PTW

42-44 Dunmore Street
Wentworthville Town Centre
Architectural SEPP 65 Assessment Report

Prepared for
Austino Group

12 June 2015

PTW **Contents**

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Introduction

Accompanying this report is an Urban Design Strategy report by PTW Architects. This report is a high level assessment of the Planning Proposal scheme for the subject site, discussed with regard to the ten principles of SEPP65:

1. CONTEXT

SEPP 65 DESIGN QUALITY PRINCIPLES

"Good design responds and contributes to its context. Context can be defined as the key natural and built features of an area. Responding to context involves identifying the desirable elements of a location's current character or, in the case of precincts undergoing a transition, the desired future character as stated in planning and design policies. New buildings will thereby contribute to the quality and identity of the area."

Site location

The increased density of the Wentworthville town centre over time will continue to enhance activity levels and pedestrian movement across the site into the future. In the transition period it is particularly important for residents to have an open space which provides a safe and contained environment beyond their own apartments. The central open space will draw people from both Dunmore and Pritchard into the new town centre/civic hub, which will serve to focus activity for all Wentworthville residents. Historically a residential area, the site is already a focus of some retail activity in this precinct. The proximity of the railway station is paramount to the increase in the scale and intensity of this new commercial and civic place.

Refer to Appendix 9 – Perspective Views & Height Comparison Diagrams

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2. SCALE

SEPP 65 DESIGN QUALITY PRINCIPLES

"Good design provides an appropriate scale in terms of the bulk and height that suits the scale of the street and the surrounding buildings. Establishing an appropriate scale requires a considered response to the scale of existing development. In precincts undergoing a transition, proposed bulk and height needs to achieve the scale identified for the desired future character of the area."

Building Scale

As the site is located between a railway station and the residential suburb to the south which it serves, the new central open space and civic hub (as a series of three interlocking individual spaces each with its own character) is proposed to link the two. The open spaces provide civic, commercial and retail services along their edges. Open colonnades allow for low-scaled protective perimeters to both east and west edges, linking the key streets of the precinct.

While the northern towers are conceived as urban markers intended to be seen from afar, a transition in scale is anticipated through stepping down all sites on the remainder of the block. These in turn step down once again on the southern side of Pritchard St, towards the lower residential suburb.

Large vehicle access/egress to the site for retail, anchor supermarket and all garbage collection, is via a ramp with turntable, located on the western end of the Pritchard Street boundary. Resident and commercial car access/egress is via a ramp located on the eastern end of the Pritchard Street boundary.

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3. BUILT FORM

SEPP 65 DESIGN QUALITY PRINCIPLES

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

View from Dunmore street

The main public space at ground level is created by cutting a dramatic slice through the podium levels in order to link Dunmore and Pritchard Streets, to form a public and accessible town centre. The residential towers are located towards the four corners of the site, to avail their inhabitants of extensive views in all directions without looking directly at one another. The towers are inflected away from the central space to aim the internal views outwards. The urban marker pair are angled in particular to allow solar access to living rooms and balconies located on their east-facing facades. This is in order to push the solar access to 70% compliance.

The towers and podia are expected to be visually broken both vertically and horizontally into articulated elements, enhanced by slots and recessed floor plates respectively:

Base elements: Streetscape podium elements have zero setbacks and are generally three storeys in height. These have canopies over the street edge retail units which connect into the colonnades of the new public central space;

Intermediate elements: Transition elements are expressed to conform to established building separation distances, and are located between podium and tower forms; and

Upper tower elements: The towers are slimline on their street frontages and are articulated through the use of slots along their flanks.

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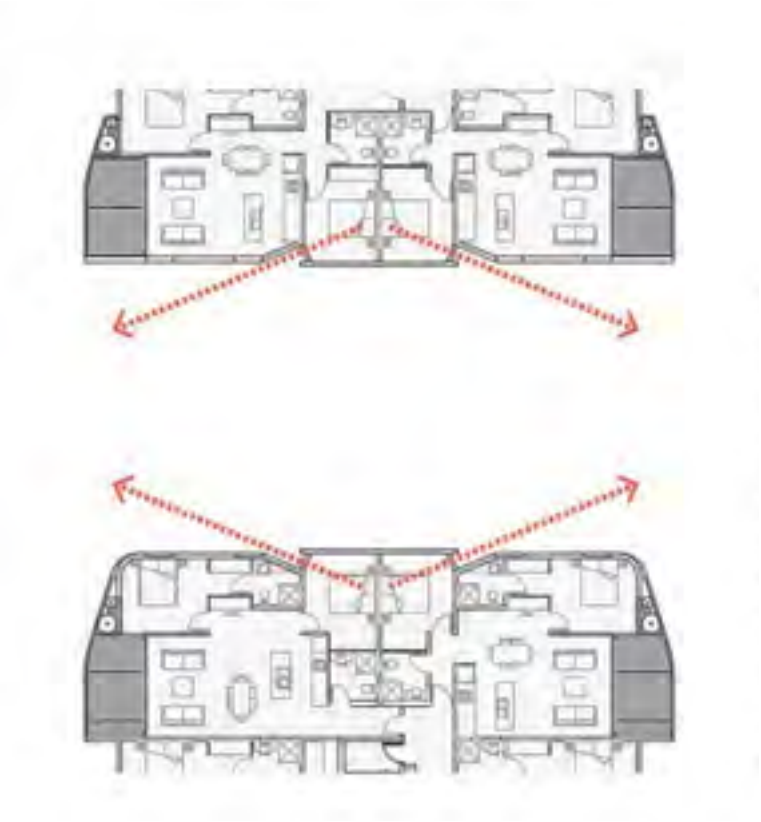
Building Separation: The space between north and south towers have been made to comply with building separation rules, through manipulation of their internal planning. This prevents overlooking of habitable rooms (bedrooms in this case) by indenting the walls each side and directing these rooms towards outward views, refer to diagram below:



Buiding seperation and design approach

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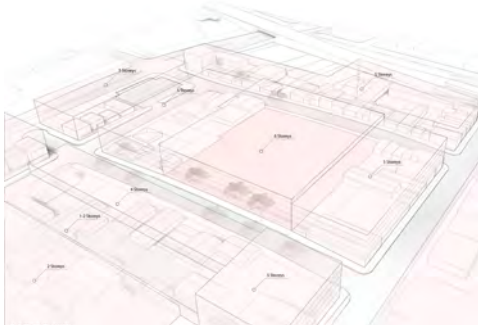
4. DENSITY

SEPP 65 DESIGN QUALITY PRINCIPLES

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

The increased future density of the Wentworthville town centre over time is discussed above. The current LEP height limits are not yet in sync with the general Sydney-wide tendency to elevate height limits for active town centres, as is discussed in the accompanying urban design report. The draft LEP has begun to increase heights and in the future it is anticipated that building heights will further increase, providing mixed-use town centres, having access to public transportation, and with full activation of public places. Critical mass is required to generate civic facilities. Critical mass is also required to enliven these locations, by attracting outdoor dining, people-watching and generally community-focused functions. Public open space needs to be created for this increased density, which is precisely what this scheme aims to achieve. The Wentworthville area will no doubt continue to upgrade existing and incorporate abundant new infrastructure into the future. The area already has excellent access to public transport and parks. Thus the proposed new central open space and civic hub is the focus of this proposal.



Current LEP heights

Draft LEP heights with proposal

Future LEP heights with proposal

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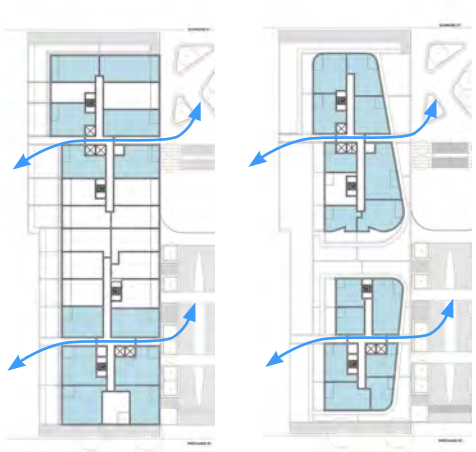
5. RESOURCE, ENERGY AND WATER EFFICIENCY

SEPP 65 DESIGN QUALITY PRINCIPLES

"Good design makes efficient use of natural resources, energy and water throughout its full life cycle, including construction. Sustainability is
integral to the design process. Aspects include demolition of existing structures, recycling of materials, selection of appropriate and sustainable materials, adaptability and reuse of buildings, layouts and built form, passive solar design principles, efficient appliances and mechanical services, soil zones for vegetation and reuse of water."



Natural ventilation through slot

Noting that multi residential apartments are in themselves by very definition efficient in the use of natural resources, in particular energy. Within the development, rain water retention systems will be integrated. In regards to landscaping, native drought tolerant planting will be used and this needs to be a key landscape design driver. Buildings are to have a dual water system that recycles grey water for toilet flushing, irrigation, and car washing. Through strategic planning, natural ventilation and passive solar design has been incorporated. Furthermore, external screening and shading devices will need to be integrated in order to maximize the comfort of those in northern and western facing apartments. An articulation zone of 450mm has been added to facades to allow for these devices. Naturally day-lit and naturally ventilated lift lobbies are located throughout the complex. A community car share scheme is to be incorporated and bicycle use is enabled with bicycle numbers as per council guidelines.

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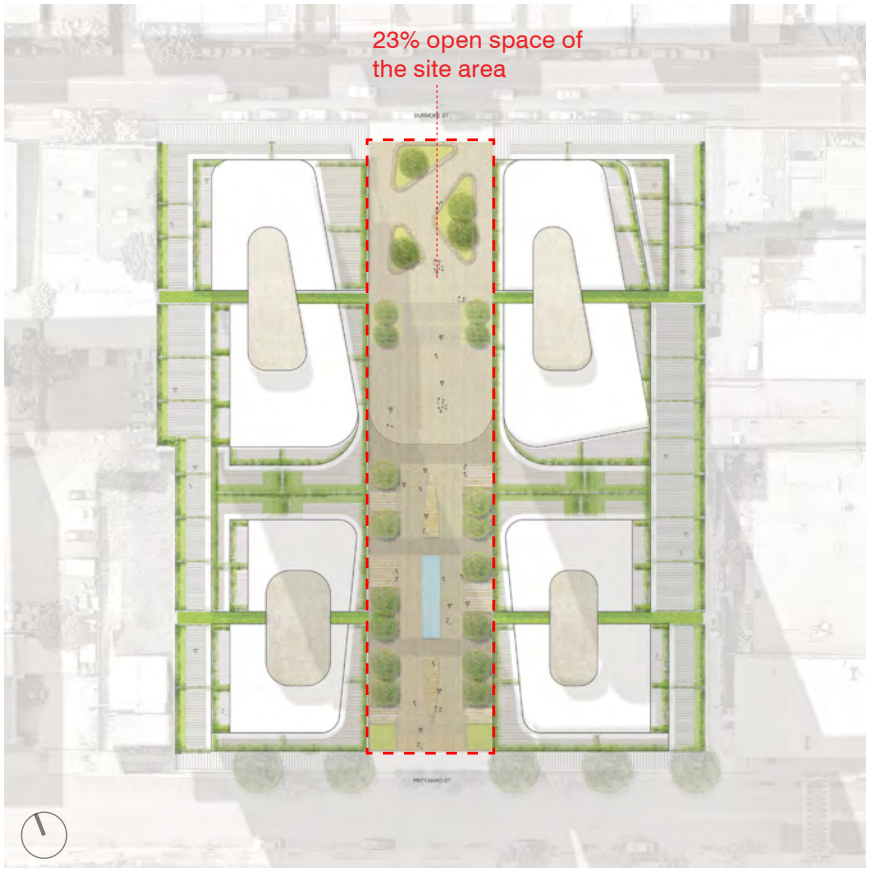
6. LANDSCAPE

SEPP 65 DESIGN QUALITY PRINCIPLES

"Good design recognises that together landscape and buildings operate as an integrated and sustainable system, resulting in greater aesthetic quality and amenity for both occupants and the adjoining public domain. Landscape design builds on the existing site's natural and cultural features in responsible and creative ways. It enhances the development's natural environmental performance by coordinating water and soil management, solar access, micro-climate, tree canopy and habitat values. It contributes to the positive image and contextual fit of development through respect for streetscape and neighbourhood character, or desired future character. Landscape design should optimise useability, privacy and social opportunity, equitable access and respect for neighbours' amenity, and provide for practical establishment and long term management."

