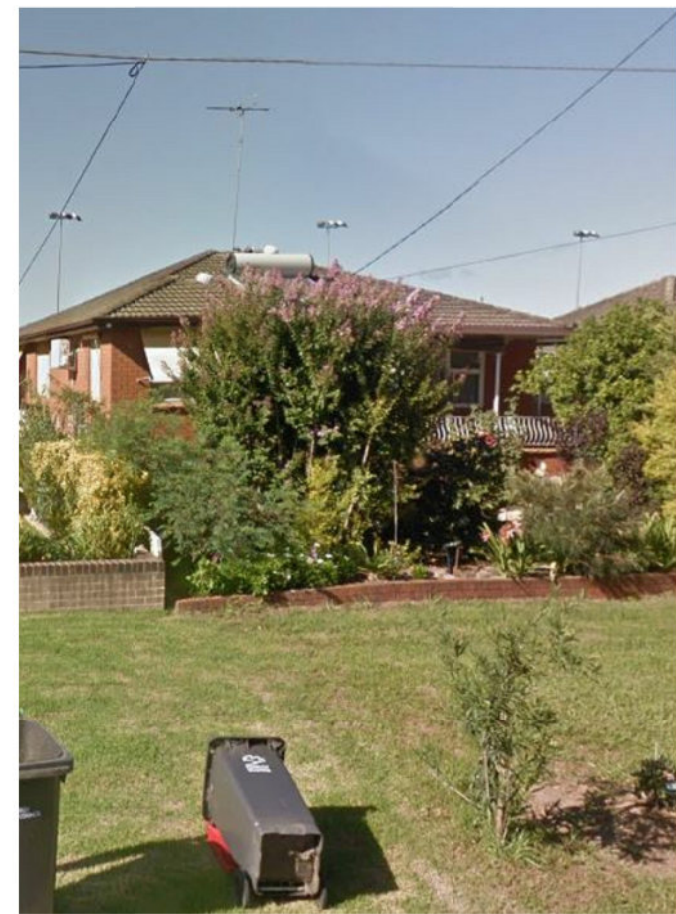
2 SITE PLAN & ANALYSIS - 500
DA14 1:250



No 36 & No 34 BOUNDARY



No 36 EASTERN BOUNDARY



No 36 FROM RODLEY ST



CREEK



No 38 WESTERN BOUNDARY

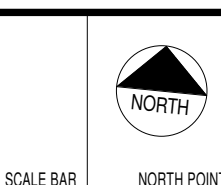


No 38 & No 40 SIDE BOUNDARY



No 38 & No 40 SIDE BOUNDARY

ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION



PROJECT
PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS
 36-38 Rodley Avenue, Penrith, NSW, 2750

CLIENT
 Inglow Investments



DOMINANT ARCHITECTS - P/L
 REGISTRATION NUMBER 8100
 A/C/S 128 460 026 466 41 128 460 026
 www.dominantgroup.com.au
 020 9000 8100
 PO Box 170, Penrith, NSW 1505

SHEET NAME
SITE PLAN

SHEET SIZE: A1
 SCALE: As Indicated
 DATE:

DRAWING NUMBER
DA04
 ISSUE NO.
P1

RODLEY AV

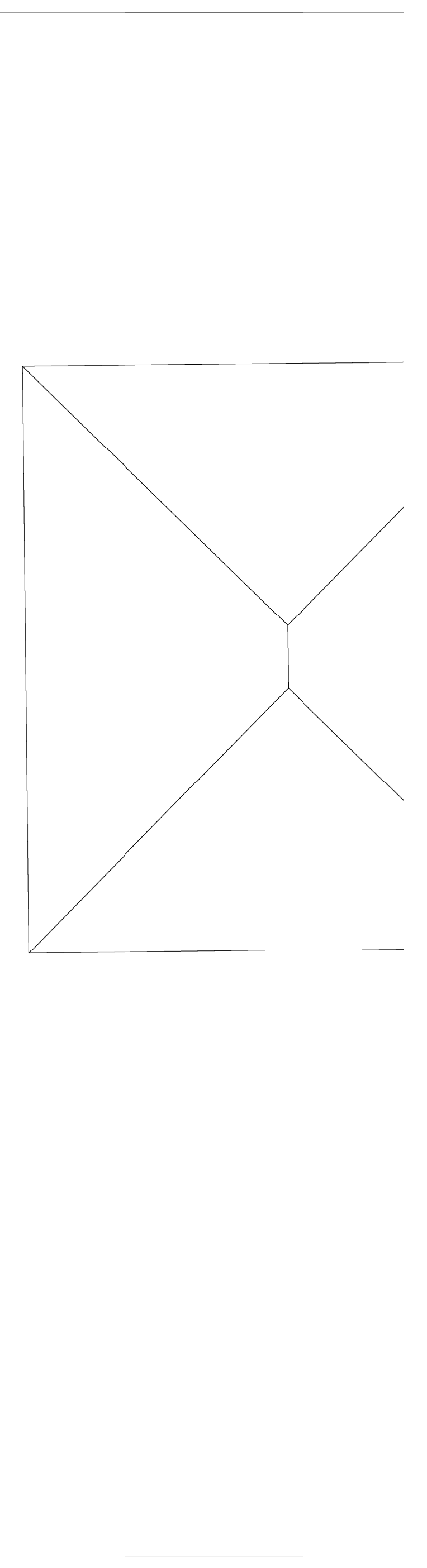
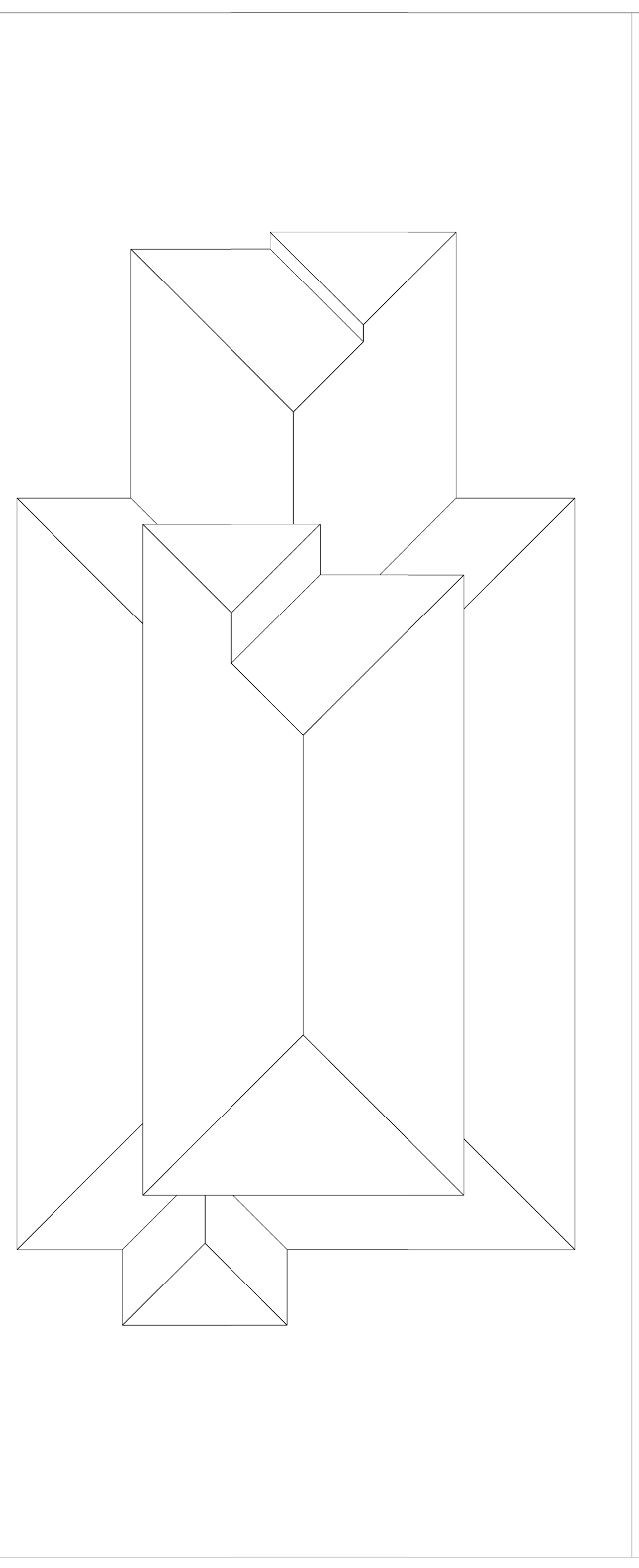
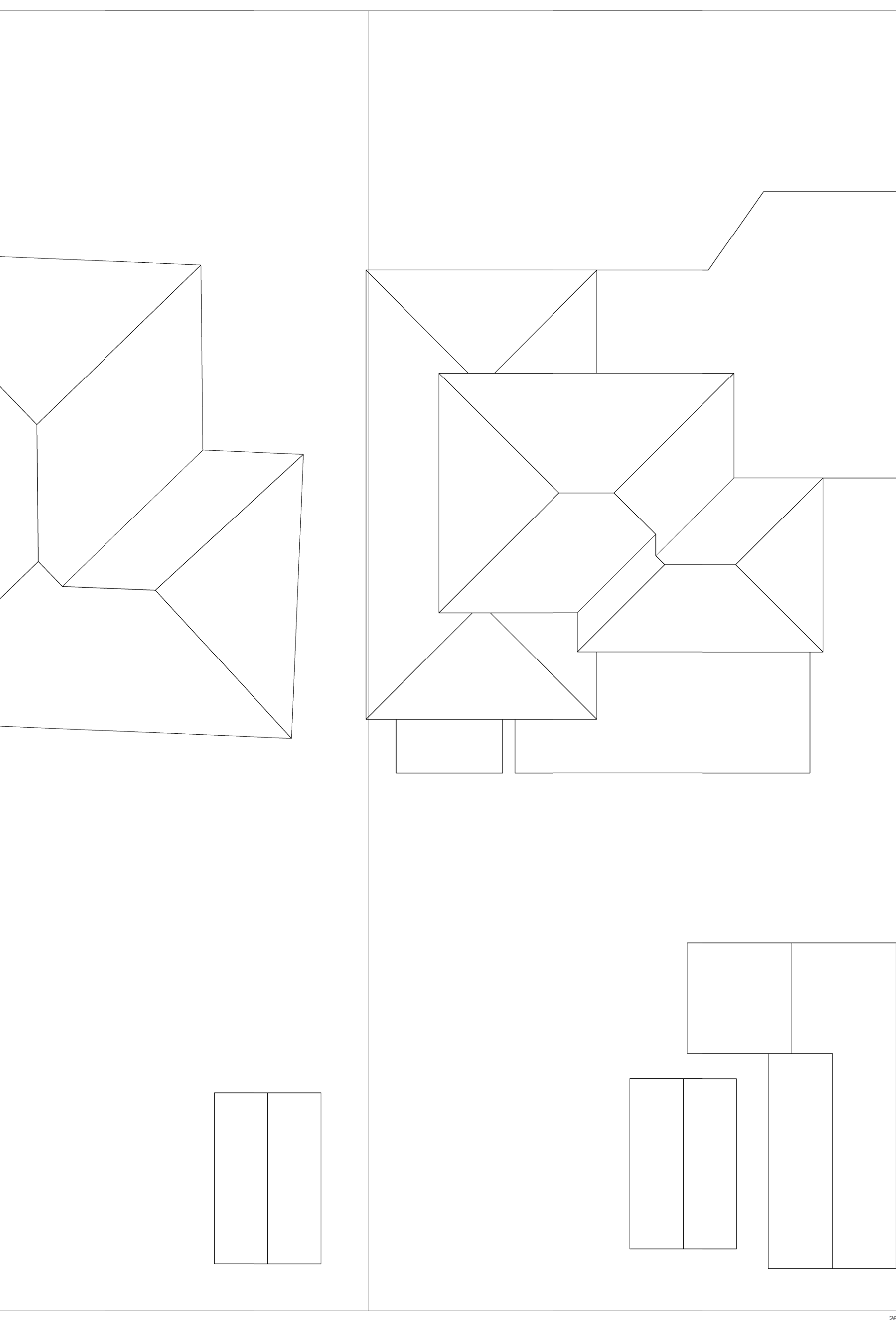
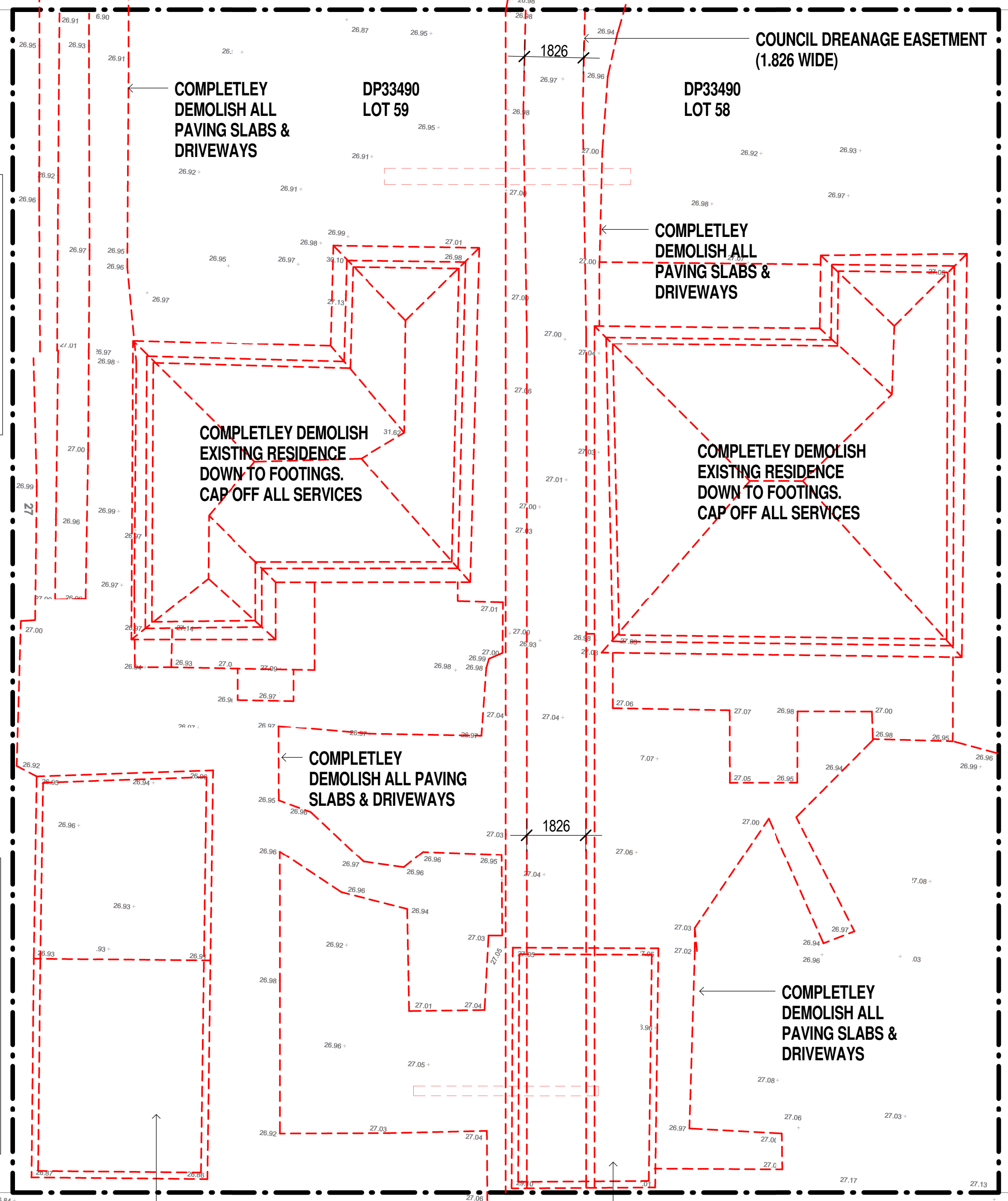
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SEALED PIT
SL 26.87

