



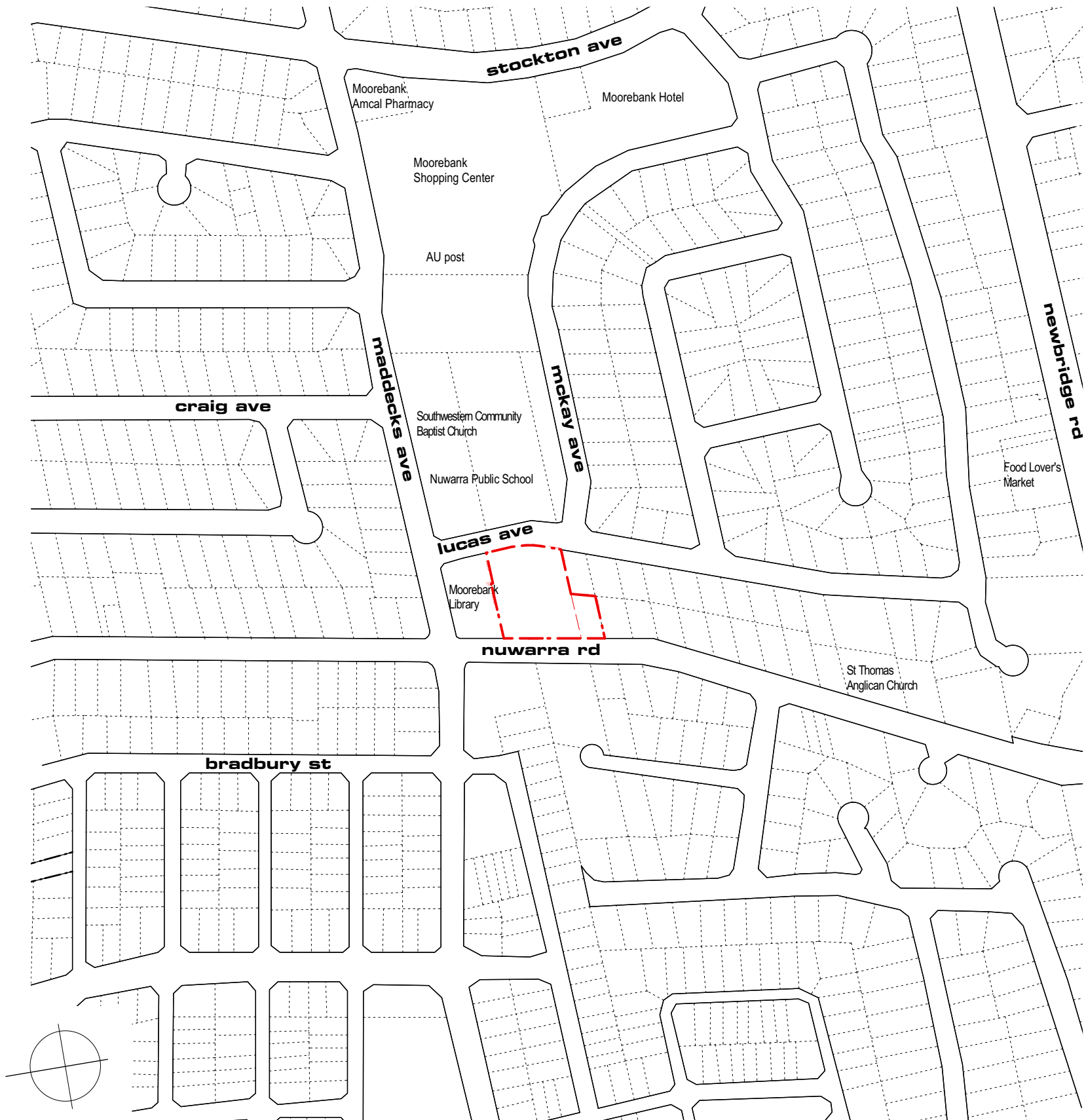
DEVELOPMENT APPLICATION

ADDITIONAL INFORMATION

DRAWING SCHEDULE

DRAWING LIST	
Dwg No.	Name
1563 DA00	cover page
1563 DA01	introduction
1563 DA02	site analysis - location plan
1563 DA03	site analysis - site plan
1563 DA04	site analysis - site photos
1563 DA05	design analysis
1563 DA06	demolition plan
1563 DA07	proposed level -02
1563 DA08	proposed level -01
1563 DA09	proposed level 00 / lucas ave ground
1563 DA10	proposed level 01 / nuwarra rd ground
1563 DA11	proposed level 02
1563 DA12	proposed level 03
1563 DA13	proposed level 04
1563 DA14	proposed level 05
1563 DA15	proposed level 06
1563 DA16	NOT USED
1563 DA17	proposed roof level
1563 DA18	nuwarra rd elevations
1563 DA19	lucas ave elevations
1563 DA20	courtyard sections
1563 DA21	north / south elevations
1563 DA22	cross section
1563 DA23	finishes
1563 DA24	summary of area counts
1563 DA25	summary of GFA calculations
1563 DA26	summary of affordable units
1563 DA27	summary of ADG cross ventilation
1563 DA28	summary of ADG solar access
1563 DA29	ADG solar & daylight analysis 1
1563 DA30	ADG solar & daylight analysis 2
1563 DA31	adaptable unit layouts 1
1563 DA32	adaptable unit layouts 2
1563 DA33	strata subdivision plans 1
1563 DA34	strata subdivision plans 2
1563 DA35	shadow analysis plans - winter solstice
1563 DA36	ADG solar & daylight analysis 3
1563 DA40	party wall detail
1563 DA41	substation detail
1563 DA42	shadow analysis plans - march/september equinox