Lower ground forecourt - from Dunmore street

Upper ground forecourt - from Prichard street



Master plan with landscape

This urban scheme aims to enhance the existing street tree plantings, which are certainly in need of reinforcement. The active lower ground level public space off Dunmore Street will incorporate wide and mounded planters with seating to the edges. The upper ground level public space off Pritchard Street will provide more formal rows of small trees with wide canopies, to create a space where people can sit and converse without being overlooked by the buildings above. All of these spaces are themselves level with accessible ramp or lifting options to enable cross-street connection. Vibrant landscaping and sufficient canopies and colonnades will allow protection from inclement weather. Water collection and reuse will supplement town water. Private terraces will allow for personalised landscaping solutions, but given the nature of this urban town centre and the extent of car parking, there can be no true deep soil allowance beyond planters.

Refer to Appendix 1 - Architectural Drawings with Landscape

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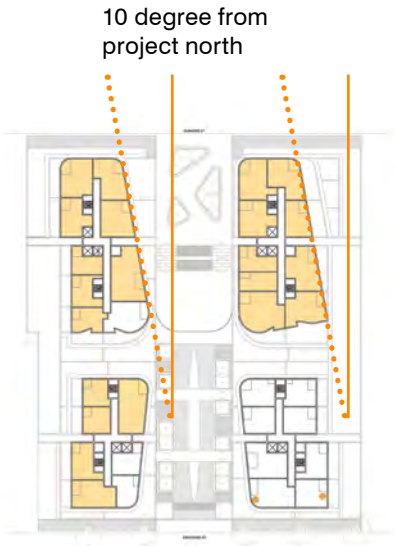
7. AMENITY

SEPP 65 DESIGN QUALITY PRINCIPLES

"Good design provides amenity through the physical, spatial and environmental quality of a development. Optimising amenity requires appropriate room dimensions and shapes, access to sunlight, natural ventilation, visual and acoustic privacy, storage, indoor and outdoor space, efficient layouts and service areas, outlook and ease of access for all age groups and degrees of mobility."



Two twisting towers to achieve solar access

This site has a natural tendency to work in parallel to the street geometry, and which it is designed to do for the most part. True North is at an angle quite different to project north in this case. This then requires the urban marker towers in particular to be slightly angled, to allow solar access to living rooms and to balconies located on their east-facing facades. This twisting approach has been utilised in order to achieve 70% solar access compliance.

Refer to Appendix 6 – Solar Compliance Diagrams: Suns Eye Views

The cross ventilation amenity of apartments is very good due to the high incidence of slot and corner apartments, so compliance is consequently over 80%.

Refer to Appendix 7 – Cross Ventilation Diagrams

Acoustic and visual privacy are also considered. The privacy of podium level apartments is incorporated through horizontal privacy screens located approx. at ceiling level, preventing apartments above from seeing all of the private open terraces below. Living and bedroom heights are to achieve the 2.7m required. Storage facilities can be provided to requirements. Adaptable apartments will need to be distributed amongst the buildings in a variety of unit sizes.

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8. SAFETY AND SECURITY

SEPP 65 DESIGN QUALITY PRINCIPLES

"Good design optimises safety and security, both internal to the development and for the public domain. This is achieved by maximising overlooking of public and communal spaces while maintaining internal privacy, avoiding dark and non-visible areas, maximising activity on streets, providing clear, safe access points, providing quality public spaces that cater for desired recreational uses, providing lighting appropriate to the location and desired activities, and clear definition between public and private spaces."

Safe access point and communal spaces

The public pedestrian through-site-link spaces between the east and west buildings will be afforded excellent passive visual surveillance, from the two storey podium apartments immediately above the colonnade and to a lesser extent from the towers above. These open spaces will not have locked gates or be closed off to the public, and instead will be lit as any pedestrian street in a town centre, albeit one with a residential emphasis. This means that in the evenings and at weekends surveillance will be ensured. The surrounding streets will also benefit from a residential concentration around the retail hub as commuters will no longer have to pass through inactive commercial-only streetscapes out of business hours, as they now must.

Generally private terraces are secured by solid and/or frosted glass screens. The residential and commercial/civc entrance lobbies all address the new public link spaces, and these will all be appropriately lit, with appropriate access for persons with disabilities.

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9. SOCIAL DIMENSIONS

SEPP 65 DESIGN QUALITY PRINCIPLES

“Good design responds to the social context and needs of the local community in terms of lifestyles, affordability, and access to social facilities. New developments should optimise the provision of housing to suit the social mix and needs in the neighbourhood or, in the case of precincts undergoing transition, provide for the desired future community. New developments should address housing affordability by optimising the provision of economic housing choices and providing a mix of housing types to cater for different budgets and housing needs.”

Courtyards with seatings and public services

The key social aspect of this scheme is the dedication of almost one third of the site to a public pedestrian open space which can be used by the residents of the development itself, as well as by the people of Wentworthville. Seating has been placed at both upper and lower ground level courtyards, to allow social interaction between residents in this generous community resource space. The space could incorporate a small play area for children. All communal areas are to be accessible. The sunken Anchor store has escalators linking to the carpark below, and lifts to connect the streets above. A public library and an office hub for small business are included in the proposal.

The apartment mix is varied, ensuring that the apartments are suitable for a range of household types. Adaptable apartments are provided to 15% of the total. The site is pedestrian friendly and all public

and shared areas are accessible to those with disabilities.

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10. AESTHETICS

SEPP 65 DESIGN QUALITY PRINCIPLES

"Quality aesthetics require the appropriate composition of building elements, textures, materials and colours and reflect the use, internal design and structure of the development. Aesthetics should respond to the environment and context, particularly to desirable elements of the existing streetscape or, in precincts undergoing transition, contribute to the desired future character of the area.

As a planning proposal is by definition not a detailed design, there are limits to any comprehensive discussion on aesthetics. However good proportions and an appropriate composition of the building elements is important, and we believe this has been achieved in principle.

The architectural design intent is to create a warm and welcoming public space at the heart of Wentworthville. There will need to be a strict signage policy to keep the retail offering in particular of sufficient calibre to warrant the developments town centre ambitions. The podium levels adjacent the main spaces and street frontages will be most successful if they are activated with solid three dimensional privacy/screening devices, and through the use of natural materials and warm colours.

The towers above by contrast can be more streamlined in material use and more neutral in colour palette. These are anticipated to be largely glazed. The balconies are therefore assumed to be inboard rather than external clip-ons.

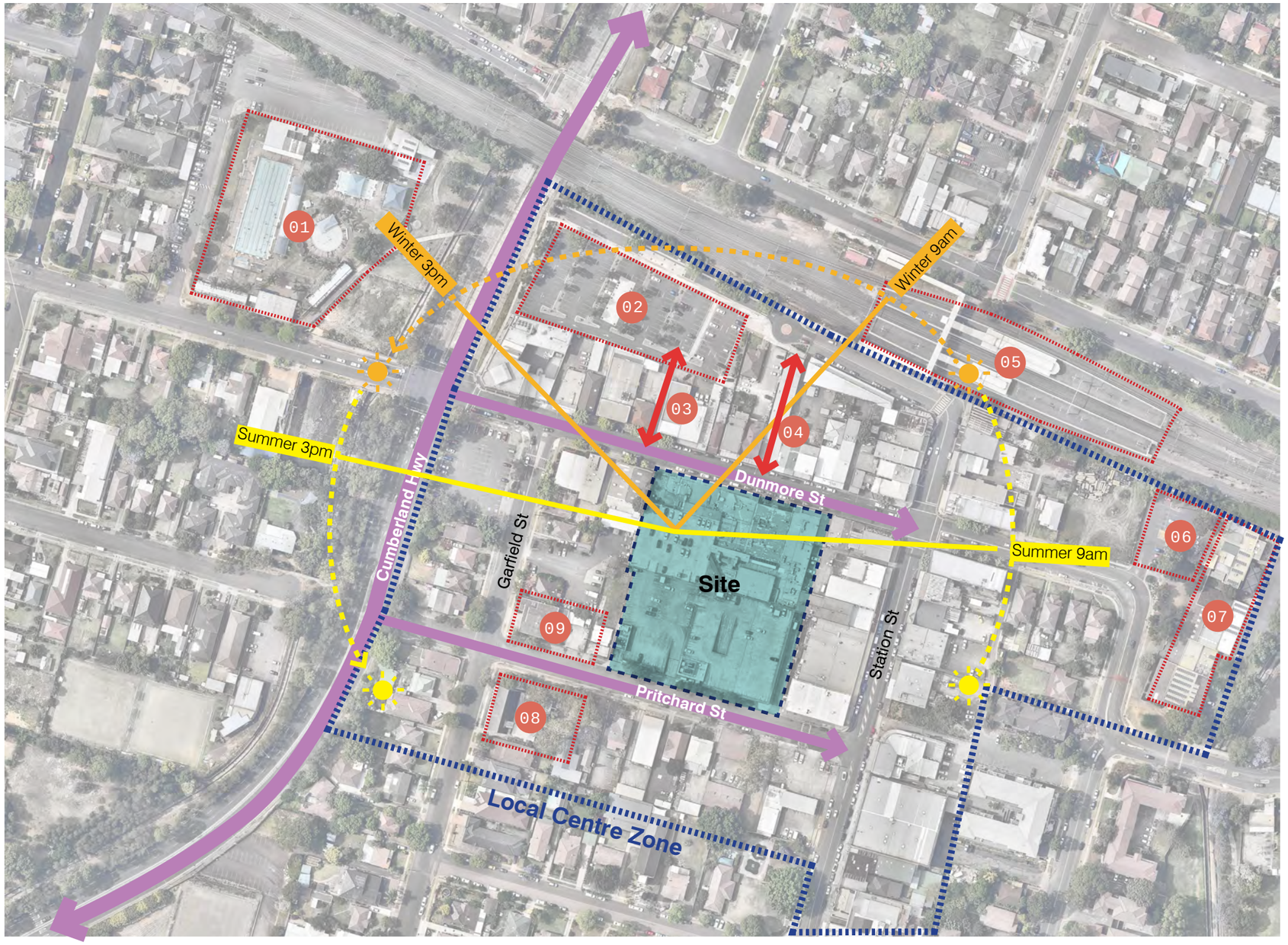
The primary Dunmore Street facades should be elevated in scale (compared to the current very suburban retail expression), and aiming at a more urbane feel to the streetscape. The nature of a revitalised Wentworthville town centre should allow for strong civic architectural statement.

This development functions both as urban marker and gateway to Wentworthville, and can set up a visual language for the buildings in the immediate precinct.