SEALED PIT

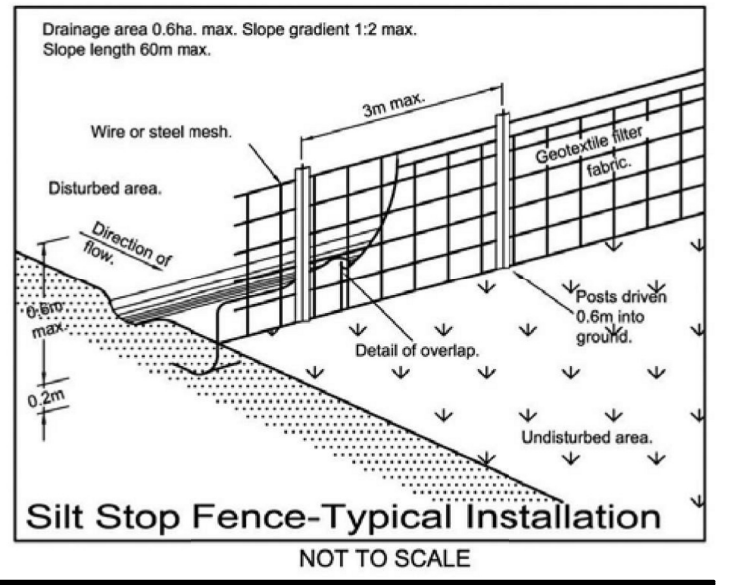
POWER POLE

TELSTRA PIT



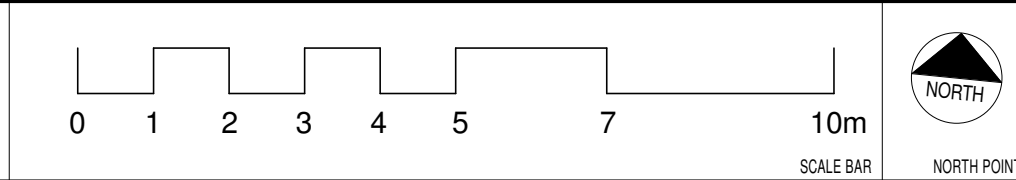
- NOTE:**
1. ALL DEMOLITION WORK TO BE CARRIED OUT IN ACCORDANCE WITH AS 2601-2001 (THE DEMOLITION OF STRUCTURES)
 2. THIS DEMOLITION DRAWING GIVES AN INDICATION OF THE SCOPE REQUIRED TO CARRY OUT THE ALTERATIONS & ADDITIONS AS PROPOSED. THE BUILDER IS ASSUMED TO HAVE INSPECTED THE SITE DURING TENDERING & ALLOWED FOR ALL DEMOLITION INCLUDING SUNDRY WORKS NOT INDICATED ON THIS DRAWING THAT ARE REQUIRED IN ORDER TO CONSTRUCT THE WORKS.

- SEDIMENT & EROSION CONTROL**
1. THE CONTRACTOR SHALL IMPLEMENT EROSION AND SEDIMENT CONTROL MEASURES TO THE COUNCIL'S SPECIFICATION PRIOR TO THE COMMENCEMENT OF CONSTRUCTION AND DURING CONSTRUCTION.
 2. ALL EROSION & SEDIMENT CONTROL DEVICES SHALL BE MAINTAINED IN A SATISFACTORY WORKING ORDER DURING THE CONSTRUCTION PERIOD. INSPECTIONS OF THESE DEVICES SHALL BE CARRIED OUT AFTER EACH STORM. REPAIRS AND/OR DE-CLOGGING SHALL BE CARRIED OUT TO ENSURE PROPER OPERATION OF THE DEVICE.
 3. STORAGE OF MATERIALS AND EQUIPMENT SHALL BE WITHIN SEDIMENT CONTROLLED AREAS.
 4. REMOVE SILT STOP FENCING AND DRAINAGE STRUCTURE SEDIMENT CONTROL TRAPS AFTER VEGETATION IS ESTABLISHED.



ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION

LEGEND	
	NEW WALL WORK
	EXISTING WALL
	DEMOLITION
	TREE TO BE REMOVED
	TREE TO BE RETAINED
	NEW PLANTING
	PROPOSED LEVEL



PROJECT: PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS: 36-38 Rodley Avenue, Penrith, NSW, 2750
 CLIENT: Inglow Investments



SHEET SIZE: A1
 SCALE: 1:100
 DATE:

SHEET NAME: DEMOLITION PLAN

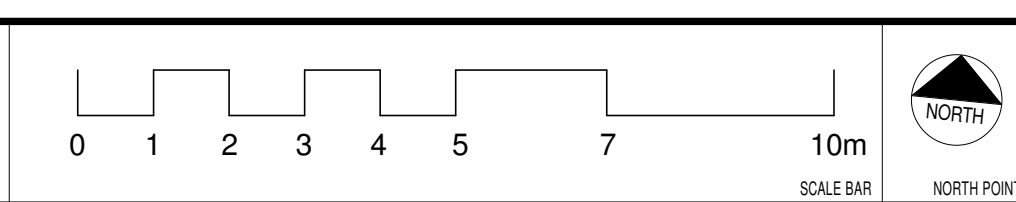
DRAWING NUMBER: DA05
 ISSUE NO: P1

RODLEY AVE



ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION

LEGEND	
	NEW WALL WORK
	EXISTING WALL
	DEMOLITION
	TREE TO BE REMOVED
	TREE TO BE RETAINED
	NEW PLANTING
	PROPOSED LEVEL



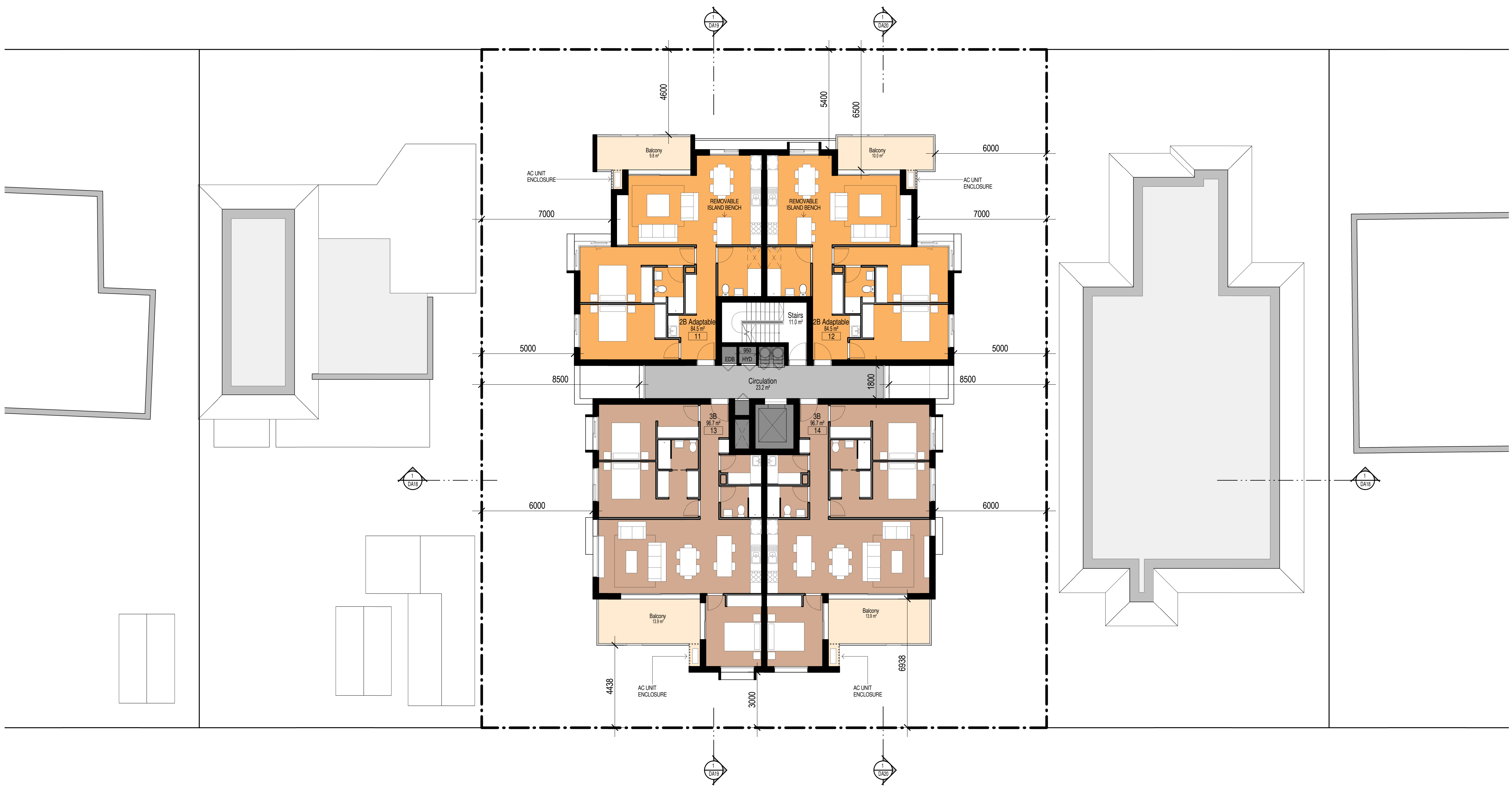
PROJECT: PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS: 36-38 Rodley Avenue, Penrith, NSW, 2750
 CLIENT: Inflow Investments



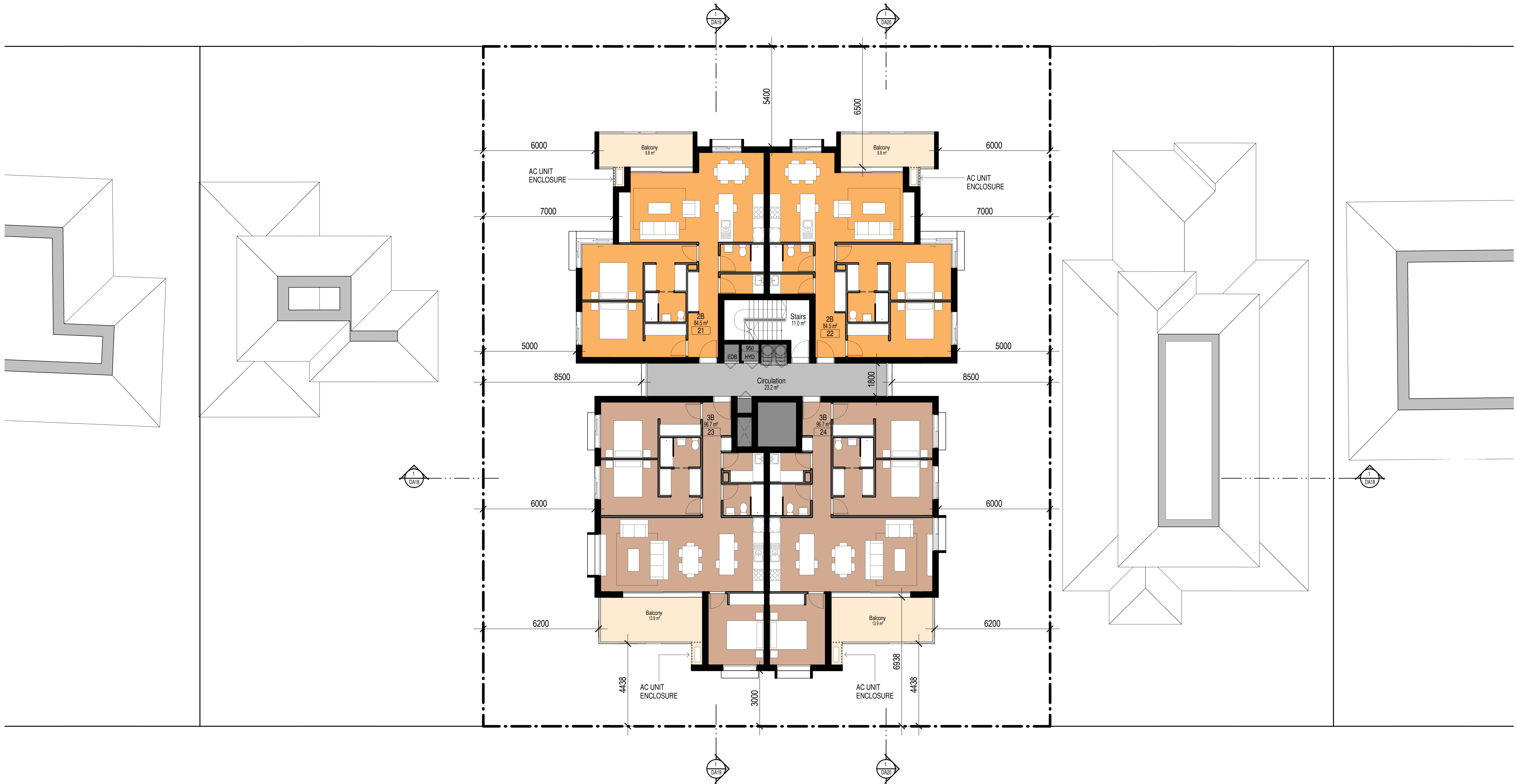
REGISTERED ARCHITECTS - P.F. MORSON
 REGISTRATION NUMBER 8100
 A/CN 138 480 026, ABN 41 138 480 026
 www.morsongroup.com
 2021 900 4194
 PO Box 170, Parkes NSW 1330

SHEET NAME: GROUND LEVEL
 SHEET SIZE: A1
 SCALE: 1:100
 DATE: _____
 DRAWING NUMBER: DA06-1
 ISSUE NO.: P1

RODLEY AVE

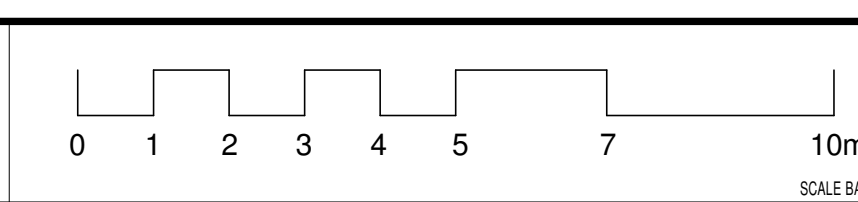


<table border="1"> <thead> <tr> <th>ISSUE</th> <th>DATE</th> <th>AMENDMENT</th> </tr> </thead> <tbody> <tr> <td>P1</td> <td>20-07-2018</td> <td>SUBMISSION</td> </tr> </tbody> </table>	ISSUE	DATE	AMENDMENT	P1	20-07-2018	SUBMISSION	LEGEND — NEW WALL WORK — EXISTING WALL □ DEMOLITION ○ TREE TO BE REMOVED ○ TREE TO BE RETAINED ● NEW PLANTING RL PROPOSED LEVEL			PROJECT PROPOSED RESIDENTIAL FLAT BUILDING ADDRESS 36-38 Rodley Avenue, Penrith, NSW, 2750	MORSON GROUP <small> NOMINATED ARCHITECTS - P F MORSON REGISTRATION NUMBER 8105 A/CN 138 480 024, ABN 41 138 480 024 www.morsongroup.com 223 WOOD STREET PO Box 170, Parramatta, NSW 1500 </small>	CLIENT Inflow Investments	SHEET NAME LEVEL 1	DRAWING NUMBER DA07 ISSUE NO. P1
ISSUE	DATE	AMENDMENT												
P1	20-07-2018	SUBMISSION												



ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION

LEGEND	
	NEW WALL WORK
	EXISTING WALL
	DEMOLITION
	TREE TO BE REMOVED
	TREE TO BE RETAINED
	NEW PLANTING
	PROPOSED LEVEL



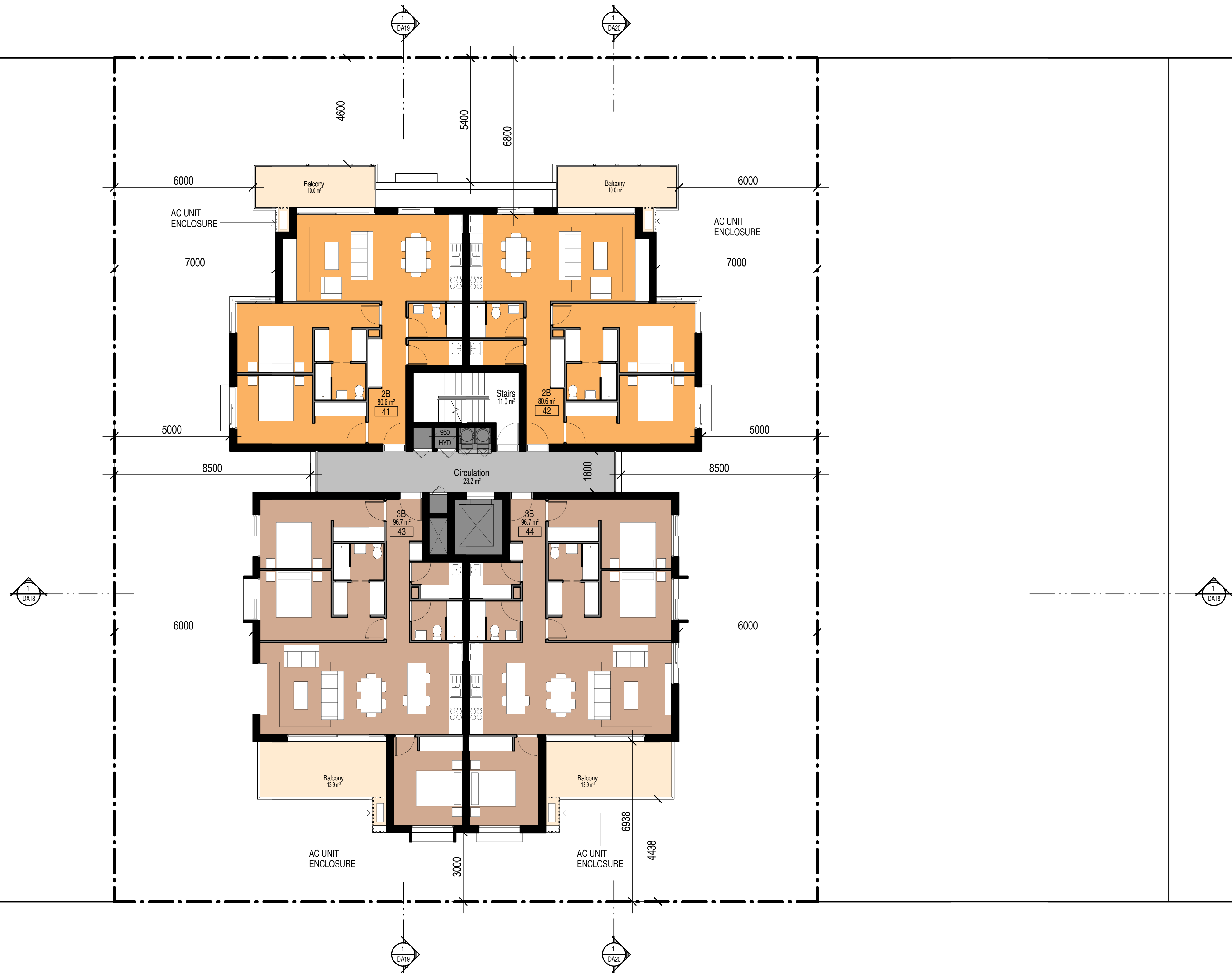
PROJECT
PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS
 36-38 Rodley Avenue, Parrish, NSW, 2750
 CLIENT
 Inglow Investments



SHEET SIZE: A1
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 1: 100

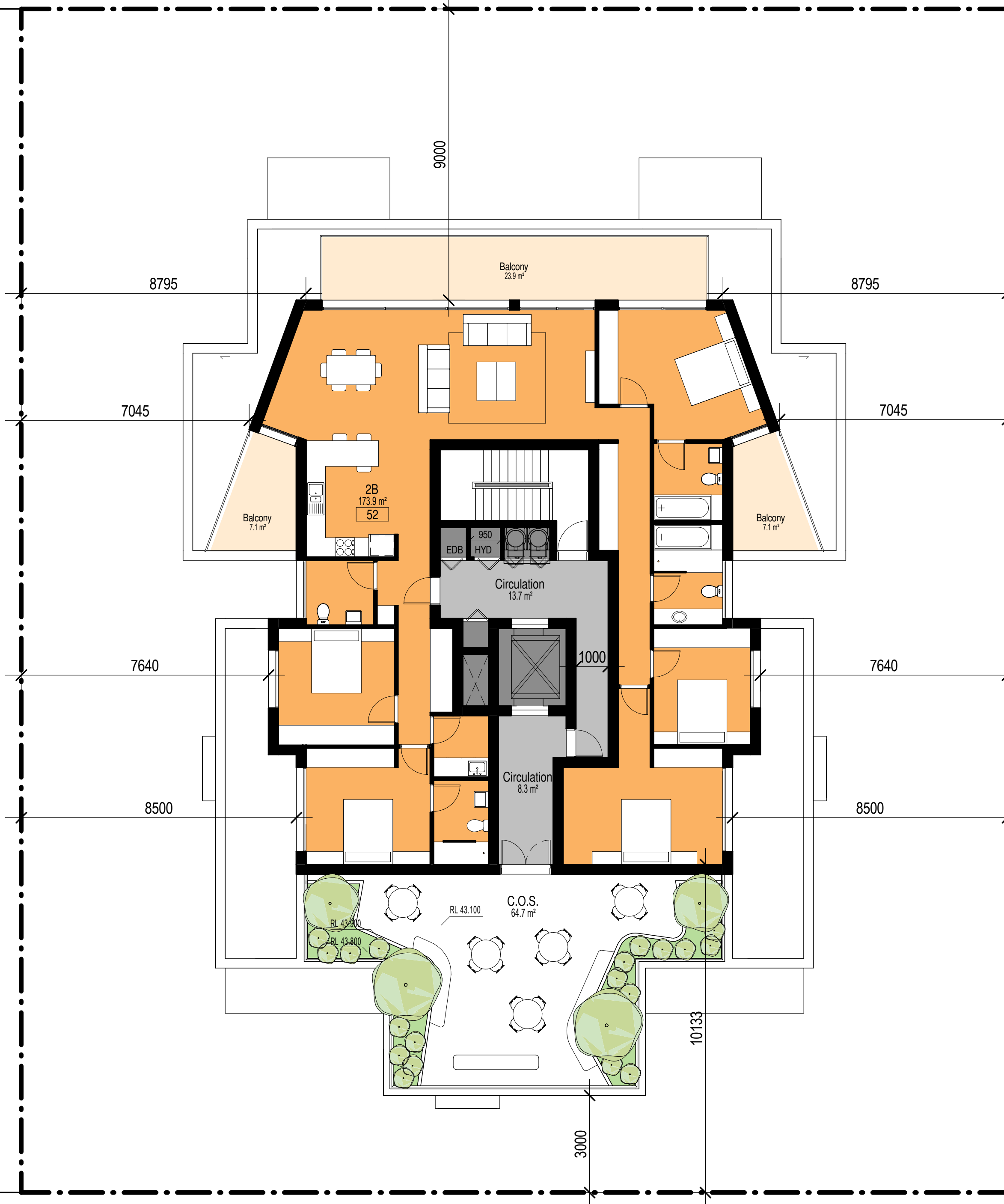
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 DRAWING NUMBER **DA08**
 ISSUE NO. **P1**

RODLEY AVE

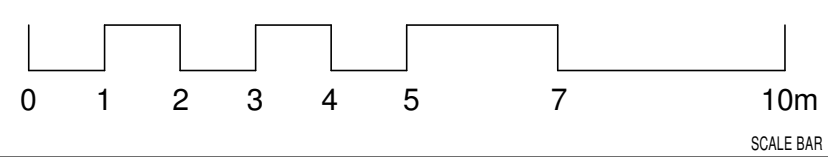


<table border="1"> <thead> <tr> <th>ISSUE</th> <th>DATE</th> <th>AMENDMENT</th> </tr> </thead> <tbody> <tr> <td>P1</td> <td>20-07-2018</td> <td>SUBMISSION</td> </tr> </tbody> </table>	ISSUE	DATE	AMENDMENT	P1	20-07-2018	SUBMISSION	LEGEND — NEW WALL WORK — EXISTING WALL □ DEMOLITION ○ TREE TO BE REMOVED ○ TREE TO BE RETAINED ● NEW PLANTING RL PROPOSED LEVEL			PROJECT PROPOSED RESIDENTIAL FLAT BUILDING ADDRESS 36-38 Rodley Avenue, Penrith, NSW, 2750	MORSON GROUP <small> NOMINATED ARCHITECTS - P F MORSON REGISTRATION NUMBER 8105 A/CN 138 480 024, ABN 41 138 480 024 www.morsongroup.com 223 WINDYBUSH PO Box 170, Penrith, NSW 1505 </small>	CLIENT Inglow Investments	SHEET NAME LEVEL 4	DRAWING NUMBER DA09 ISSUE NO. P1
ISSUE	DATE	AMENDMENT												
P1	20-07-2018	SUBMISSION												

RODLEY AVE



ISSUE	DATE	AMENDMENT
PS	29-05-2018	FEASIBILITY
P6	13-06-2018	FEASIBILITY
P7	10-07-2018	FEASIBILITY
P8	11-07-2018	FEASIBILITY
P9	20-07-2018	SECTINO 96



PROJECT
PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS
 36-38 Rodley Avenue, Penrith, NSW, 2750