LOCATION PLAN



ACCOMMODATION SUMMARY

Unit Number	Unit Type	Net Area	Storage	Unit Number	Unit Type	Net Area	Storage
Lucas Level 00				Nuwarra Level 04			
C6	Commé	138.96 sq m		04-11	2 bed	90.63 sq m	4.5+3.5 m3
C7	Commé	154.8 sq m		04-12	1 bed	59.42 sq m	4.0+2.0 m3
Lucas Level 01				04-13	3 bed	101.79 sq m	7.0+3.0 m3
01-01	2 Bed	84.19 sq m	4.0+4.0 m3	04-14	2 Bed	84.02 sq m	4.0+4.0 m3
01-02	2 bed	80.11 sq m	4.5+3.5 m3	04-15	2 bed	76.15 sq m	4.0+4.0 m3
01-03	2 bed	81.35 sq m	5.0+3.0 m3	04-16	2 bed	87.51 sq m	5.5+2.5 m3
01-04	2 Bed	77.34 sq m	4.0+4.0 m3	04-17	2 Bed	84.37 sq m	5.0+3.0 m3
01-05	1 bed	54.39 sq m	4.5+1.5 m3	04-18	2 bed	76.02 sq m	5.0+3.0 m3
01-06	3 bed	97.8 sq m	5.5+4.5 m3	04-19	1 bed	53.51 sq m	4.0+2.0 m3
01-07	3 bed	100.89 sq m	5.5+4.5 m3	04-20	2 bed	70.73 sq m	4.0+4.0 m3
01-08	1 bed	50.52 sq m	4.0+2.0 m3	04-21	2 bed	74.24 sq m	4.0+4.0 m3
01-09	1 bed	54.77 sq m	3.0+3.0 m3	04-22	2 bed	78.84 sq m	4.5+3.5 m3
01-10	2 bed	75.67 sq m	4.0+4.0 m3	04-23	2 bed	81.17 sq m	4.0+4.0 m3
Lucas Level 02				Nuwarra Level 05			
02-01	2 Bed	84.25 sq m	4.0+4.0 m3	05-11	2 bed	90.58 sq m	4.5+3.5 m3
02-02	2 bed	80.72 sq m	4.5+3.5 m3	05-12	1 bed	59.43 sq m	4.0+2.0 m3
02-03	2 bed	81.34 sq m	5.0+3.0 m3	05-13	3 bed	101.78 sq m	7.0+3.0 m3
02-04	2 Bed	77.34 sq m	4.0+4.0 m3	05-14	2 Bed	83.79 sq m	4.0+4.0 m3
02-05	1 bed	54.37 sq m	4.5+1.5 m3	05-15	2 bed	76.17 sq m	4.0+4.0 m3
02-06	3 bed	97.77 sq m	5.5+4.5 m3	05-16	2 bed	87.64 sq m	5.5+2.5 m3
02-07	3 bed	100.9 sq m	5.5+4.5 m3	05-17	2 Bed	84.25 sq m	5.0+3.0 m3
02-08	1 bed	50.72 sq m	4.0+2.0 m3	05-18	2 bed	75.79 sq m	5.0+3.0 m3
02-09	1 bed	54.4 sq m	3.0+3.0 m3	05-19	1 bed	53.7 sq m	4.0+2.0 m3
02-10	2 bed	75.67 sq m	4.0+4.0 m3	05-20	2 bed	78.83 sq m	4.5+3.5 m3
Lucas Level 03				05-21	2 bed	80.91 sq m	4.0+4.0 m3
Nuwarra Level 02				Nuwarra Level 06			
02-11	2 bed	90.57 sq m	4.5+3.5 m3	06-01	2 bed	90.72 sq m	4.5+3.5 m3
02-12	1 bed	59.1 sq m	4.0+2.0 m3	06-02	2 bed	77.39 sq m	4.0+4.0 m3
02-13	3 bed	101.84 sq m	7.0+3.0 m3	06-03	2 bed	77.32 sq m	4.0+4.0 m3
02-14	2 Bed	84.02 sq m	4.0+4.0 m3	06-04	2 bed	84.73 sq m	4.0+4.0 m3
02-15	2 bed	76.15 sq m	4.0+4.0 m3	06-05	2 bed	76.17 sq m	4.0+4.0 m3
02-16	2 bed	87.51 sq m	5.5+2.5 m3	06-06	2 bed	87.51 sq m	5.5+2.5 m3
02-17	2 Bed	84.37 sq m	5.0+3.0 m3	Nuwarra Level 03			
02-18	2 bed	76.01 sq m	5.0+3.0 m3	03-11	2 bed	90.59 sq m	4.5+3.5 m3
02-19	2 bed	75.84 sq m	5.0+3.0 m3	03-12	1 bed	59.42 sq m	4.0+2.0 m3
02-20	2 bed	78.75 sq m	6.0+2.0 m3	03-13	3 bed	101.84 sq m	7.0+3.0 m3
02-21	2 bed	75.79 sq m	4.5+1.5 m3	03-14	2 Bed	83.92 sq m	4.0+4.0 m3
02-22	2 bed	78.87 sq m	4.5+3.5 m3	03-15	2 bed	76.14 sq m	4.0+4.0 m3
02-23	2 bed	81.18 sq m	4.0+4.0 m3	03-16	2 bed	87.51 sq m	5.5+2.5 m3
Nuwarra Level 03				03-17	2 Bed	85.18 sq m	5.0+3.0 m3
03-11	2 bed	90.59 sq m	4.5+3.5 m3	03-18	2 bed	76.02 sq m	5.0+3.0 m3
03-12	1 bed	59.42 sq m	4.0+2.0 m3	03-19	2 bed	75.83 sq m	5.0+3.0 m3
03-13	3 bed	101.84 sq m	7.0+3.0 m3	03-20	2 bed	78.82 sq m	6.0+2.0 m3
03-14	2 Bed	83.92 sq m	4.0+4.0 m3	03-21	2 bed	76.36 sq m	4.5+1.5 m3
03-15	2 bed	76.14 sq m	4.0+4.0 m3	03-22	2 bed	78.8 sq m	4.5+3.5 m3
03-16	2 bed	87.51 sq m	5.5+2.5 m3	03-23	2 bed	81.18 sq m	4.0+4.0 m3
03-17	2 Bed	85.18 sq m	5.0+3.0 m3				
03-18	2 bed	76.02 sq m	5.0+3.0 m3				
03-19	2 bed	75.83 sq m	5.0+3.0 m3				
03-20	2 bed	78.82 sq m	6.0+2.0 m3				
03-21	2 bed	76.36 sq m	4.5+1.5 m3				
03-22	2 bed	78.8 sq m	4.5+3.5 m3				
03-23	2 bed	81.18 sq m	4.0+4.0 m3				

*Storage: A + B = C
A = apartment storage volume
B = garage storage volume
C = 1 bed min. storage = 6 m3
2 bed min. storage = 8 m3
3 bed min. storage = 10 m3

DEVELOPMENT YIELD

The proposed development will provide:

Parking	
2.5 levels basement carparking	- 215 car spaces
	-23 visitor
	-15 accessible
	- 28 bicycle spaces
Residential	
Total Units = 76	- 1 bed Units = 12 (16%)
5 levels residential	- 2 Bed Units = 56 (74%)
	- 3 Bed Units = 8 (11%)
Commercial	
Total Units = 7	- GF storefronts = 7
Ground floor commercial	

PROJECT DESCRIPTION

the site

The site is located at 101 & Lot 01 Nuwarra Road, Moorebank near the junction of Maddecks Avenue

The site has an 81.8m long street frontage to Nuwarra Road and a 42.2m frontage to Lucas Avenue.

The existing site consists of one and two-storey commerical buildings.

The site has a combined area of approximately 5210 m2.