Dunmore street facades

Appendix 1 - Planning Principle Diagrams

SURROUNDING CONTEXT



01 WENTWORTHVILLE SWIM CENTRE

02 PUBLIC CARPARK

03 NARROW PEDESTRAIN ROUTE TO CARPARK

04 PEDESTRIAN ARCADE CONNECTION

05 WENTWORTHVILLE TRAIN STATION

06 SURFACE CARPARK

07 LIBRARY & COMMUNITY CENTRE

08 WENTWORTHVILLE ANGLICAN CHURCH

09 FIRE STATION

PLANNING PRINCIPLE DIAGRAMS

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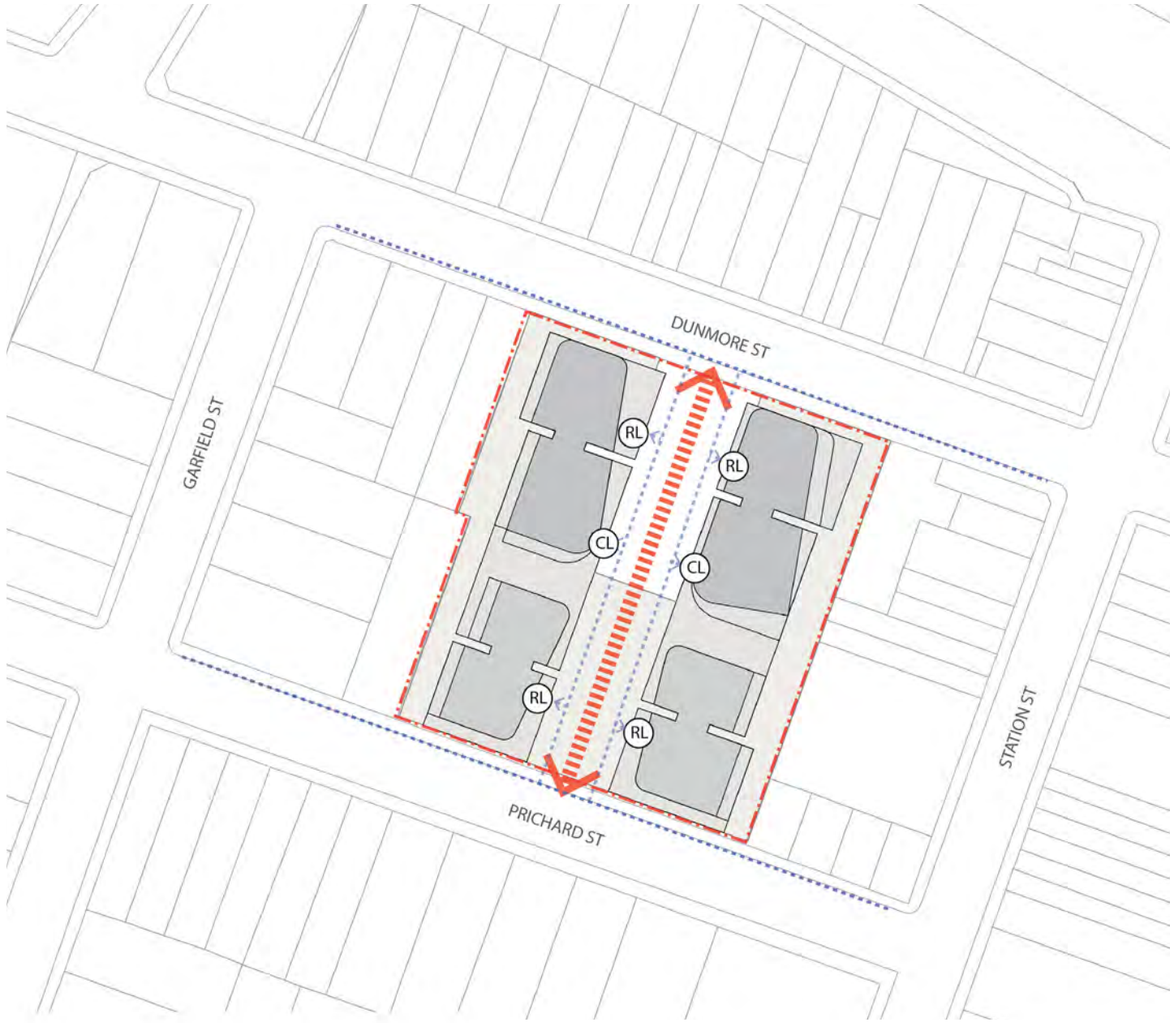

N Number of Storey

Subject Site

BUILDING HEIGHT

Subject Site

Main Pedestrain Acce

Building Block

RL Residential Lobby

Pedestrain Access

CL Residential Lobby

PEDESTRAIN ACCESS

PLANNING PRINCIPLE DIAGRAMS

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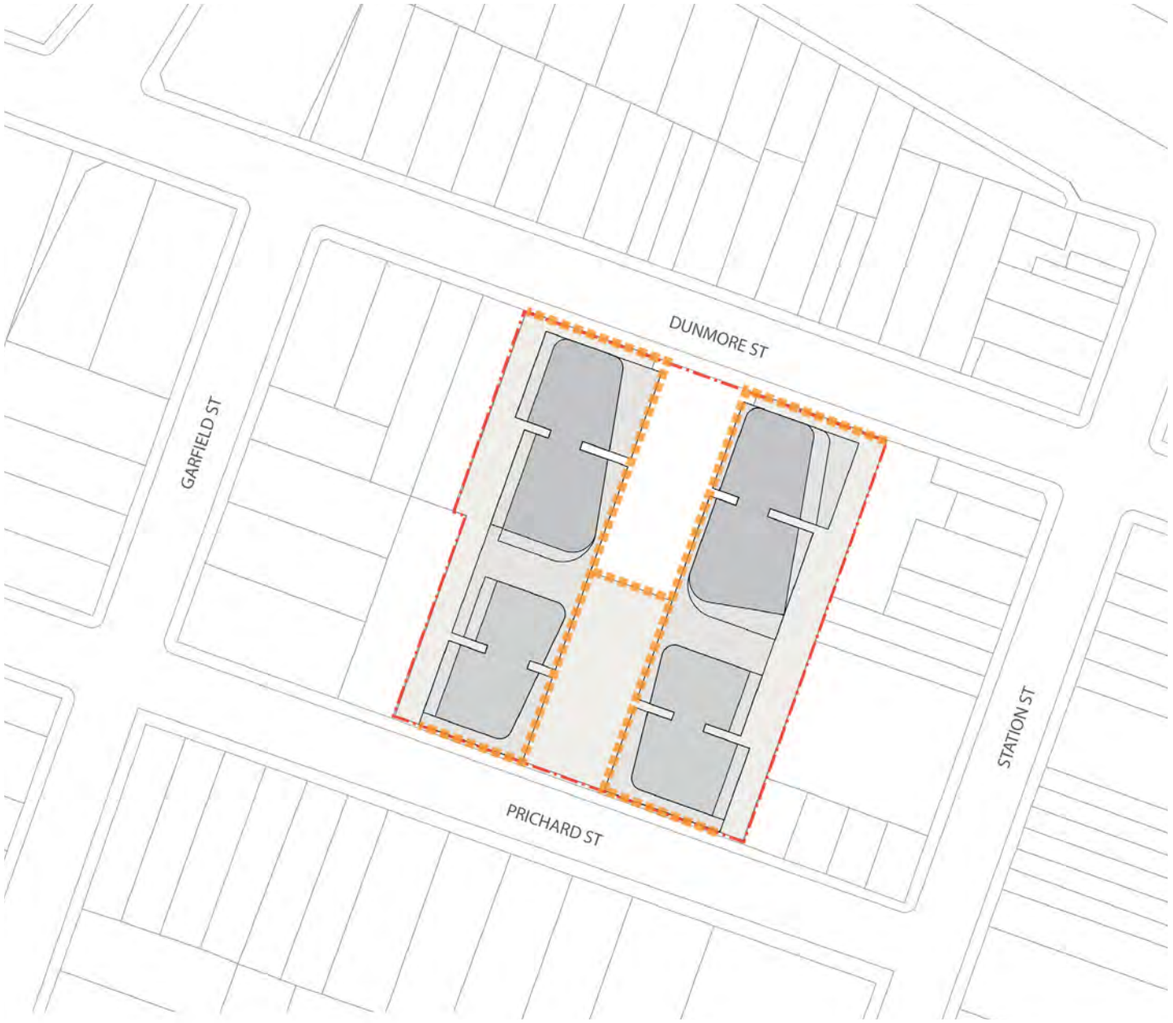

ACTIVE FRONTAGE

VEHICLE CIRCULATION

PLANNING PRINCIPLE DIAGRAMS

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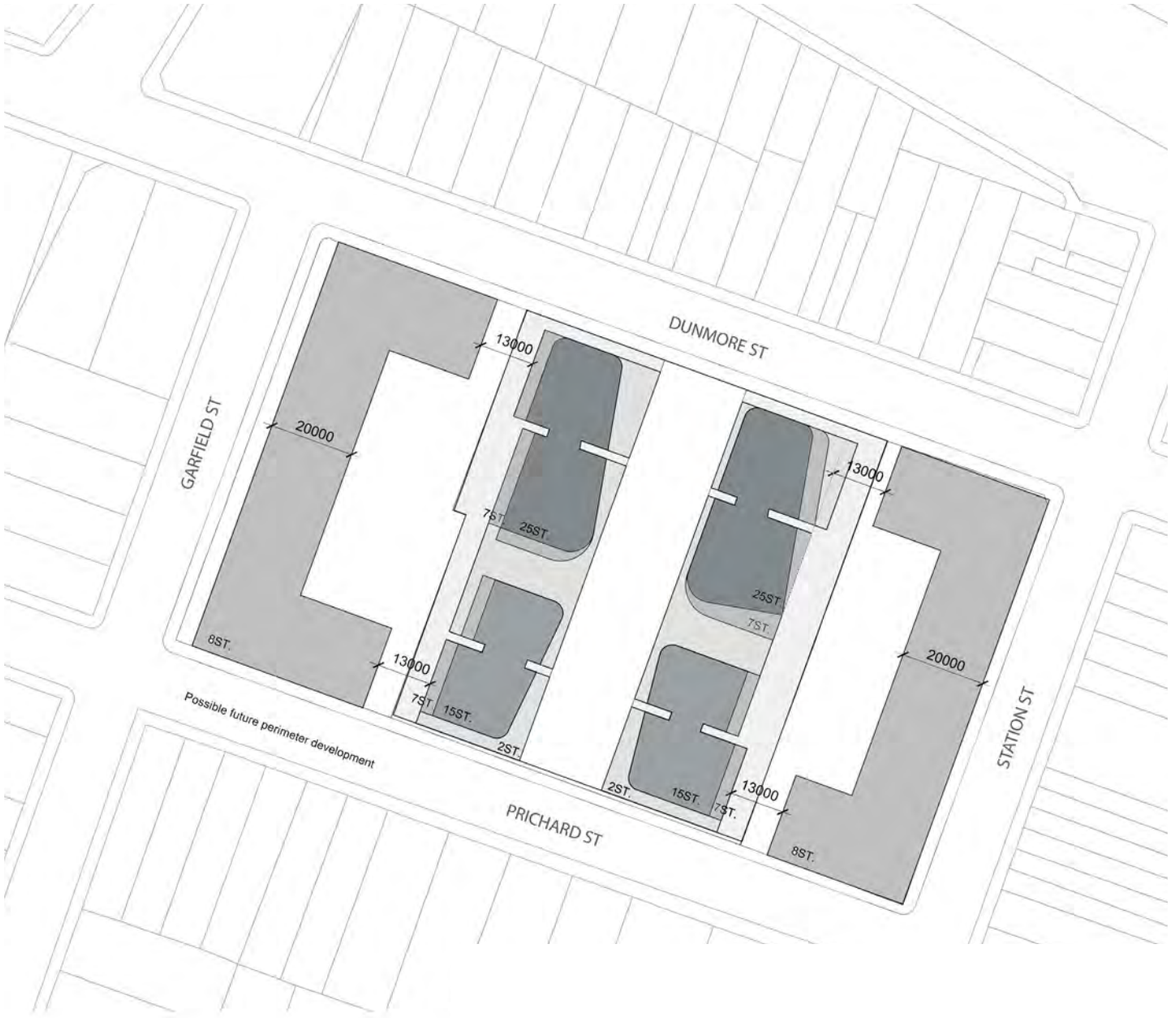