CLIENT
 Inglow Investments



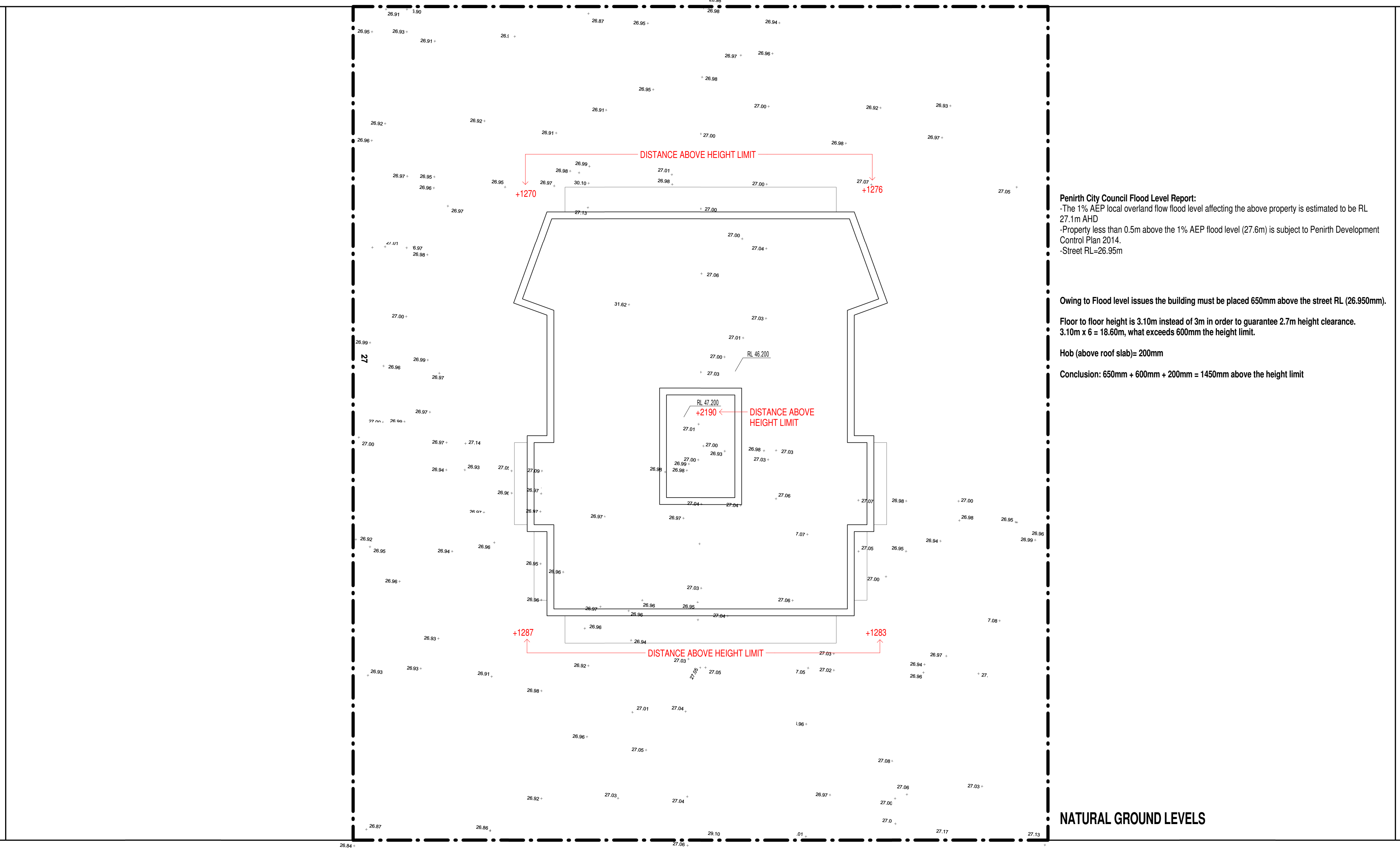
NOMINATED ARCHITECT: P F MORSON
 REGISTRATION NUMBER: 8100
 A/CN 138 480 024, ABN 41 138 480 024
 www.morsongroup.com
 020 990 8784
 PO Box 170, Potts Point, NSW 1588

SHEET SIZE: A1
 SCALE: DATE
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SHEET NAME
LEVEL 5

DRAWING NUMBER
DA10
 ISSUE NO.
P9

RODLEY AVE



Penrith City Council Flood Level Report:

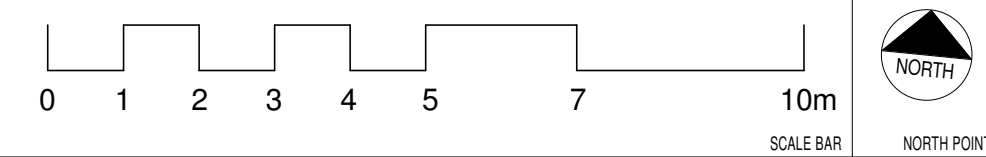
- The 1% AEP local overland flow flood level affecting the above property is estimated to be RL 27.1m AHD
- Property less than 0.5m above the 1% AEP flood level (27.6m) is subject to Penrith Development Control Plan 2014.
- Street RL=26.95m

Owing to Flood level issues the building must be placed 650mm above the street RL (26.950mm), Floor to floor height is 3.10m instead of 3m in order to guarantee 2.7m height clearance. 3.10m x 6 = 18.60m, what exceeds 600mm the height limit.

Hob (above roof slab)= 200mm
 Conclusion: 650mm + 600mm + 200mm = 1450mm above the height limit

NATURAL GROUND LEVELS

ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION



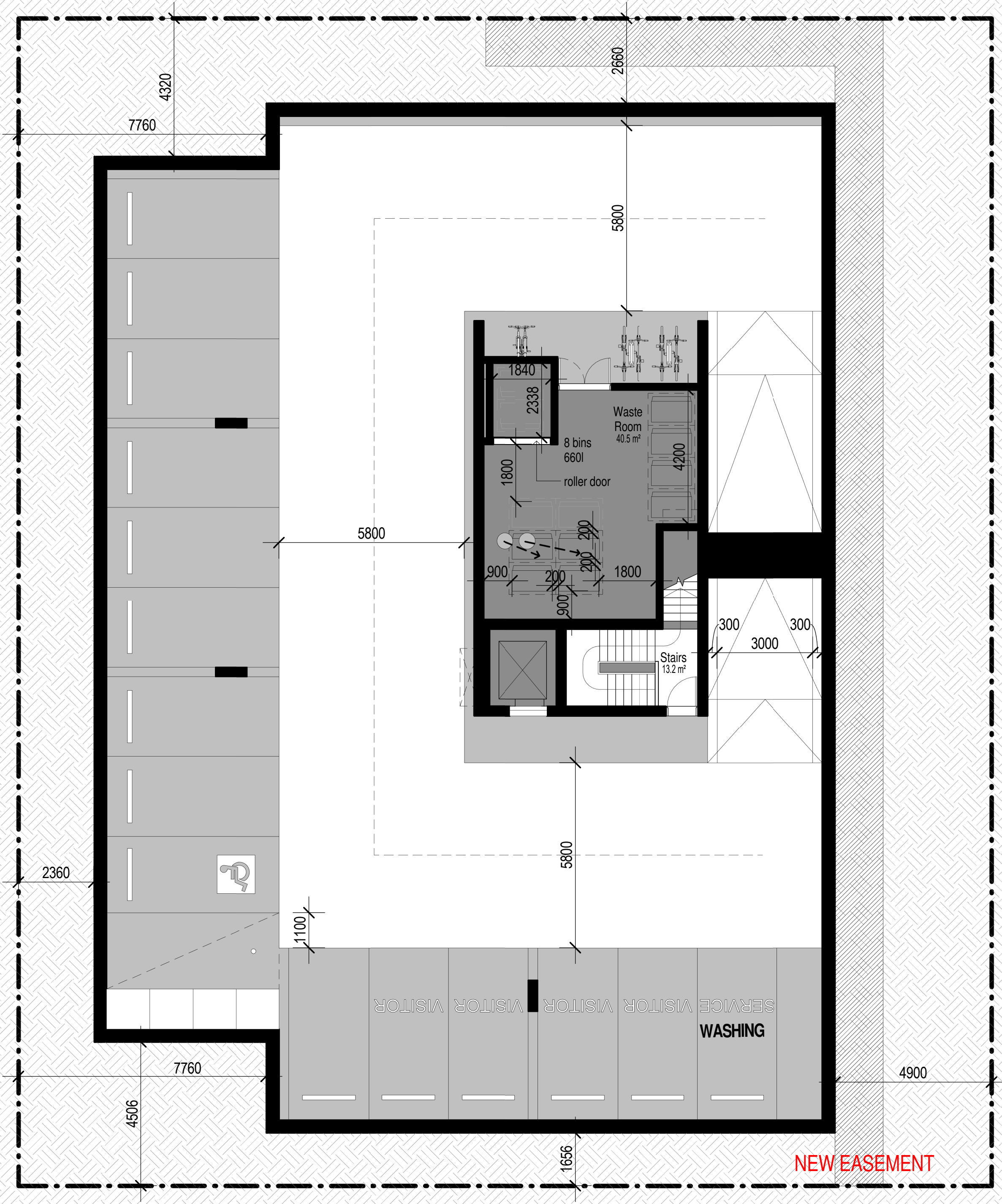
PROJECT
 PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS
 36-38 Rodley Avenue, Penrith, NSW, 2750
 CLIENT
 Inglow Investments



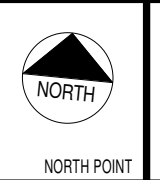
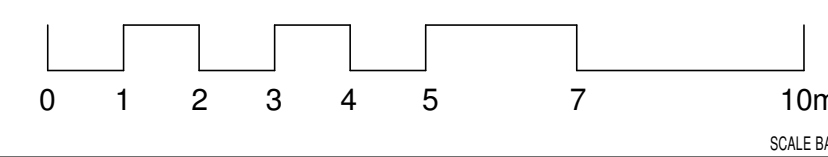
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SHEET NAME
ROOF

DRAWING NUMBER
DA11
 ISSUE NO.
P1



ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION



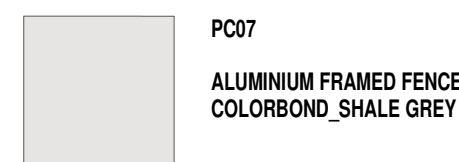
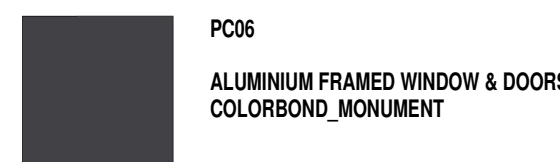
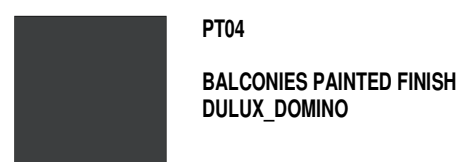
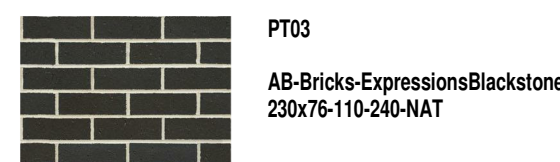
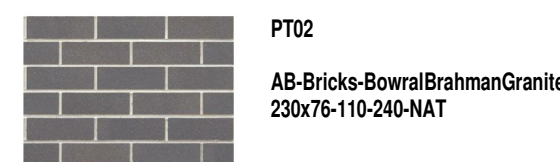
PROJECT
PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS
 36-38 Rodley Avenue, Penrith, NSW, 2750
 CLIENT
 Inglow Investments

MORSON GROUP
 DOMINANT ARCHITECTS - P F MORSON
 REGISTRATION NUMBER 8100
 A/C 21 18 460 024 484 41 18 480 024
 www.morsongroup.com
 021 930 8184
 PO Box 170, Parkes NSW 1330

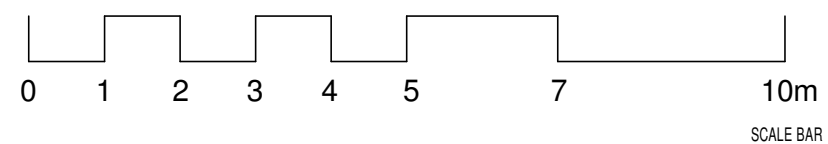
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SHEET NAME
BASEMENT 1

DRAWING NUMBER
DA12-1
 ISSUE NO.
P1



ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION



PROJECT
PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS
 36-38 Rodley Avenue, Penrith, NSW, 2750