Lot 101 of the site lies within a B2 Local Center zone and lot 01 of the site lies within an R4 Residential zone

PROJECT SUMMARY

Lucas building							
	1B	2B	3B	total	cross vent	solar access	no sun
level 00 (commercial)	0	0	0	0	0	0	0
level 01	3	5	2	10	5	6	1
level 02	3	5	2	10	8	7	1
Nuwarra building							
	1B	2B	3B	total	cross vent	solar access	no sun
level 01 (commercial)	0	0	0	0	0	0	0
level 02	1	11	1	13	7	10	0
level 03	1	11	1	13	7	10	0
level 04	2	10	1	13	7	10	0
level 05	2	8	1	11	6	9	0
level 06	0	6	0	6	6	4	0
TOTAL				76	46	56	2
	16%	74%	11%		61%	74%	3%
cars DCP				12	84	16	19 visit
							131 spaces req'd

BASIX Requirements

External Walls:
Boundary Wall: 200mm Precast Concrete: (medium colour) SEE TABLE FOR THOSE UNITS REQUIRING INSULATION
FC cladding: Reflective foil: R2.0: plasterboard (medium colour)
Party Wall: 75mm AAC: R1.0 insulation: plasterboard lined both sides. SEE TABLE FOR THOSE UNITS REQUIRING ADDITIONAL INSULATION
Internal Walls:
- Within each unit: plasterboard on studs (R1.0 insulation)
- Party Wall: 75mm AAC: R1.0 insulation: plasterboard lined both sides.
Windows: Aluminium SG Clear: U = 6.70: SHGC = 0.70 - SEE TABLE FOR UNITS REQUIRING HIGHER PERFORMING GLAZING
Roof:
Below a Tiled Walking Surface: Concrete slab 150mm - Drained Tile walking surface - R2.0 insulation under slab - Susp. Ceiling under
Upper Levels Nuwarra Block: Metal deck roof: AG foil (sarking): air gap: R3.5: 10mm plasterboard
Ceiling: Plasterboard (no insulation)- SEE TABLE FOR UNITS REQUIRING INSULATION IN CEILING
Floor: Concrete slab: no insulation - SEE TABLE FOR UNITS REQUIRING INSULATION IN FLOOR
Floor Covering: Ceramic tiles in wet areas, timber elsewhere
Exhaust Fans: must be sealed
Downlights: must be sealed

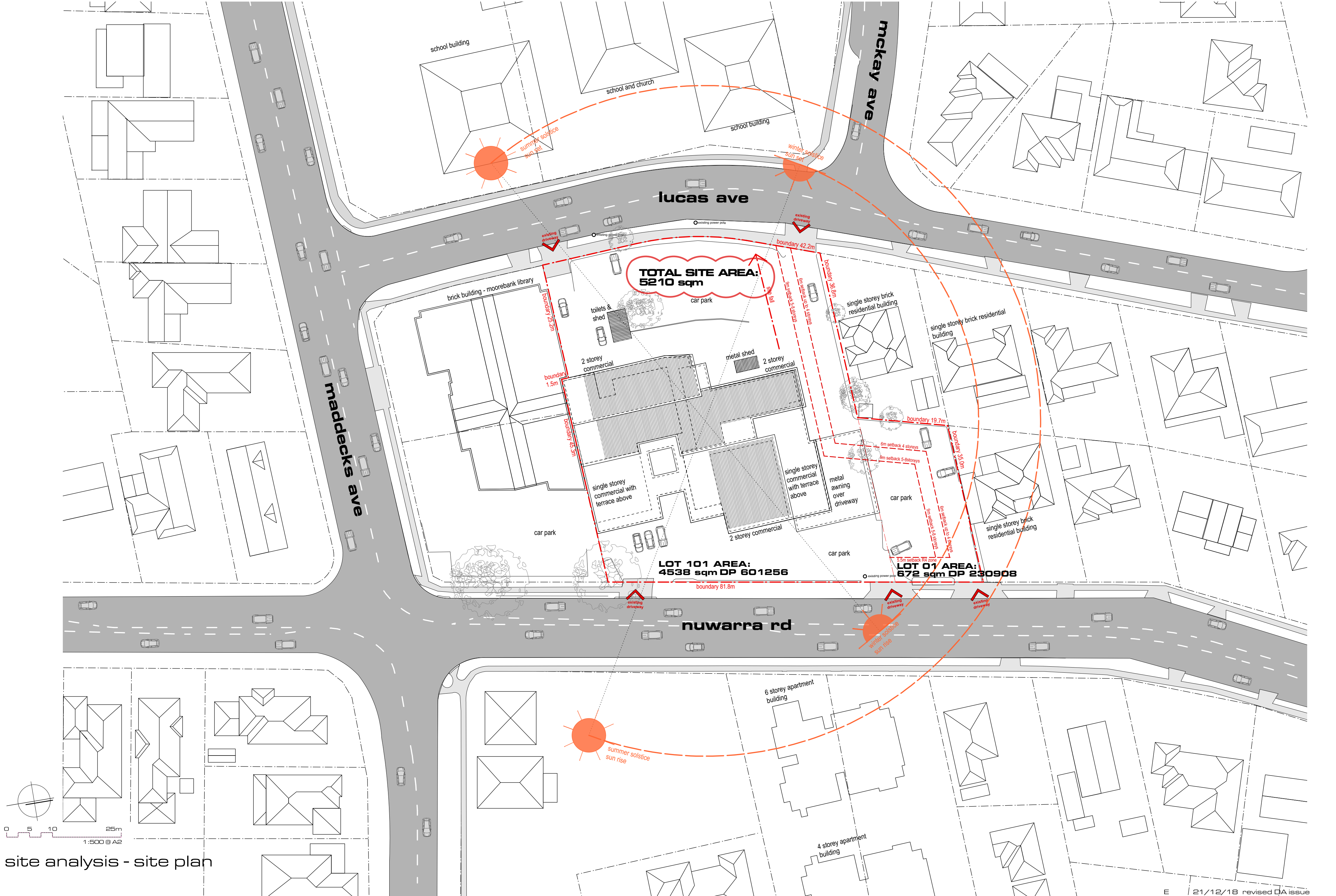
BASIX Additional Insulation Requirements