Building block

SIDE SETBACKS WITH ADJACENT PERIMETER DEVELOPMENT

Building block

SIDE SETBACKS WITH ADJACENT AMALGAMATED BLOCKS (AND CURRENT DA UNDER CONSTRUCTION)

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Appendix 2 - Architectural Drawings with Landscape

LOWER GROUND PLAN
(DUNMORE ST LEVEL)

1:500 @ A3

0m 5m 10m 15m 20m

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UPPER GROUND PLAN
(PRICHARD ST LEVEL)

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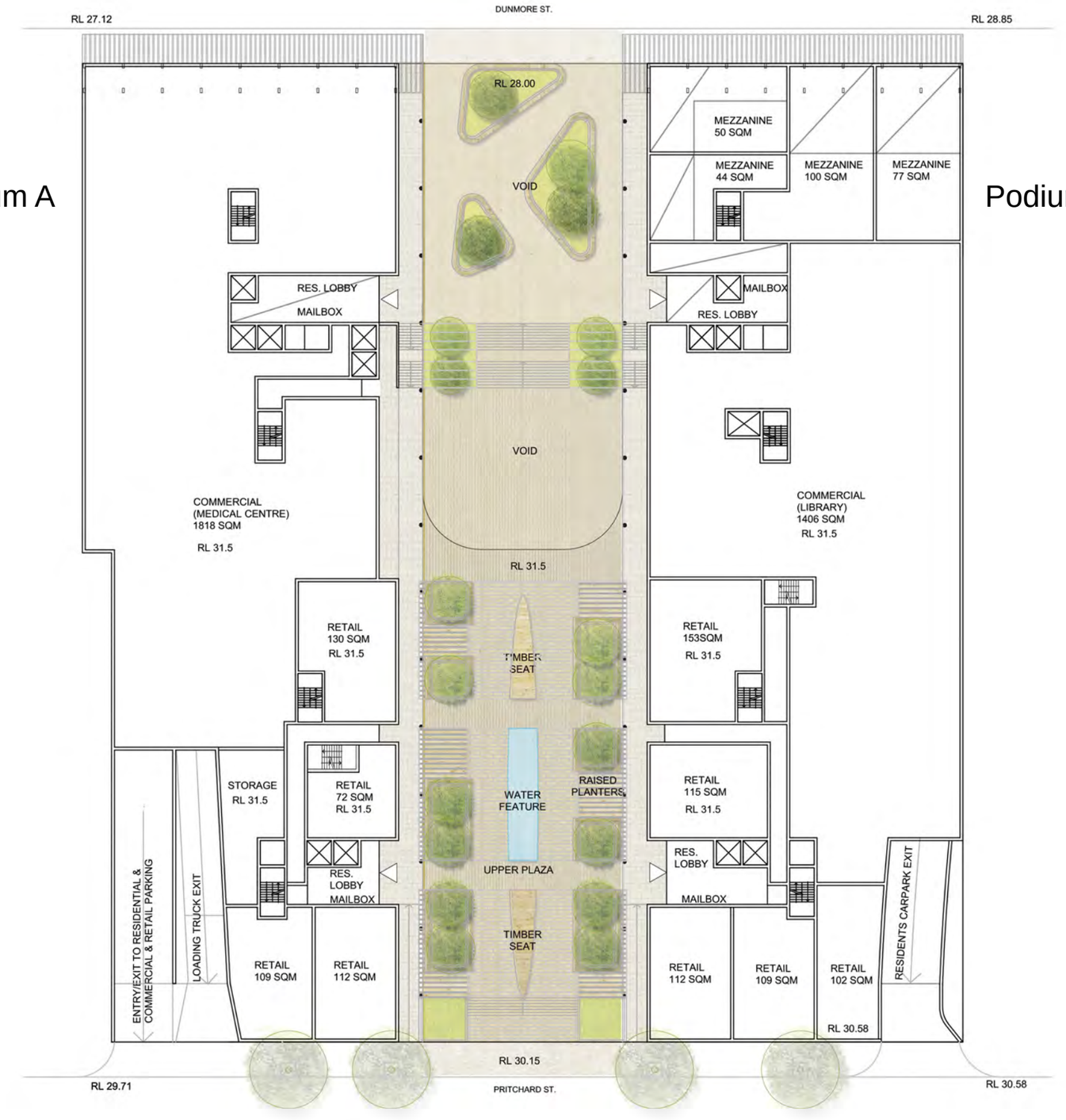
Podium A



Podium B

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0m 5m 10m 15m 20m

LEVEL 01-02 PLAN
(LEVEL 02 DRAWN)

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Podium A

Podium B

1:500 @ A3

0m 5m 10m 15m 20m

LEVEL 03-06 PLAN
(LEVEL 04 DRAWN)

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1:500 @ A3

0m 5m 10m 15m 20m

LEVEL TYPICAL PLAN
(LEVEL 08 DRAWN)

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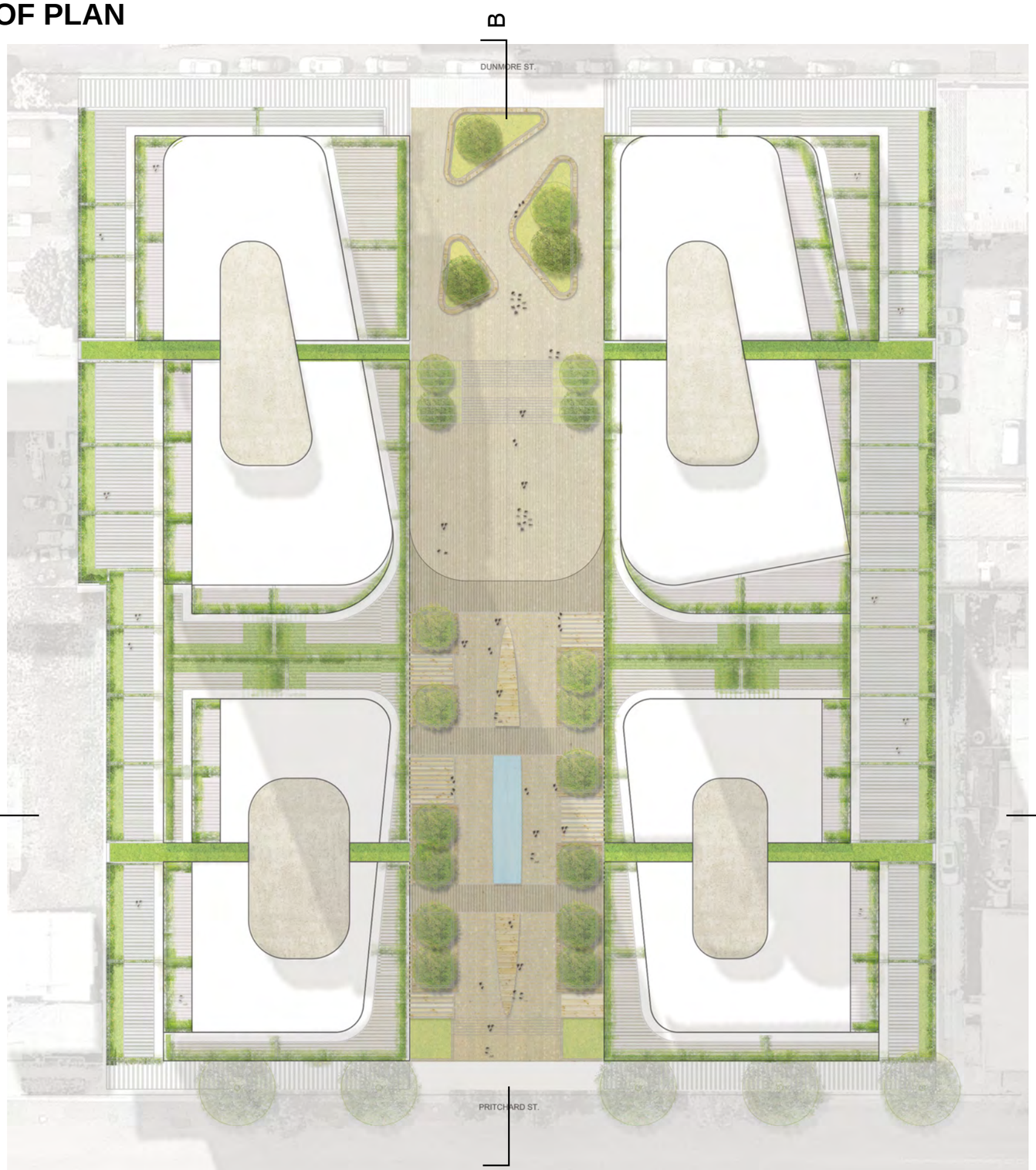
ROOF PLAN



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SECTION A - A

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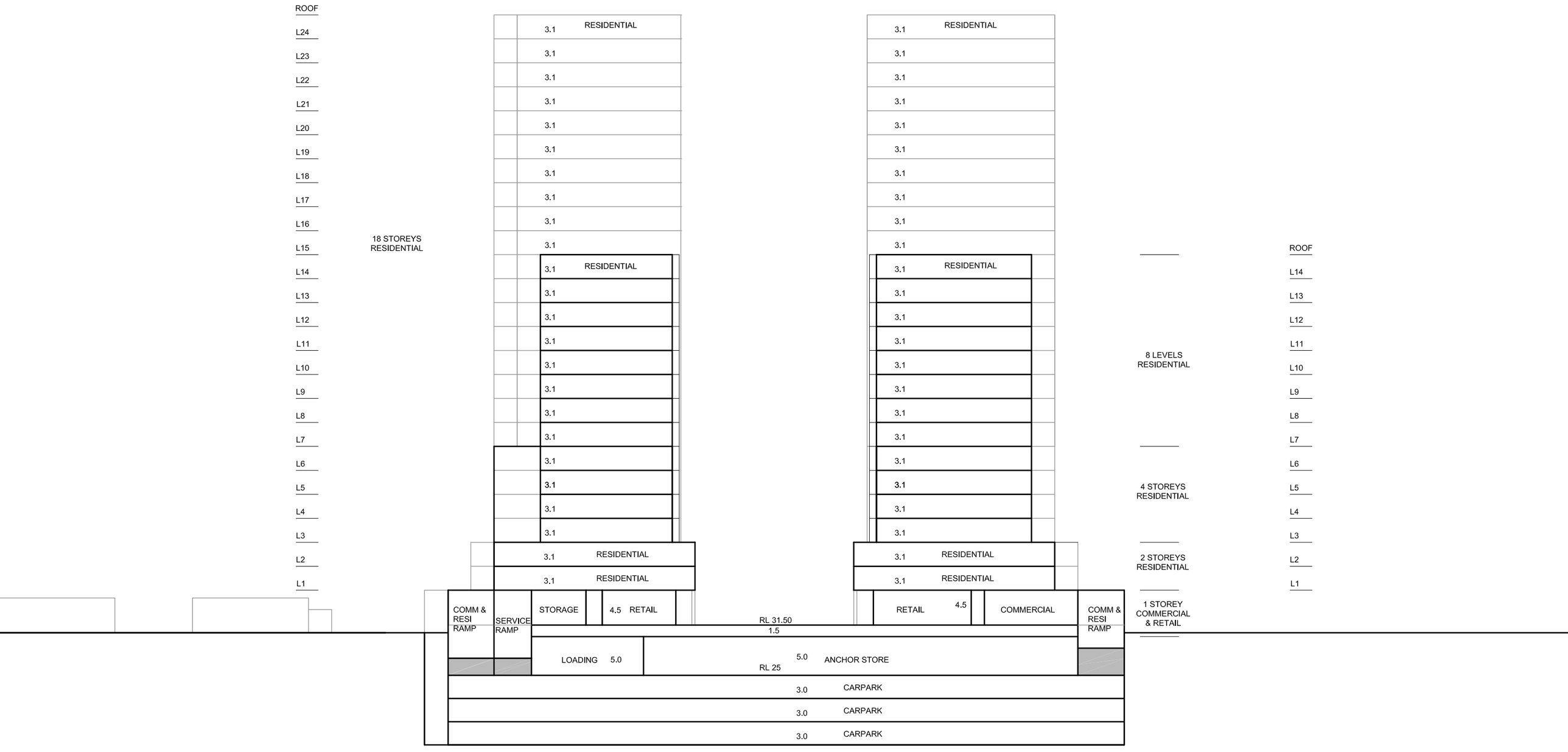