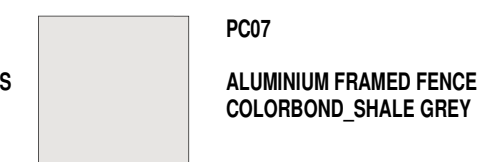
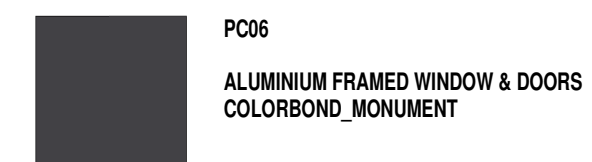
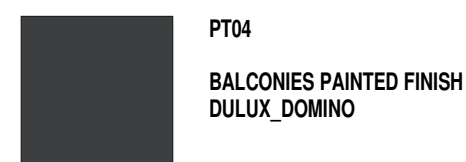
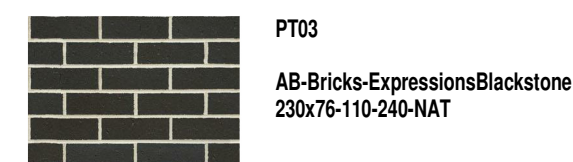
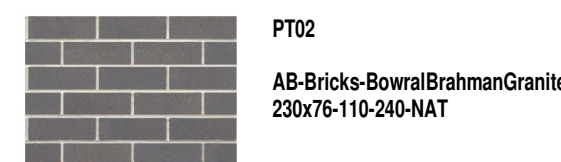
CLIENT
 Inglow Investments



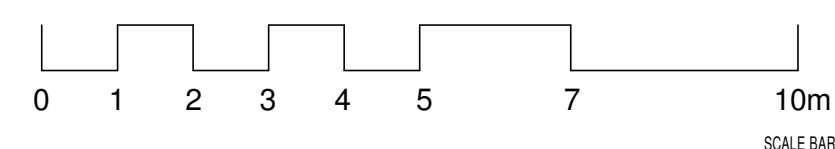
NOMINATED ARCHITECTS - P F MCKENSON
 REGISTRATION NUMBER 8105
 A/CN 138 480 054, ABA/41 138 480 054
 www.pfmckenson.com.au
 02 9500 4744
 PO Box 170, Potts Point, NSW 1530

SHEET NAME
ELEVATION NORTH
 SHEET SIZE: A1
 SCALE DATE
 As Indicated

DRAWING NUMBER
DA14
 ISSUE NO.
P1



ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION



PROJECT
PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS
 36-38 Rodley Avenue, Penrith, NSW, 2750

CLIENT
 Inflow Investments



NOMINATED ARCHITECTS - P F MORSON
 REGISTRATION NUMBER 8100
 A/CN 138 480 024, ABA 41 138 480 024
 www.morsongroup.com
 023 930 8744
 PO Box 170, Parkes, NSW 1330

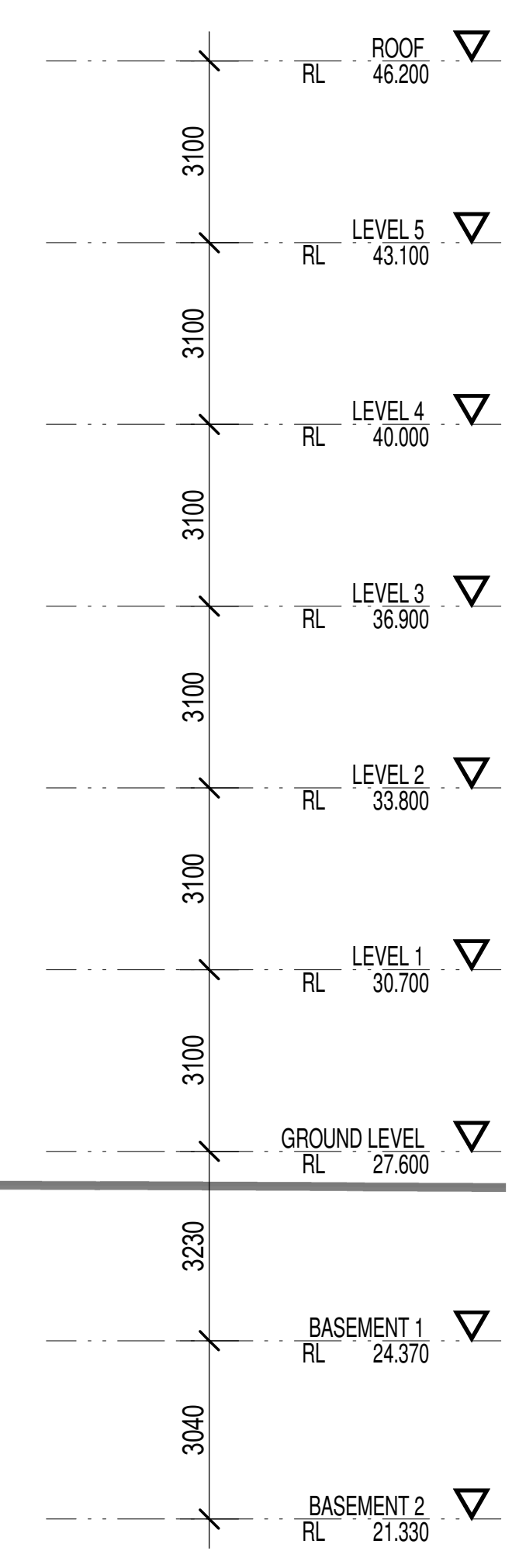
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SHEET NAME

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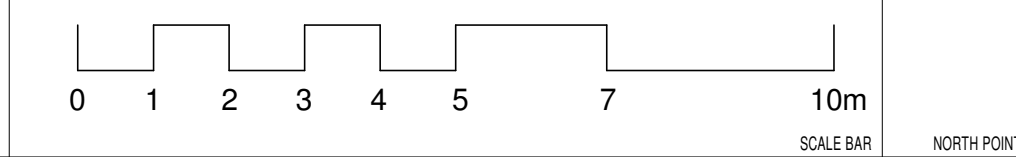
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 ISSUE NO. **P1**

RODLEY AVE



 <p>PT01 AB-Bricks-Neutral Red 230x76-110-240-NSW</p>	 <p>PT02 AB-Bricks-BowralBrahmanGranite 230x76-110-240-NAT</p>	 <p>PT03 AB-Bricks-ExpressionsBlackstone 230x76-110-240-NAT</p>	 <p>PT04 BALCONIES PAINTED FINISH DULUX_DOMINO</p>	 <p>PT05 AWNING PAINTED FINISH DULUX_FAIR_BIANCA_HALF</p>	 <p>PC06 ALUMINIUM FRAMED WINDOW & DOORS COLORBOND_MONUMENT</p>	 <p>PC07 ALUMINIUM FRAMED FENCE COLORBOND_SHALE GREY</p>
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ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION



PROJECT
PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS
 36-38 Rodley Avenue, Penrith, NSW, 2750
 CLIENT
 Inglow Investments



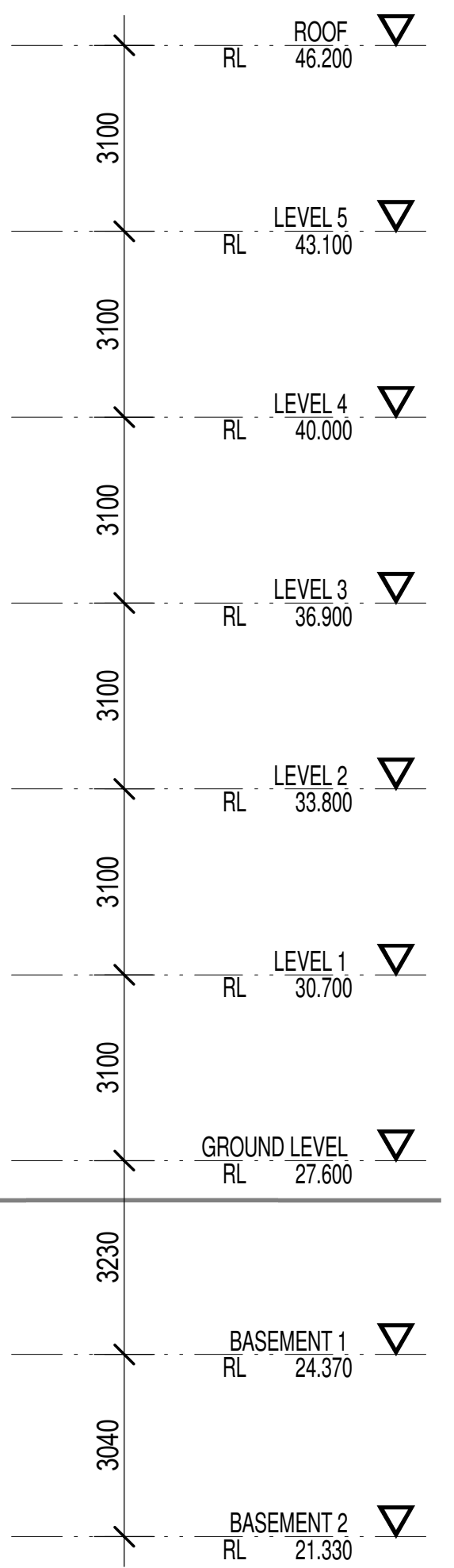
NOMINATED ARCHITECTS - P F MORSON
 REGISTRATION NUMBER 8100
 A/CN 138 480 056, ABN 61 138 480 056
 www.morsongroup.com
 020 990 8784
 PO Box 170, Parkes NSW 1330

SHEET NAME
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 SHEET SIZE: A1
 SCALE DATE
 As Indicated

DRAWING NUMBER
DA16
 ISSUE NO.
P1

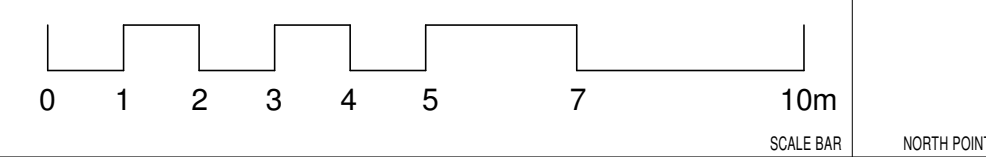


RODLEY AVE



	PT01 AB-Bricks-Neutral Red 230x76-110-240-NSW		PT02 AB-Bricks-BowralBrahmanGranite 230x76-110-240-NAT		PT03 AB-Bricks-ExpressionsBlackstone 230x76-110-240-NAT		PT04 BALCONIES PAINTED FINISH DULUX_DOMINO		PT05 AWNING PAINTED FINISH DULUX_FAIR BIANCA HALF		PC06 ALUMINIUM FRAMED WINDOW & DOORS COLORBOND_MONUMENT		PC07 ALUMINIUM FRAMED FENCE COLORBOND_SHALE GREY
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ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION



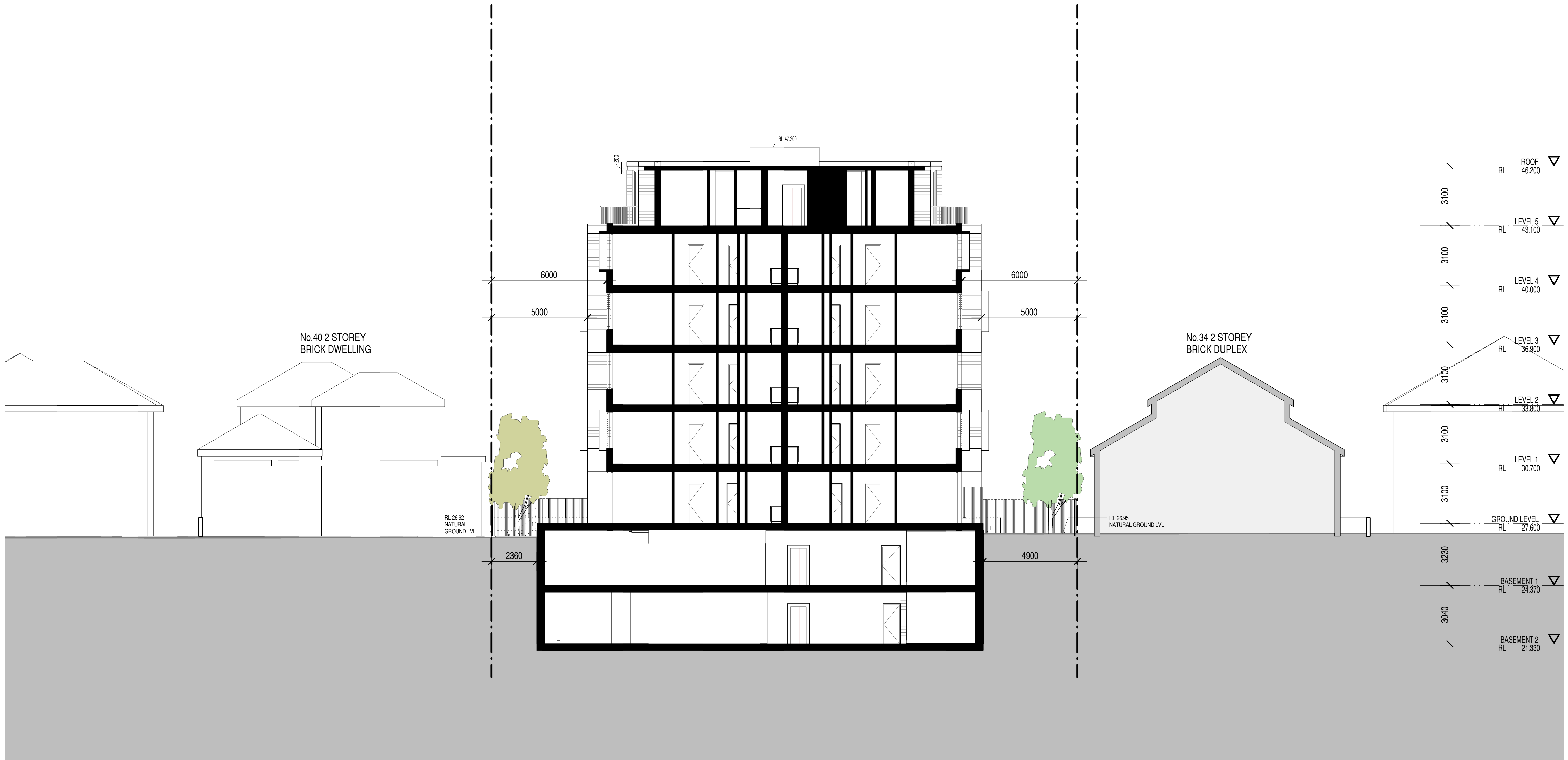
PROJECT
 PROPOSED RESIDENTIAL FLAT BUILDING
ADDRESS
 36-38 Rodley Avenue, Penrith, NSW, 2750
CLIENT
 Inglow Investments



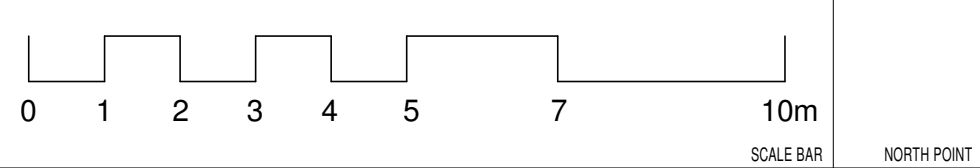
NOMINATED ARCHITECT: P.F. MORSON
 REGISTRATION NUMBER: 8100
 A/CN 138 480 056, ABN 61 138 480 056
 www.morsongroup.com
 020 980 8784
 PO Box 170, Parky Park, NSW 1330

SHEET NAME
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SHEET SIZE: A1
SCALE: As Indicated
DATE:

DRAWING NUMBER
 DA17
ISSUE NO.
 P1



ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION



PROJECT
PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS
 36-38 Rodley Avenue, Penrith, NSW, 2750
 CLIENT
 Inflow Investments

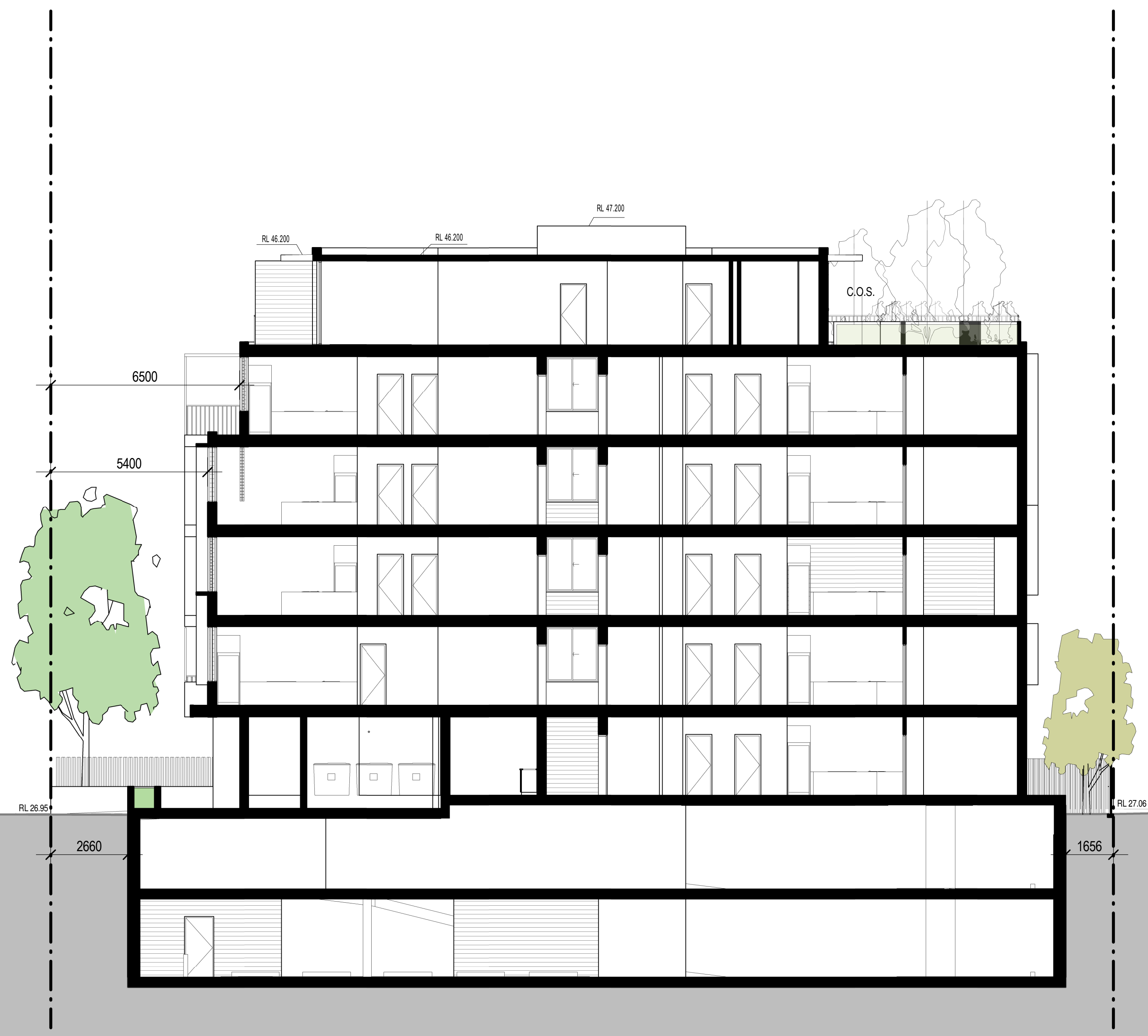


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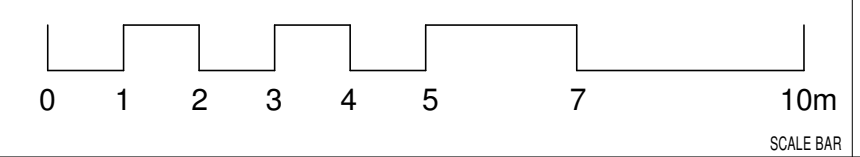
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 DRAWING NUMBER **DA18**
 ISSUE NO. **P1**

RODLEY AVE

CREEK



ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION



PROJECT
PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS
 36-38 Rodley Avenue, Penrith, NSW, 2750

CLIENT
 Inflow Investments

MORSON GROUP
 NOMINATED ARCHITECTS - P F MORSON
 REGISTRATION NUMBER #105
 A/CN 138 460 024, ABN #1 138 460 024
 www.morsongroup.com
 223 WOOD ST
 PO Box 170, Parramatta, NSW 1500