Units	Additional Requirements
02-11	R2.0 insulation in boundary wall
02-17	R1.5 insulation in floor above 'non-conditioned air'
03-11	R1.5 insulation in boundary wall
04-11	R1.5 insulation in boundary wall
04-20	R2.0 insulation in ceiling below concrete walking surface.
05-14	R2.0 insulation in ceiling below concrete walking surface.
05-15	Aluminium SG High Solar Gain Low-E: U = 5.4: SHGC = 0.58
05-17	R2.0 insulation in ceiling below concrete walking surface.
05-18	R2.0 insulation in ceiling below concrete walking surface.
05-19	R2.0 insulation in ceiling below concrete walking surface.
05-20	R2.0 insulation in ceiling below concrete walking surface.
05-21	R2.0 insulation in ceiling below concrete walking surface.
06-01	R2.0 insulation in ceiling below concrete walking surface +Aluminium SG High Solar Gain Low-E: U = 5.4: SHGC = 0.58
06-02	R2.0 insulation in ceiling below concrete walking surface.
06-03	R2.0 insulation in ceiling below concrete walking surface.
06-04	R2.0 insulation in ceiling below concrete walking surface.
06-05	R2.0 insulation in ceiling below concrete walking surface.
06-06	R2.0 insulation in ceiling below concrete walking surface.

introduction



site analysis - location plan



site analysis - site plan



1. view looking south-west down lucas avenue



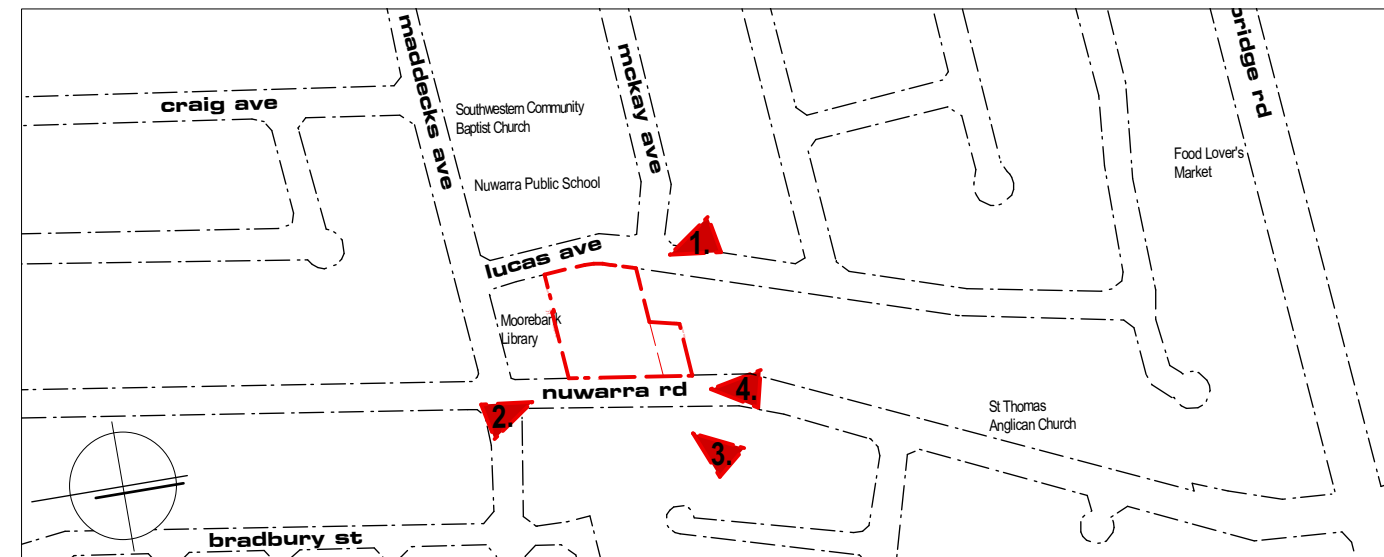
2. view looking north-east from corner of maddecks avenue and nuwarra road



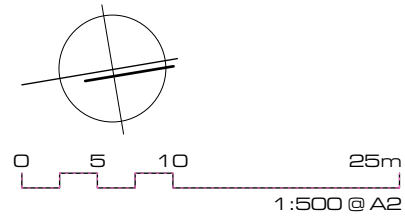
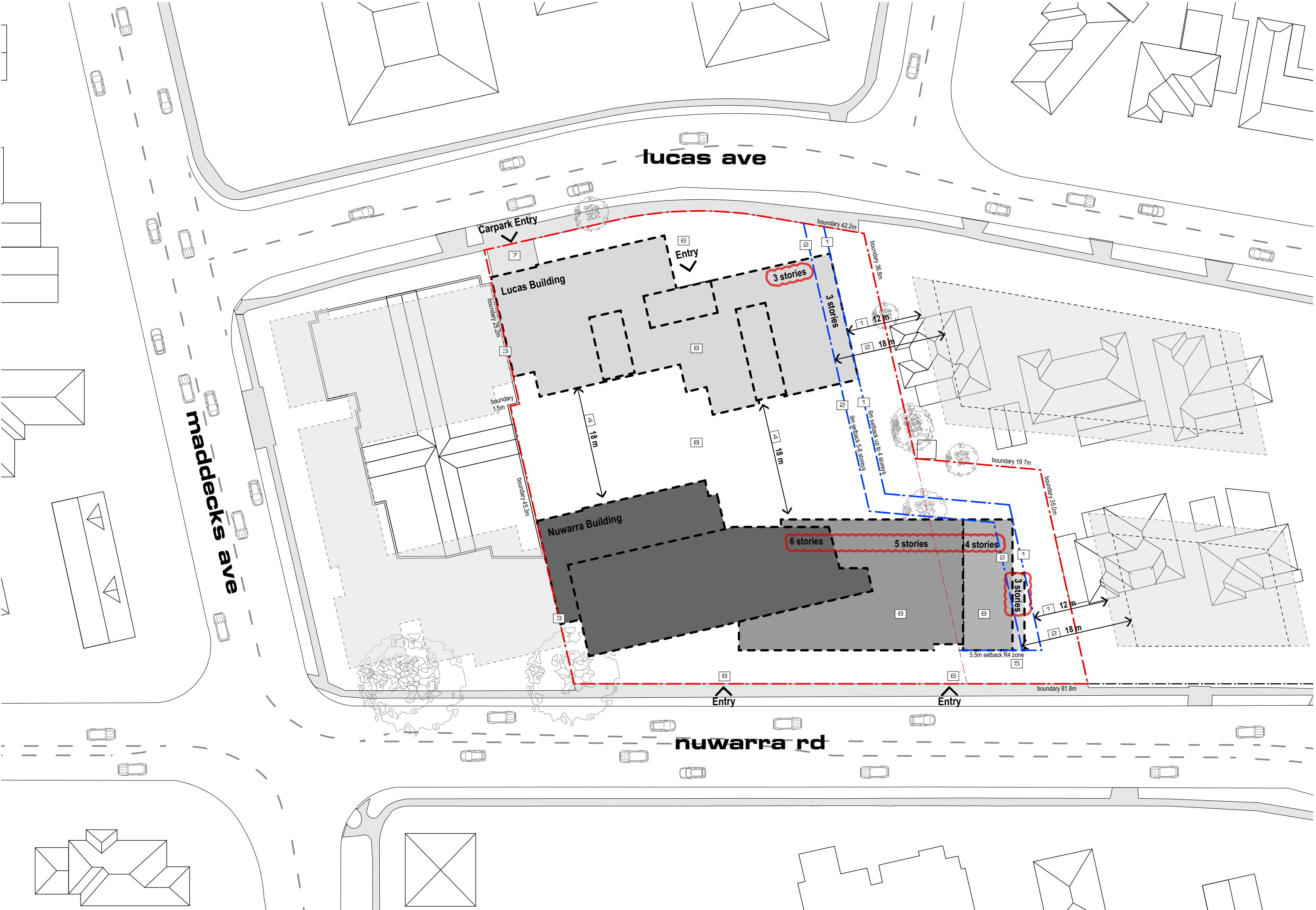
3. view looking south-east down nuwarra road