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SECTION B - B

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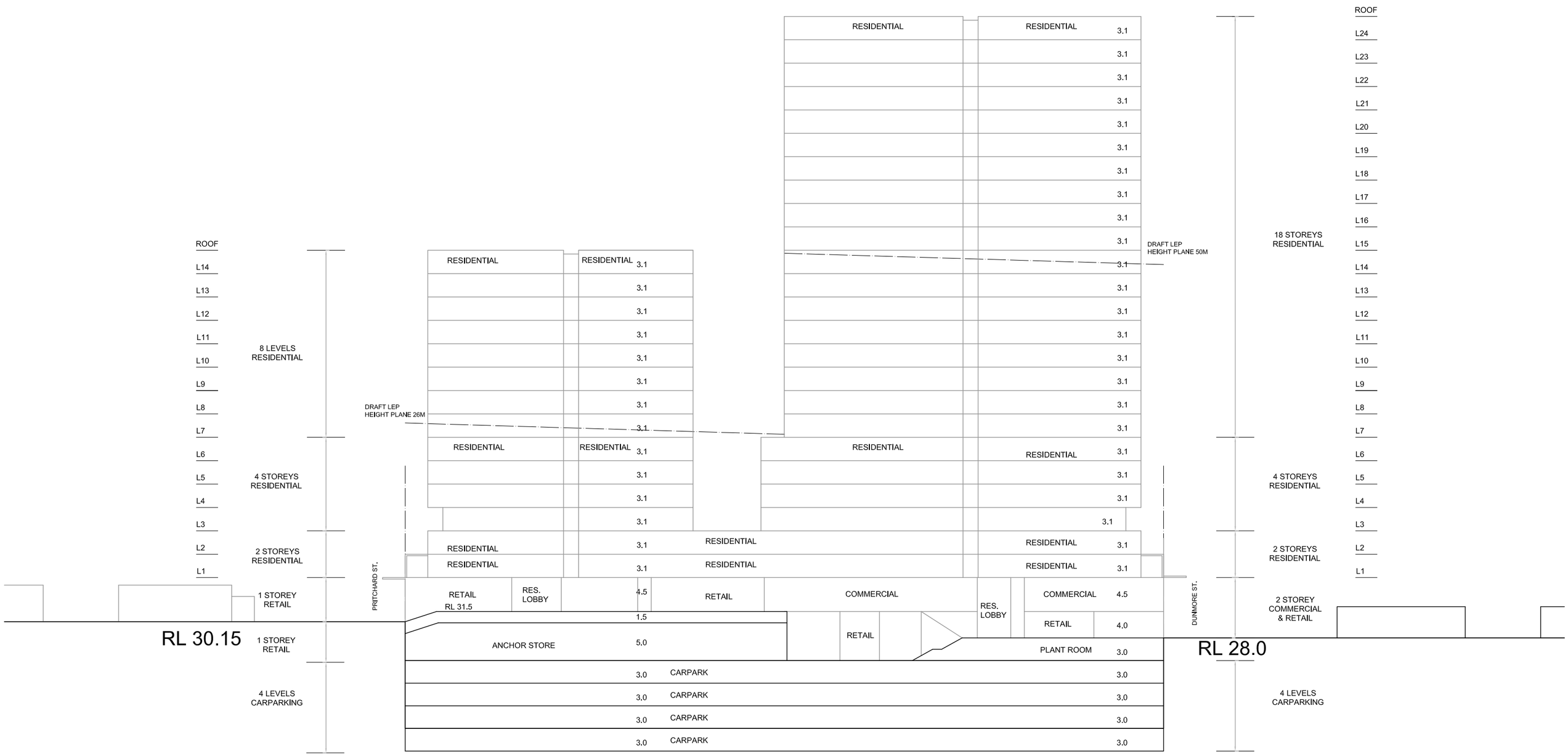

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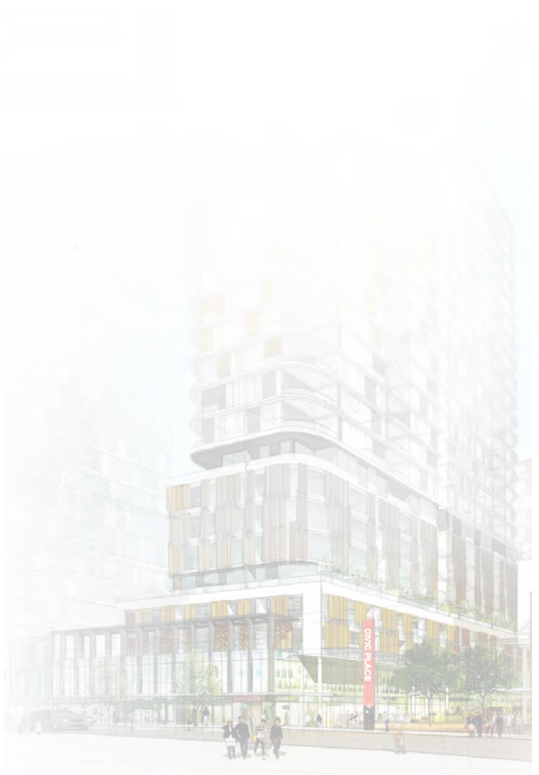

Appendix 3 - Building Envelope Diagrams

BUILDING ENVELOPE DIAGRAM

LOWER GROUND PLAN (DUNMORE ST LEVEL)

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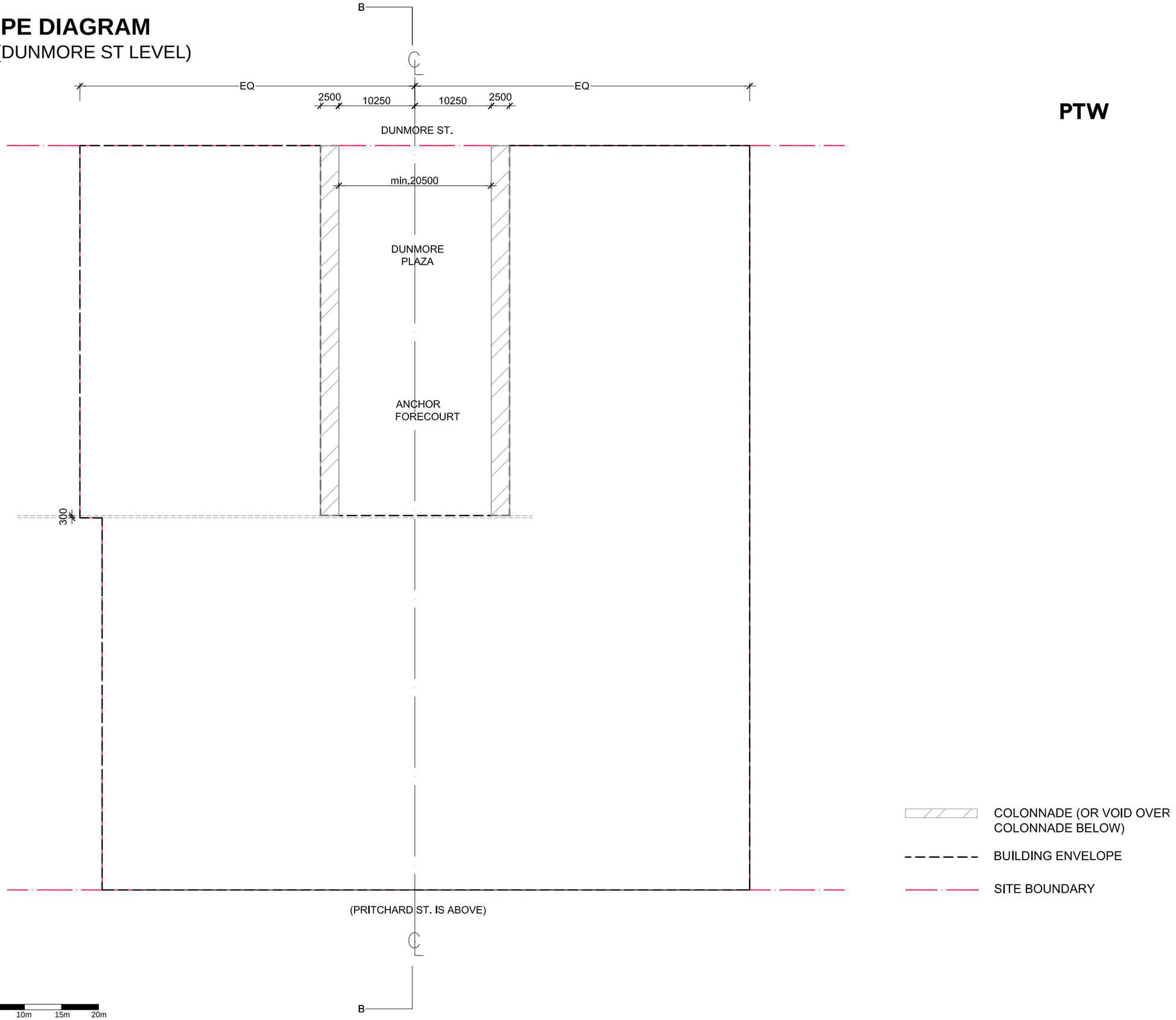

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BUILDING ENVELOPE DIAGRAM

UPPER GROUND PLAN (PRICHARD ST LEVEL)