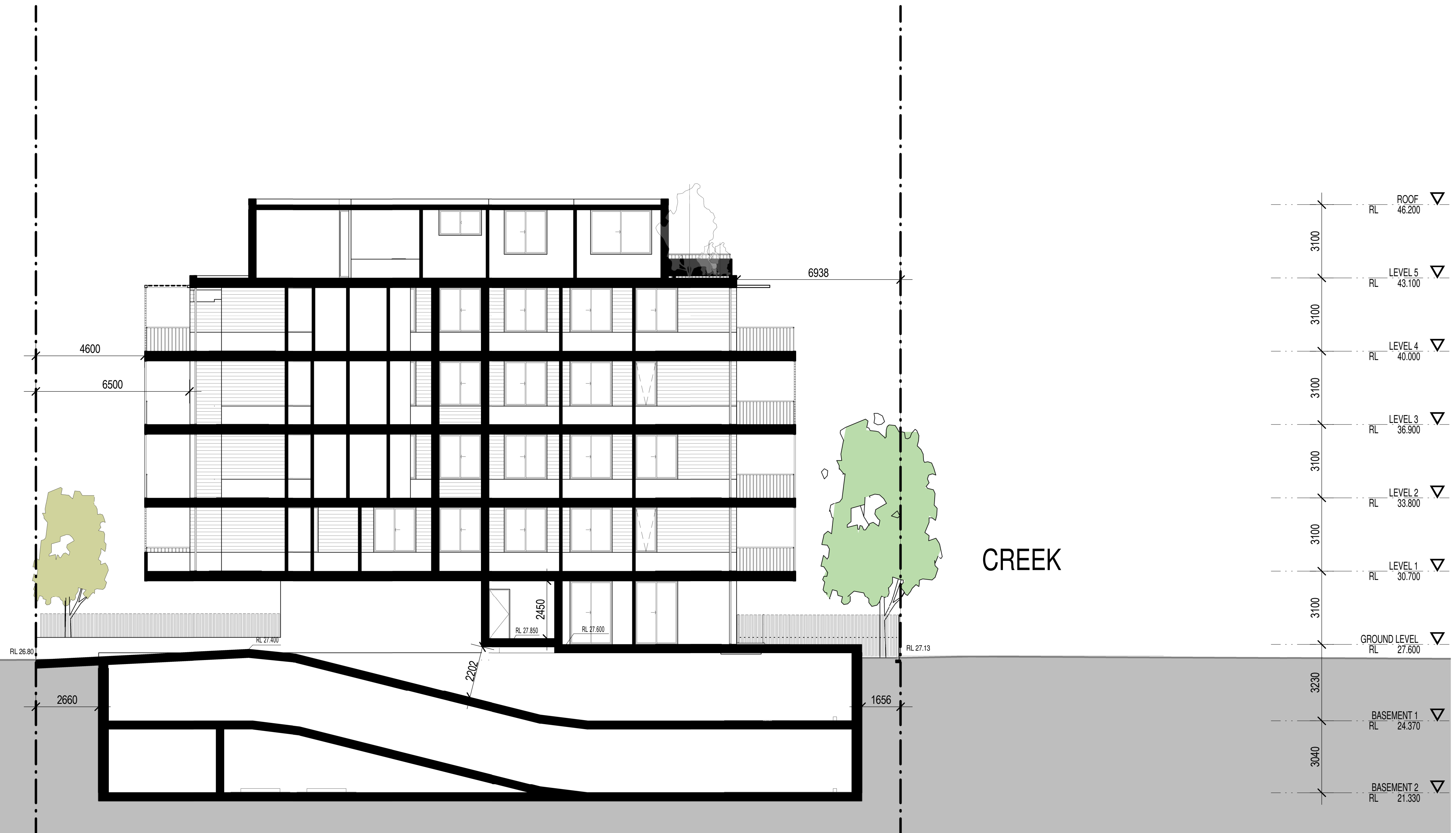
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SHEET NAME
SECTION 2

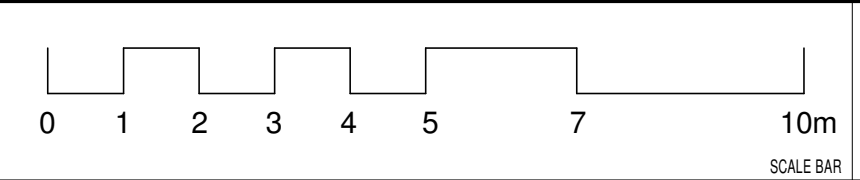
DRAWING NUMBER
DA19
 ISSUE NO.
P1

RODLEY AVE

CREEK



ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION



PROJECT
PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS
 36-38 Rodley Avenue, Penrith, NSW, 2750
 CLIENT
 Inglow Investments

MORSON GROUP
 NOMINATED ARCHITECT - P F MORSON
 REGISTRATION NUMBER 8100
 A/CN 138 480 026, ABN 41 138 480 026
 www.morsongroup.com
 223 WOOD ST
 PO Box 170, Parramatta, NSW 1500

SHEET SIZE: A1
 SCALE: DATE
 1:100

SHEET NAME: **SECTION 3**
 DRAWING NUMBER: **DA20**
 ISSUE NO.: **P1**



ISSUE	DATE	AMENDMENT
P1	20-07-2018	SUBMISSION

SCALE BAR NORTH POINT

PROJECT
PROPOSED RESIDENTIAL FLAT BUILDING
 ADDRESS
 36-38 Rodley Avenue, Penrith, NSW, 2750

CLIENT
 Inglow Investments

MORSON GROUP

 NOMINATED ARCHITECTS - P.F. MORSON
 REGISTRATION NUMBER #100
 A/CN 138 460 026, ABN #11 138 460 026
 www.morsongroup.com
 020 900 8784
 PO Box 170, Parkes NSW 1330

SHEET SIZE: A1
 SCALE DATE

SHEET NAME **VIEWS**
 DRAWING NUMBER **DA22**
 ISSUE NO. **P1**

THERMAL PERFORMANCE SPECIFICATIONS: (20331 – 36 Rodley Ave)

The following specifications take precedence over other plan notations for the construction of this building.

NOTE: In addition to BASIX commitments; building compliance is required to comply with the 'New South Wales Additions' in the current edition of the NCC – Vol. 1, at the time of building.

This includes New South Wales Part J(A). Specifically:

- Building thermal construction is in accordance with part J1.2
- loss of ceiling insulation is compensated for by increased roof insulation in accordance with Part J1.3(c)
- where metal frames are used that thermal breaks are installed in accordance with Part J1.3(d) and J1.5(c)
- Any roof lights, windows, doors and exhaust fans are sealed in accordance Part J3
- Any new air-conditioning system is installed in accordance with Parts J5.2(a), J5.2(b), J5.2(c), J5.2(d), J5.2(f) & J5.2(g)
- Any new mechanical ventilation system is installed in accordance with Part J5.3
- Any new miscellaneous exhaust system is installed in accordance with Part J5.4
- Any new heated water system is installed in accordance Part J7.2
- Energy monitoring equipment is installed in accordance Part J8.3

WINDOWS (total product specification – glass + frame)

U-value 6.70 (or less than) & SHGC 0.70 (+/-5%) (Default: Plain Glass in AL. frame)

EXTERNAL WALL (Medium colour)

Brick Veneer – R2.5 – 90mm thick Bulk insulation with reflective airgap

INTERNAL WALL

Cavity Panel/Concrete – No Insulation

Partition walls – No thermal insulation required

EXTERNAL FLOOR

Concrete Slab on Ground – No insulation

Suspended Concrete (above Basement areas) – R1.3 Bulk insulation

EXTERNAL CEILING/ROOF (Medium colour)

Concrete / Plasterboard – R1.3 bulk insulation (where roofspace or balcony above)

RATED either with NO DOWNLIGHTS or with LED downlights which do not penetrate ceiling insulation (ie: IC rated)

Nationwide House Energy Rating Scheme* — Class 2 summary



Certificate number: **0003068690**

Certificate Date: **15 Aug 2018**

★ Average Star rating: **7.6**

Assessor details

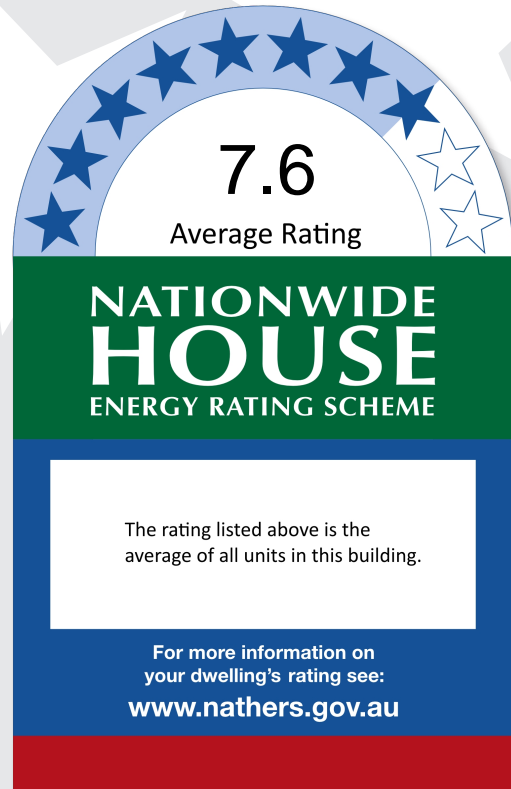
Accreditation number: **20039**
Name: **David Howard**
Organisation: **Partners Energy Management**
Email: **david@partnersenergy.com.au**
Phone: **0421381005**
Declaration of interest: **The Assessor has provided design advice to the Applicant**
Software: **BERS Pro v4.3.0.2c (3.13)**

AAO: **ABSA**

Dwelling details

Street: **36-38 Rodley Ave**
Suburb: **Penrith**
State: **NSW**
Postcode: **2750**

Scan to access this certificate online and confirm this is valid.



Summary of all dwellings

Certificate Details

Certificate number	Unit number	Heating load	Cooling load	Total load	Star Rating
0003068467	U1	32.7	26.6	59.2	7.4
0003068475	U2	49.1	29.6	78.7	6.4
0003068483	U3	41.8	28.0	69.8	6.9
0003068491	U11	14.8	25.6	40.4	8.2
0003068509	U12	8.2	26.0	34.3	8.4
0003068533	U13	34.6	31.4	66.0	6.9
0003068517	U14	21.3	28.1	49.4	7.8
0003068525	U21	15.3	25.3	40.7	8.2
0003068558	U22	8.6	25.7	34.3	8.4
0003068541	U23	35.6	31.0	66.6	6.9
0003068566-01	U24	22.1	27.6	49.7	7.8
0003068590	U31	15.7	25.0	40.7	8.2
0003068574	U32	8.8	25.5	34.3	8.4
0003068582	U33	36.0	30.8	66.8	6.9
0003068624	U34	22.4	27.4	49.8	7.8

* Nationwide House Energy Rating Scheme (NatHERS) is an initiative of the Australian, state and territory governments.

For more details see www.nathers.gov.au

Nationwide House Energy Rating Scheme* - Class 2 summary



Certificate number: **0003068690**

Certificate Date:

15 Aug 2018

★ Average Star rating: **7.6**

Summary of all dwellings continued

Certificate Details

Certificate number	Unit number	Heating load	Cooling load	Total load	Star Rating
0003068608	U41	18.0	22.9	41.0	8.2
0003068616	U42	10.5	22.8	33.3	8.6
0003068632	U43	38.9	27.3	66.2	6.9
0003068640	U44	24.9	25.7	50.6	7.8
0003068657	U51	50.5	34.5	85.1	6.1
0003068665	U52	37.2	37.9	75.1	6.6



Secure payment gateway provided by 

NSW BASIX - New Dwelling

Payment Receipt

Dear Sir/Madam

Please retain this payment receipt issued by Westpac as proof that the payment was received, processed and accepted by Westpac on behalf of Planning & Infrastructure.

Planning & Infrastructure will attach a Tax Receipt to your Completed Project file in the BASIX Project Portfolio.

Project name	20331
Request number	WCN 000287221
Payment amount	\$480.00 AUD
Card holder	michael t may
Credit card number	455702...800
Expiry date (mm/yy)	05 / 19
Receipt number	2239457043
Timestamp	16 Aug 2018 20:28