4. view looking south down nuwarra road



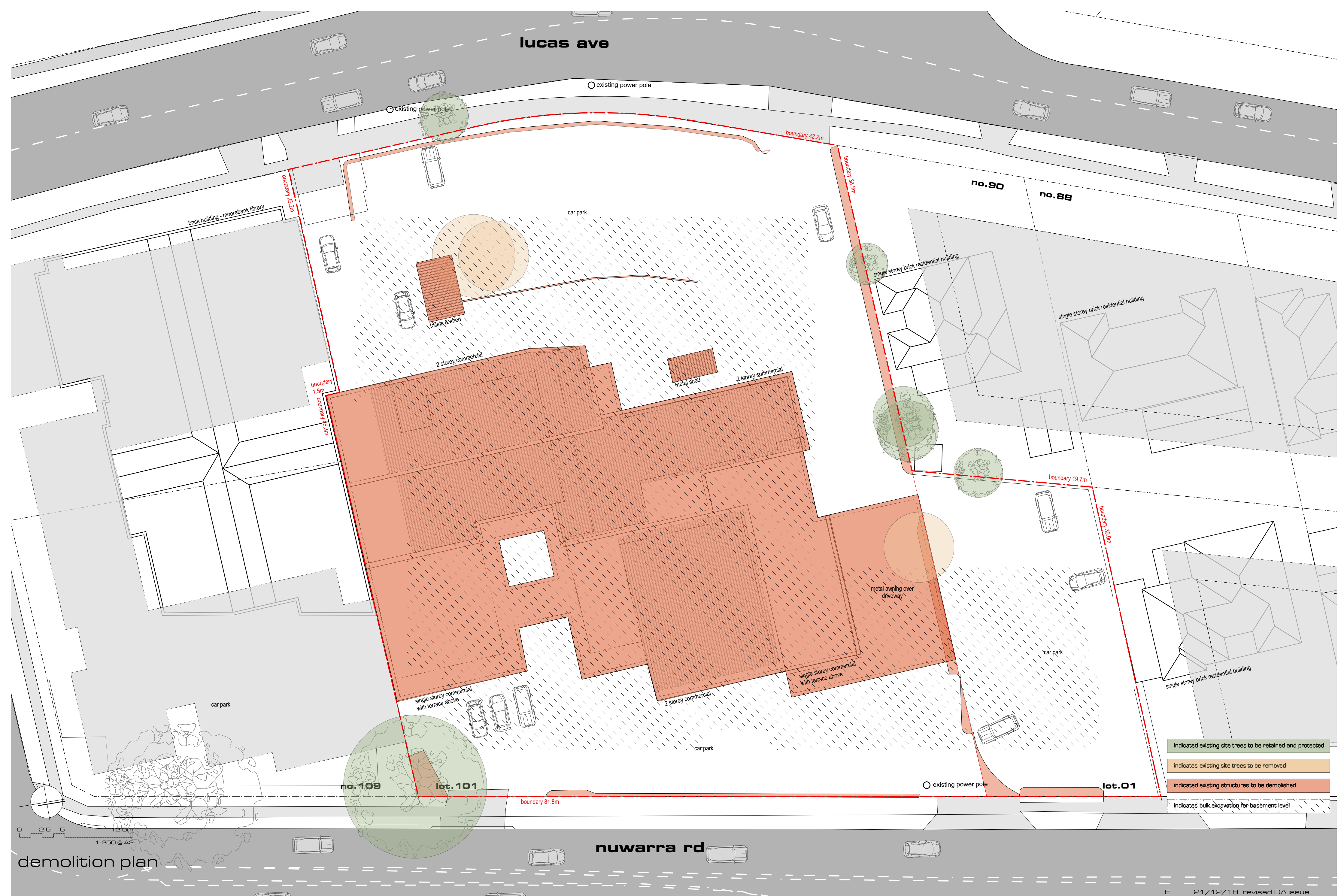
site analysis - site photos

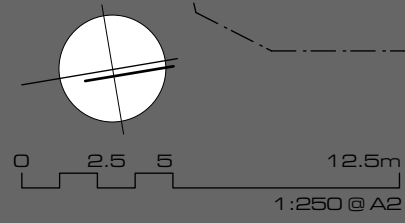


design analysis

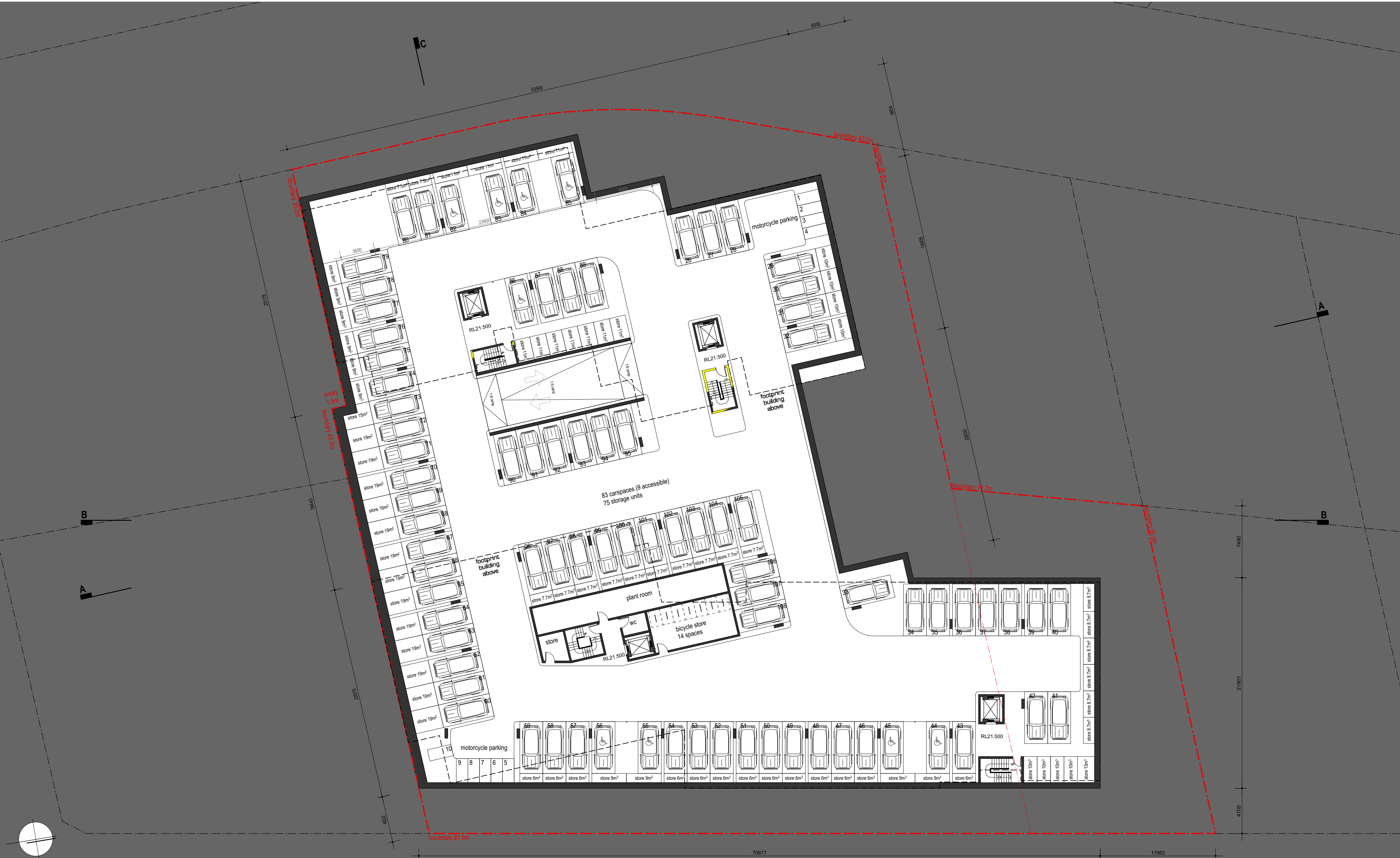


- | | |
|---|--|
| <p>1 6 m setback
to provide 12 meter building separation between habitable rooms in buildings up to 4 storeys recommended by ADG</p> <p>2 9 m setback
to provide 18 meter building separation between habitable rooms in buildings up to 8 storeys recommended by ADG</p> <p>3 nil setback
building provides continuous street wall to boundary to allow future development on adjoining site</p> <p>4 18 m separation
to provide 18 meter building separation between habitable rooms in buildings up to 8 storeys recommended by ADG</p> <p>5 5.5 m setback
5.5 meter setback LDCP R4 zone</p> | <p>6 pedestrian access</p> <p>7 vehicular access</p> <p>8 communal open space</p> <div><p>proposed building footprint - 6 stories</p><p>proposed building footprint - 5 stories</p><p>proposed building footprint - 4 stories</p><p>proposed building footprint - 3 stories</p></div> <p>buildings in blue show possible envelope for future developments on adjoining properties</p> |
|---|--|