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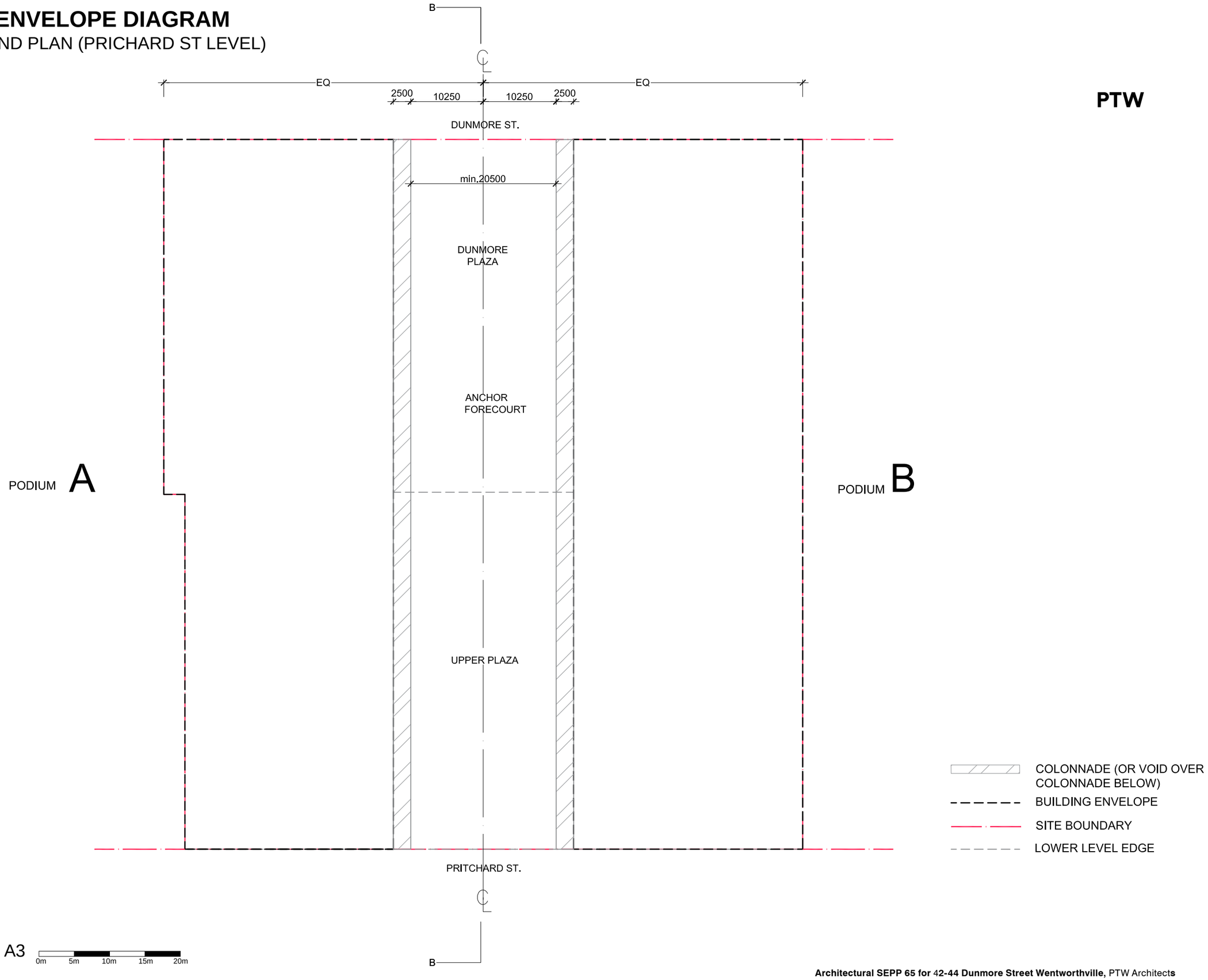

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BUILDING ENVELOPE DIAGRAM

LEVEL 01-02 PLAN

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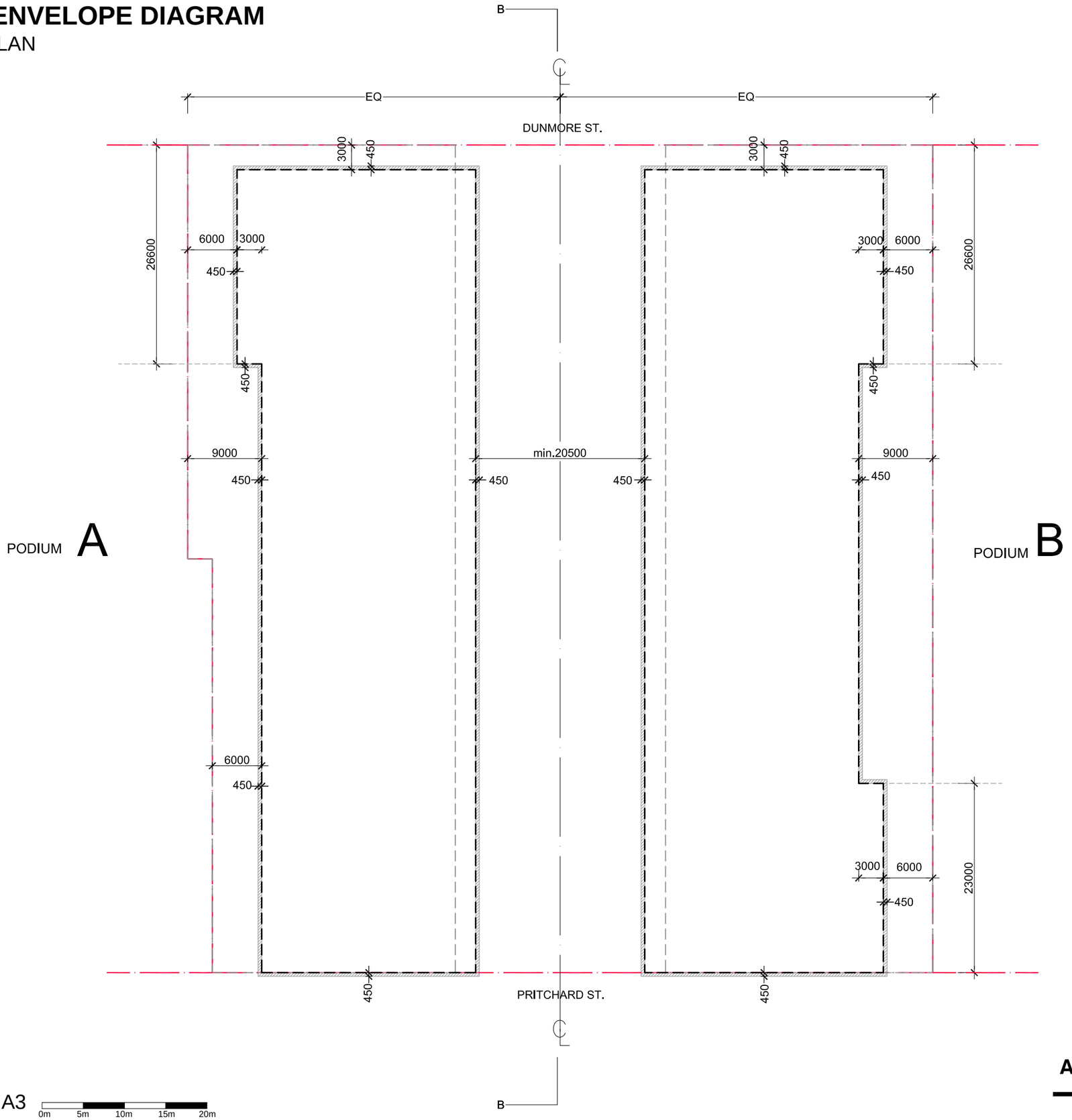

COLONNADE (OR VOID OVER COLONNADE BELOW)

BUILDING ENVELOPE

SITE BOUNDARY

LOWER LEVEL EDGE

1:500 @ A3

0m 5m 10m 15m 20m

Appendix 2- Building Envelope Diagram

BUILDING ENVELOPE DIAGRAM

LEVEL 03-06 PLAN

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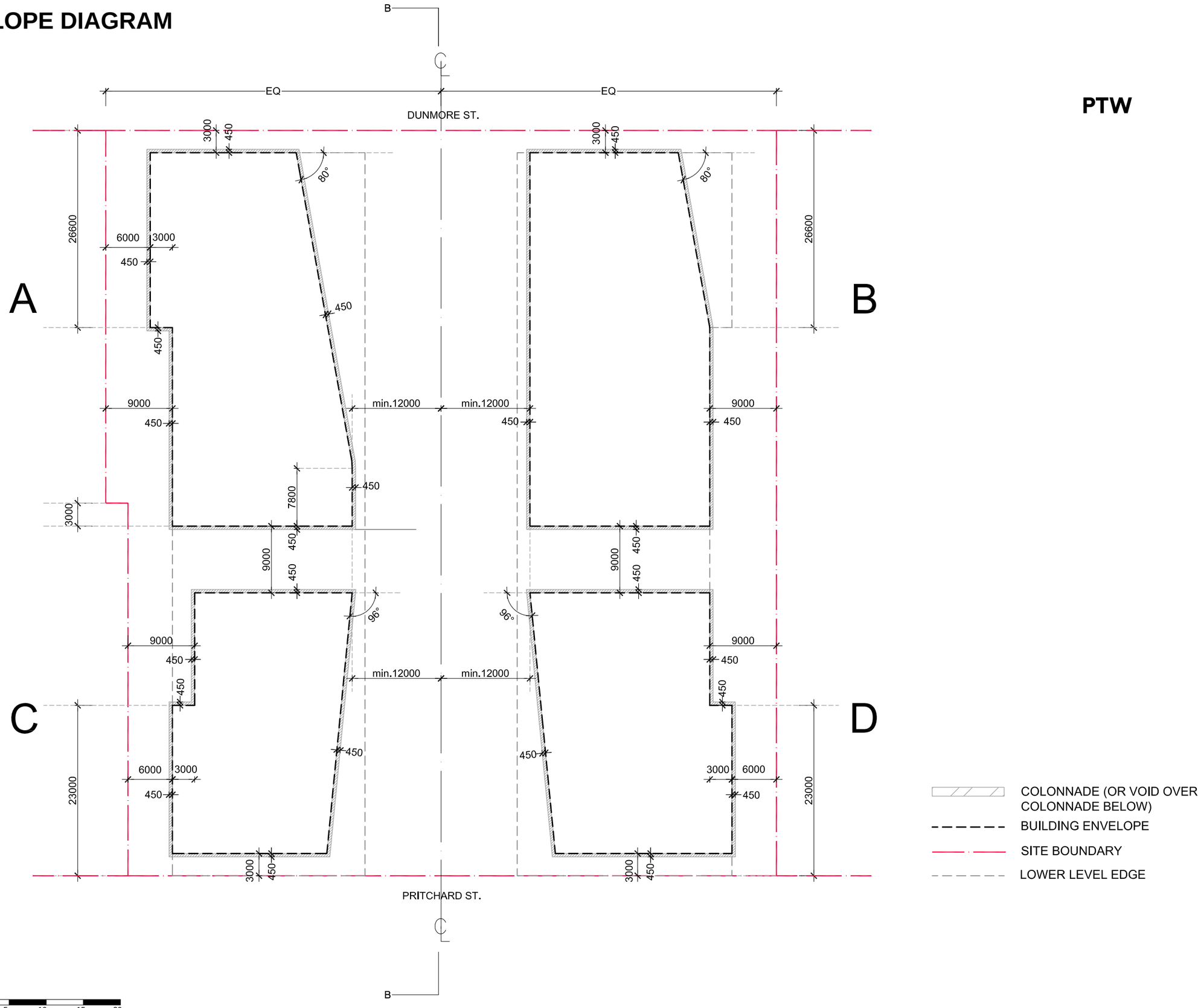

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COLONNADE (OR VOID OVER COLONNADE BELOW)

BUILDING ENVELOPE

SITE BOUNDARY

LOWER LEVEL EDGE

BUILDING ENVELOPE DIAGRAM

LEVEL TYPICAL PLAN

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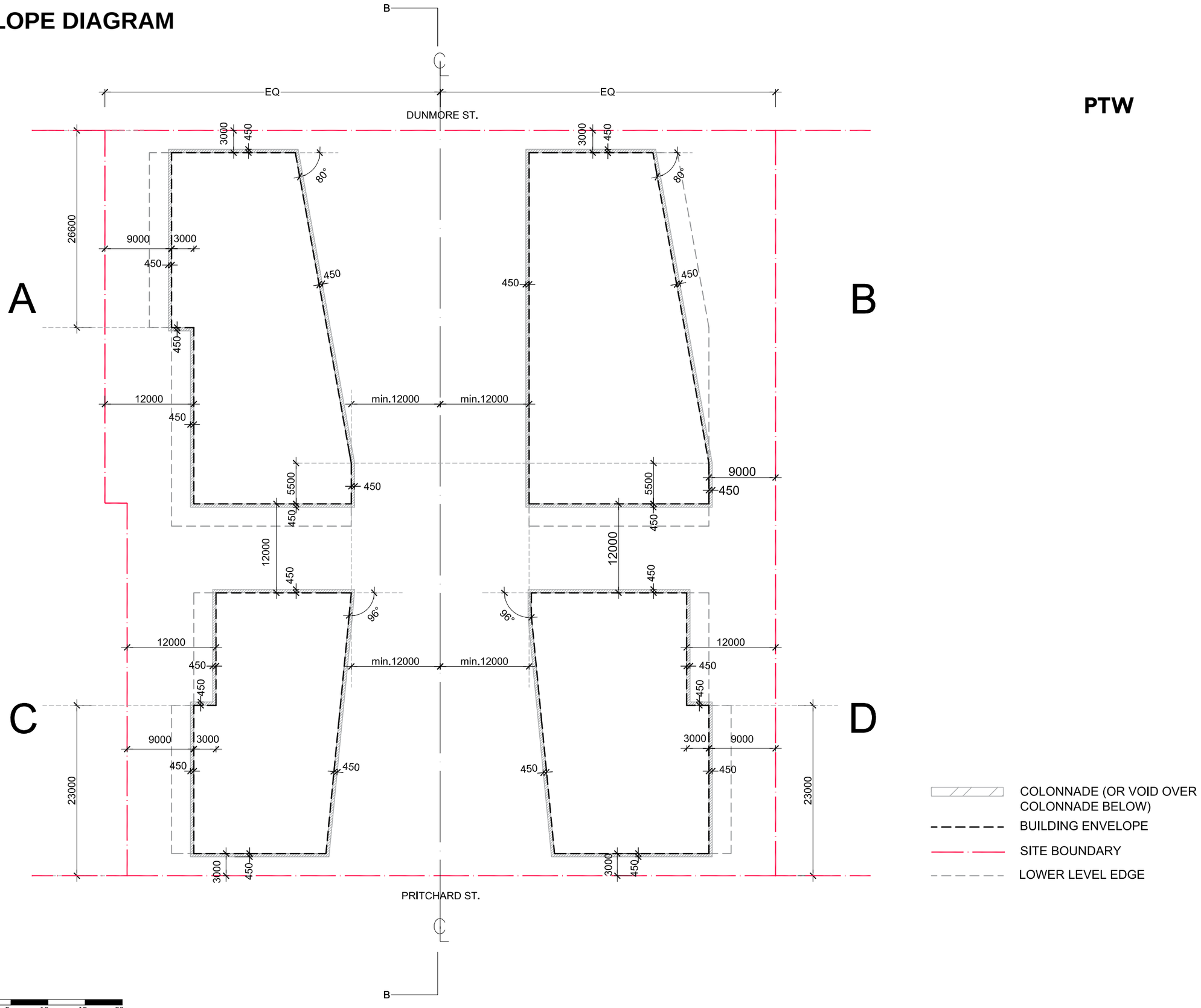

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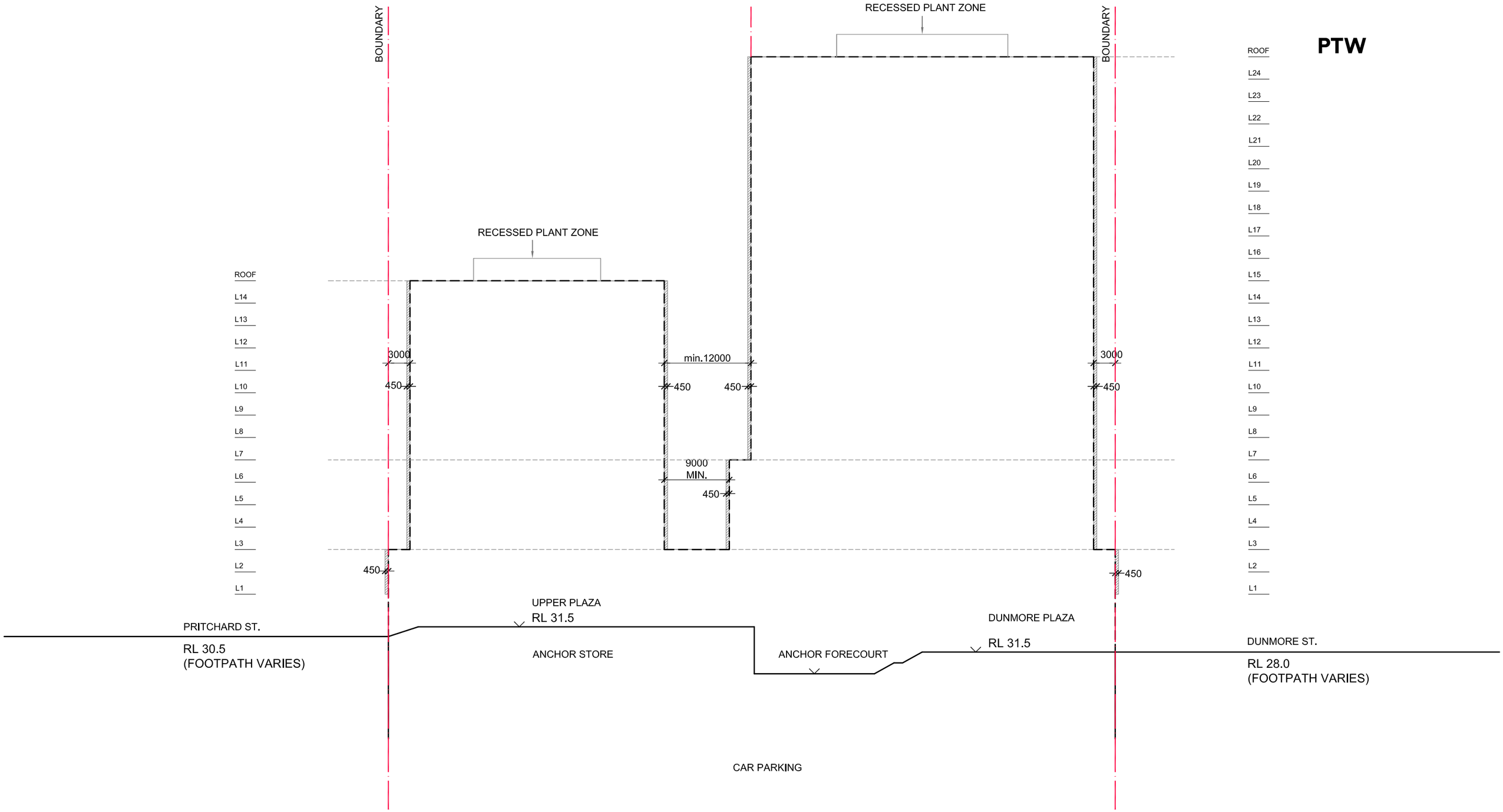
BUILDING ENVELOPE DIAGRAM

SECTION B-B



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ARTICULATION ZONE ABOVE GROUND LEVEL

BUILDING ENVELOPE

SITE BOUNDARY

BUILDING ENVELOPE DIAGRAM

ELEVATION 1 (FROM PRICHARD ST)

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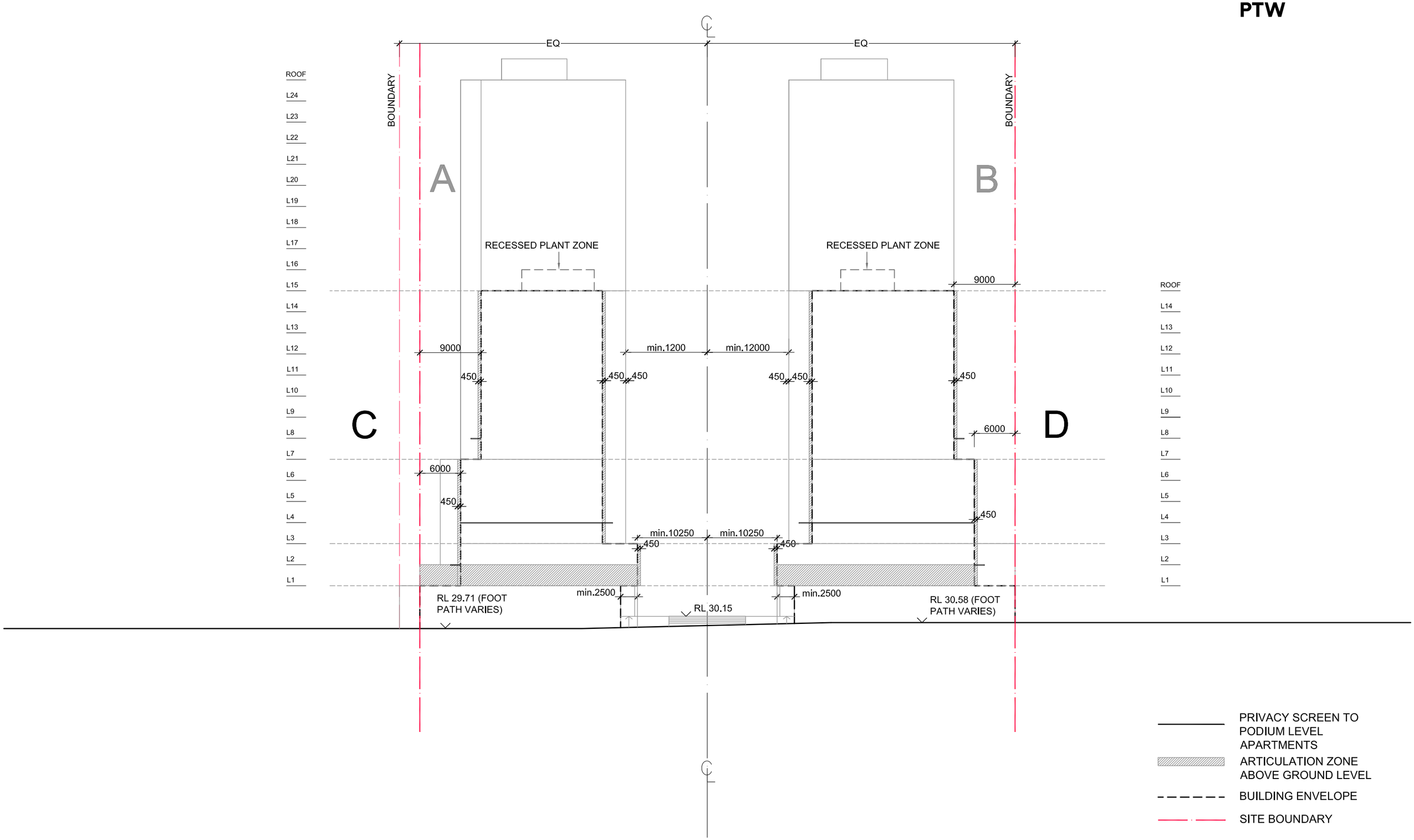

BUILDING ENVELOPE DIAGRAM

ELEVATION 2 (FROM DUNMORE ST)