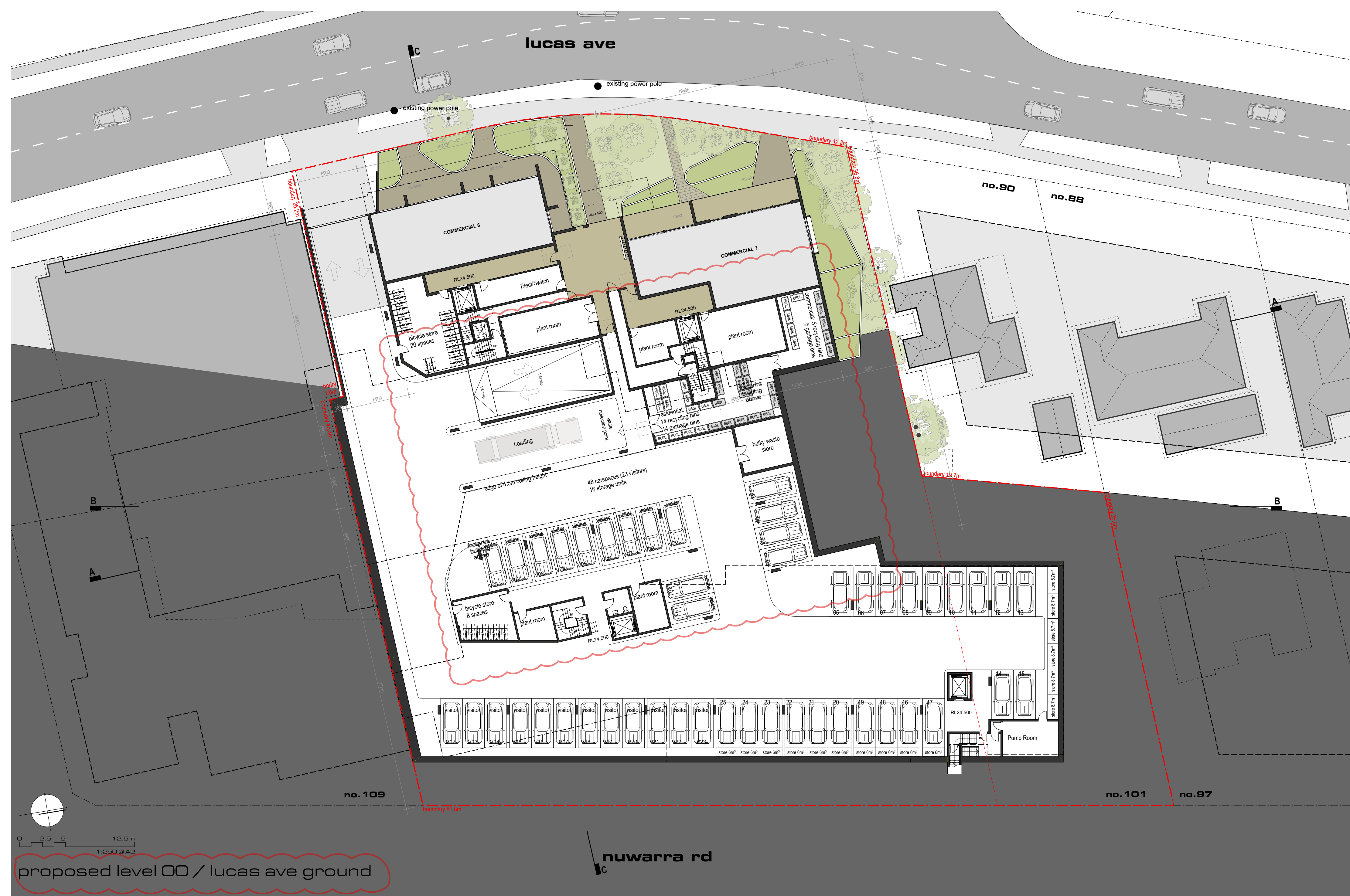




1563 - DA07 E



proposed level -01

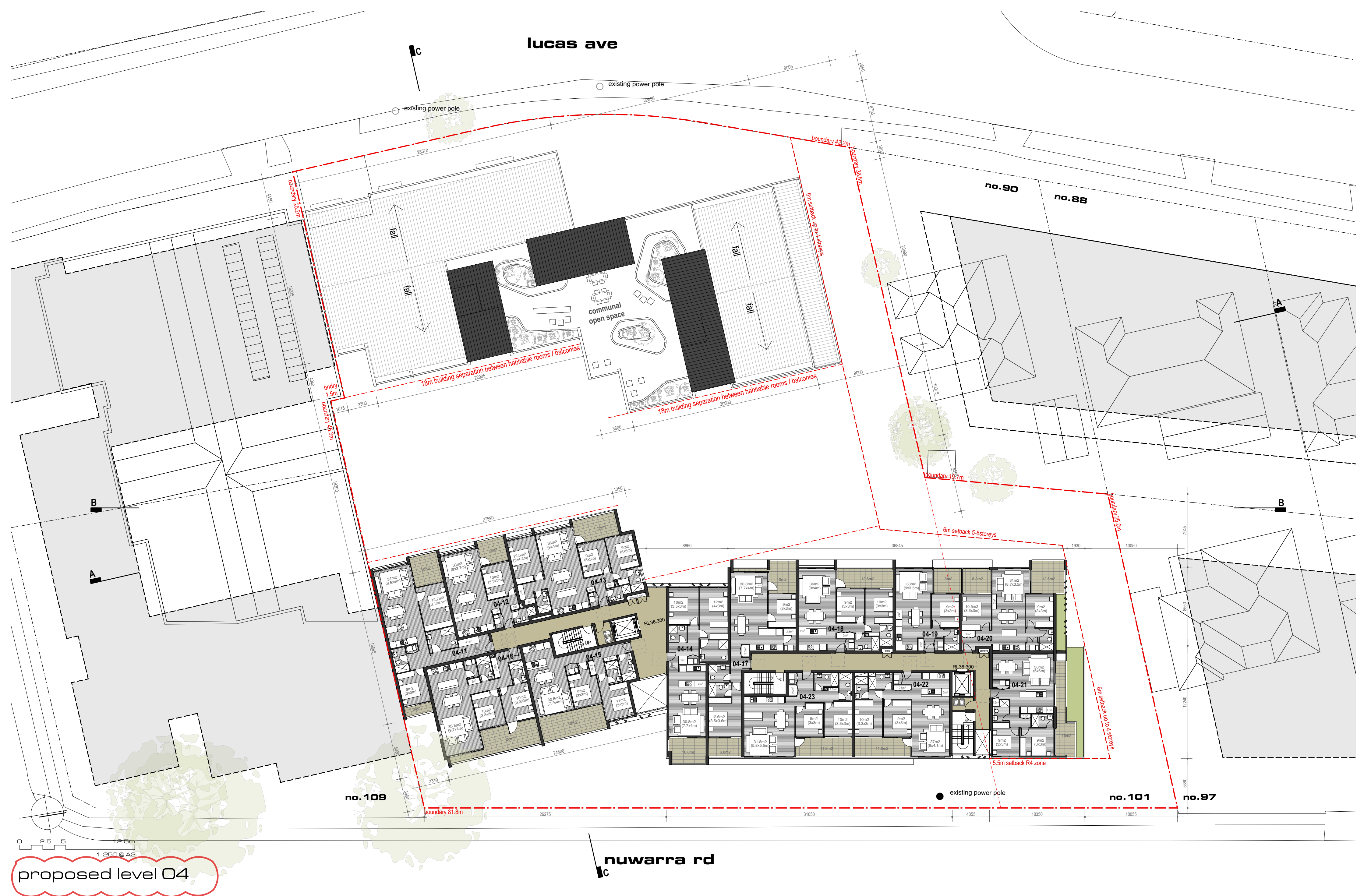


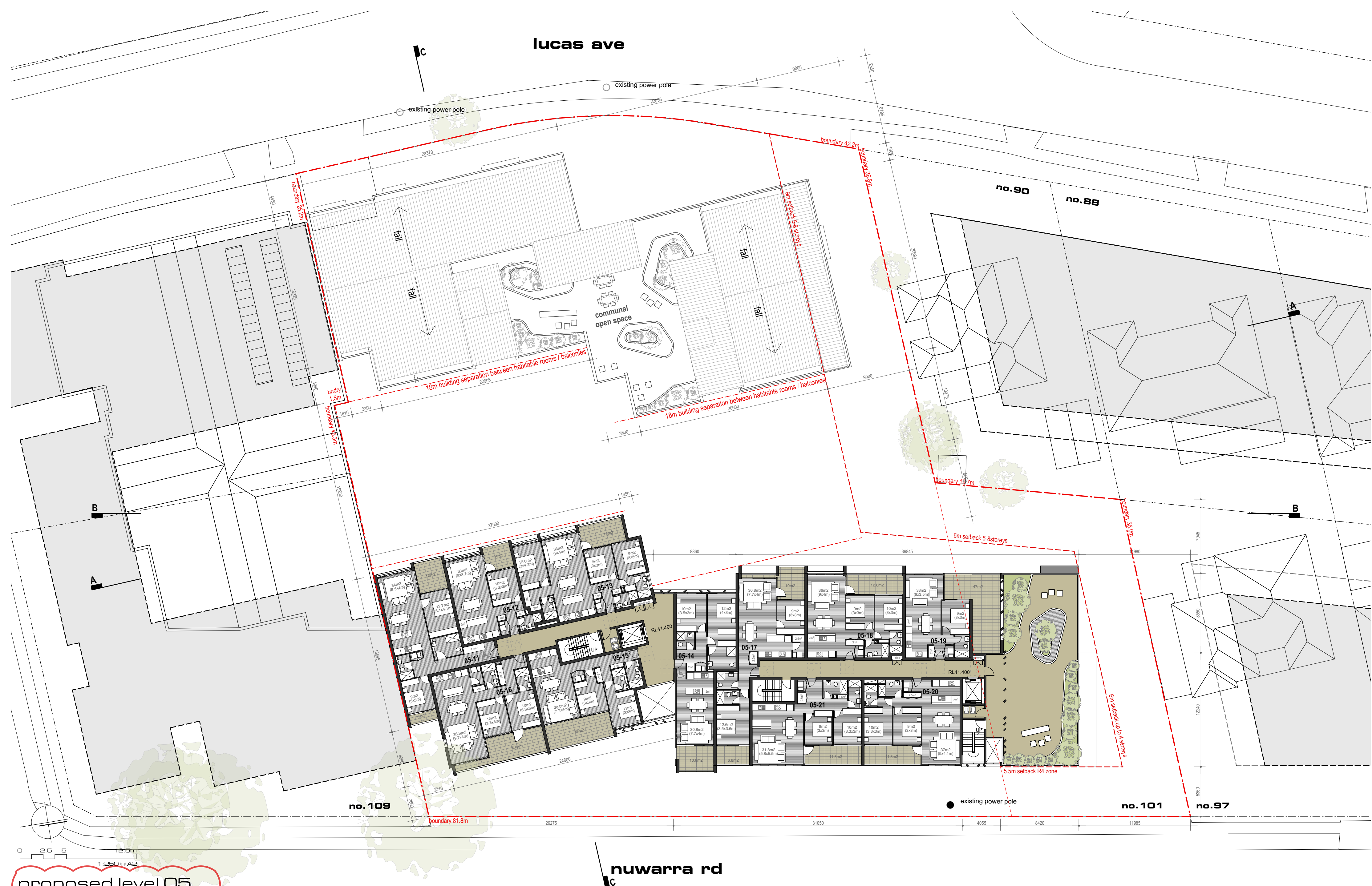
proposed level 00 / lucas ave ground

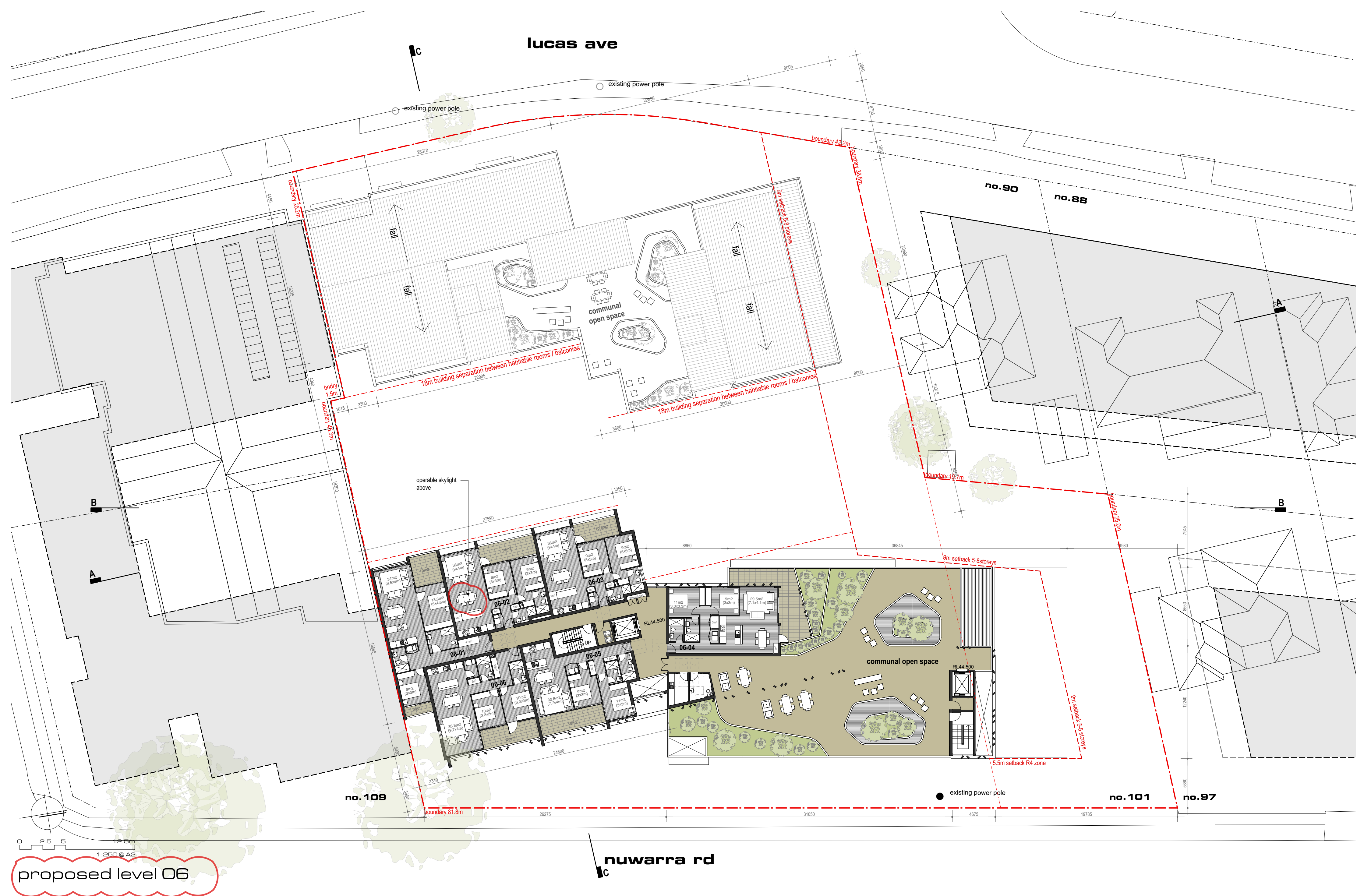


proposed level 01 / nuwarra rd ground











NUWARRA - street elevation



NUWARRA - building elevation

0 2.5 5 12.5m
1:250 @ A2
nuwarra rd elevations

balcony - painted render: Dulux 'Endless Dusk' (PG1F3)	painted render: Dulux 'Sageyore Grey' (PG1H6)	balcony - metal: Powdercoated handrail and bars. Colour: Colorbond 'Monument' (C29)	awning cladding: metal cladding edge and underside of awning. Provider TBA colour: 'monument' (C29)	facade screen / framing: Trend windows, powdercoated aluminium frame. Colour: Colorbond 'Monument' (C29)	painted render: Dulux 'Wayward Grey' (PG1G8)	louvres: Dulux Duralloy powdercoated louvres. Colour: Anotec off-white (51271)	painted render: Dulux 'Sageyore Grey' (PG2C6)	painted render: Dulux 'Tranquil Retreat' (PG1F1)	painted render: Dulux 'Texicon' (PN2F1)	roofing: Prepainted Colorbond Custom Oro 'Accent' metal sheet cladding. Vertical profile. Colour: 'Monument' (C29)	metal fence: 1800mm Colorbond metal fence. Colour: Colorbond 'Monument' (C29)

permissible building envelope

E 21/12/18 revised DA issue