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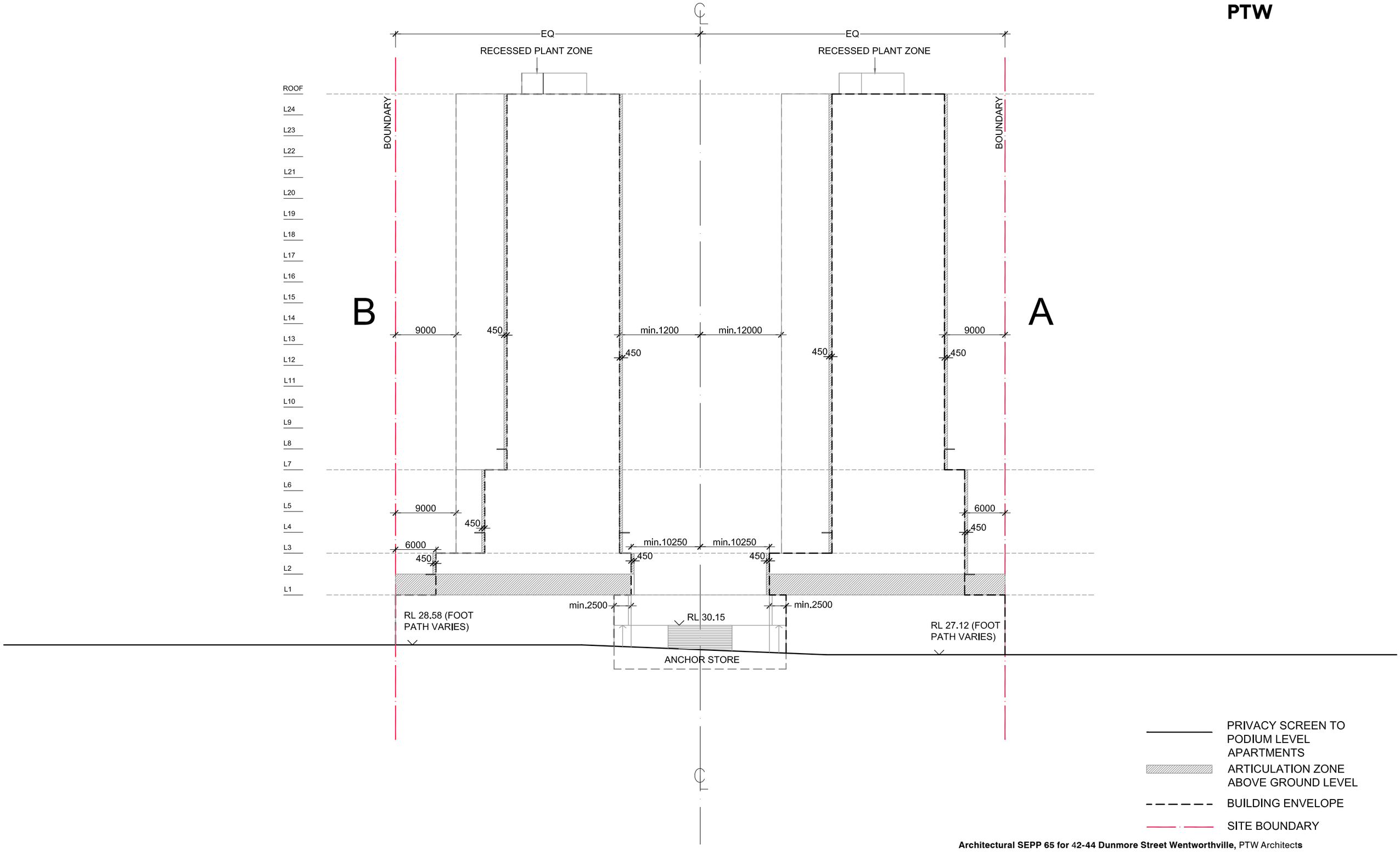

PRIVACY SCREEN TO PODIUM LEVEL APARTMENTS

ARTICULATION ZONE ABOVE GROUND LEVEL

BUILDING ENVELOPE

SITE BOUNDARY

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Appendix 4 - Shadow Diagram

SHADOW DIAGRAMS

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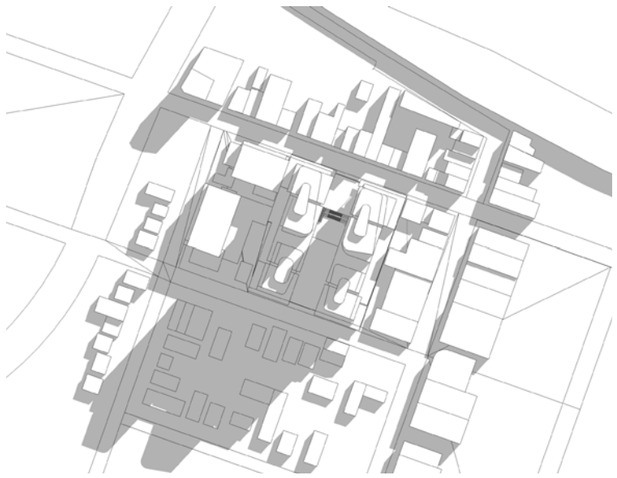
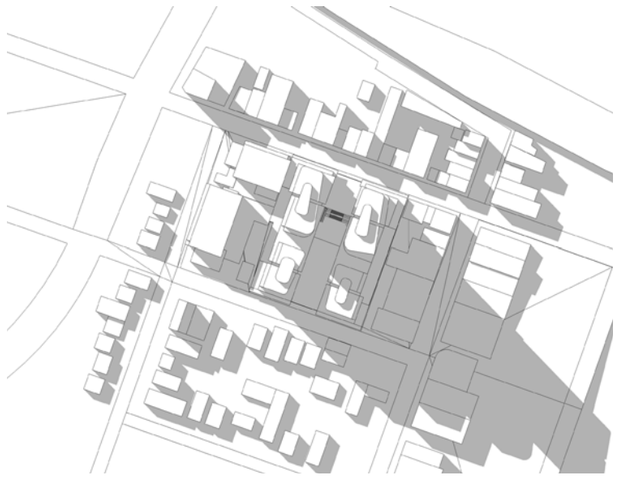
WINTER 21ST OF JUNE



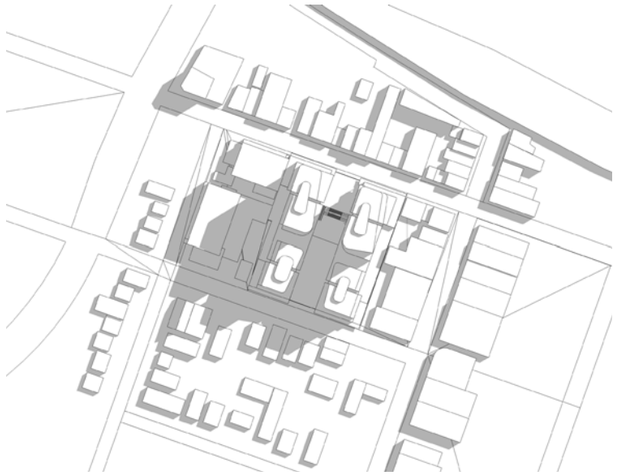
9 am

12 pm



3 pm

EQUINOX 22ND OF SEPT



9 am

12 pm

3 pm

PROPOSED SHADOW

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Appendix 5 - Area Schedule and Car Park Schedule

MASTER PLAN - APARTMENT SUMMARY
(WITH AREA SCHEDULE)

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DEVELOPMENT SUMMARY

RESIDENTIAL	GFA
PODIUM A	4114
PODIUM B	4190
A	16498
B	17120
C	6296
D	7908
TOTAL RESIDENTIAL	56126
SITE AREA	8952
FSR RESIDENTIAL	**6.27**

Apartment Type	No.
Studio	130
1br	202
2br	300
3br	66
Total	**698**

(Based on 50% of 1Br Apts are 1Br + Study)

COMMERCIAL(incl.RETAIL)	GFA	LEASABLE GFA(FOR COMMERCIAL CAR/BYCICLE PARKING SCHEDULE)
UPPER GROUND	5180	4509
LOWER GROUND	4892	4036
TOTAL COMMERCIAL(inl. RETAIL)	10072	8545
SITE AREA	8952	**RETAIL (incl.ANCHOR STORE)**
		5321
FSR COMMERCIAL(inl. RETAIL)	**1.13**	**COMMERCIAL AND MEDICAL CENTRE**
		3224
TOTAL	**GFA**	
TOTAL BUILDING	66198	
FSR	7.39	

CARPARK SCHEDULE							
RESIDENTIAL CAPARK							
UNIT TYPE	**Studio**	**1br**	**2br**	**3br**	**Visitor** (SHARED WITH COMMERCIAL)	**TOTAL CARPARK NO.** (INCL. ADAPTABLES)	**ADAPTABLES NO. - 15% OF TOTAL UNIT NO.**
UNIT NO.	130	202	300	66	0		
CARPARK RATES	0	0.5	1	2	0		
CARPARK NO. CALCULATION	0	101	300	132	0	533	
CARPARK NO. (ROUNDED)						533	105
COMMERCIAL AND RETAIL CARPARK							
COMMERCIAL TYPE	**RETAIL (incl. ANCHOR STORE)**		**COMMERCIAL AND MEDICAL CENTRE**			**TOTAL CARPARK NO.** (INCL. ADAPTABLES)	**ADAPTABLES NO. - 2% OF TOTAL CARPARK NO.** (DCP)
LEASABLE GFA(m2)	5321		3224				
COMMERCIAL CAR PARK RATE	1 per 20m2		1 per 40m2				
CARPARK NO. CALCULATION	266.05		80.60				
CARPARK NO. (ROUNDED)	266		81			347	7
RESIDENTIAL + COMMERCIAL CARPARK							
TOTAL CARPARK NO.(INCL. ADAPTABLES)	880						
TOTAL ADAPTABLE CARPARK NO.	112						

BICYCLE PARKING SCHEDULE						
RESIDENTIAL BICYCLE P ARKING						
UNIT TYPE	**Studio**	**1br**	**2br**	**3br**	**Visitor**	**TOTAL BYCYCLE PARKING NO.**
UNIT NO.	130	202	300	66	698	
BICYCLE PARKING RATES IN CURRENT DCP	0	0.5	0.5	0.5	0.1	
BICYCLE PARKING NO. CALCULATION	0	101	150	33	69.8	353.8
BICYCLE PARKING NO. (ROUNDED)						354
COMMERCIAL AND RETAIL BICYCAL PARKING						
COMMERCIAL TYPE	**RETAIL (incl. ANCHOR STORE)**		**COMMERCIAL AND MEDICAL CENTRE**			**TOTAL BICYCLE PARKING NO.**
LEASABLE GFA(m2)	5321		3224			
EMPLOYEE BICYCLE PARKING RATE	1 per 300m2		1 per 200m2			
EMPLOYEE BICYCLE PARKING NO.	17.74		16.12			
VISITOR BICYCLE PARKING RATE	1 per 2500m2		1 per 750 m2			
VISITOR BICYCLE PARKING NO.	2.13		4.30			
BICYCLE PARKING NO. CALCULATION	19.87		20.42			
TOTAL BICYCLE PARKING (ROUNDED)	20		21			41
RESIDENTIAL + COMMERCIAL BICYCLE PARKING NO.						
TOTAL BICYCLE PARKING NO.	395					

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Appendix 6 - Solar Compliance Diagrams

SOLAR COMPLIANCE DIAGRAM
(WITH SCHEDULE)

PTW

SOLAR ACCESS UNIT
(BALCONY ROOF SKY LIGHT)

LEVEL	UNIT NO.	2HOURS MIN. SOLAR ACCESS UNIT NO.	PERCENTAGE
LEVEL 01	51	19	
LEVEL 01-02 **TOTAL**	102	47	
LEVEL 03	38	23	
LEVEL 03-06 **TOTAL**	152	96	
LEVEL 07 A&B	18	17	
LEVEL 07 C&D	15	5	
LEVEL TYPICAL **TOTAL**	444	348	
TOTAL	698	491	70%

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Appendix 7 - Cross Ventilation

CROSS VENTILATION DIAGRAM
(WITH SCHEDULE)

PTW

LEVEL	**UNIT NO.**	CROSS VENTILATION UNIT NO.	PERCENTAGE
LEVEL 01	51	24	
LEVEL 01-02 **TOTAL**	102	48	
LEVEL 03	38	32	
LEVEL 03-06 **TOTAL**	152	128	
LEVEL 07 A&B	18	16	
LEVEL 07 C&D	15	15	
LEVEL TYPICAL **TOTAL**	444	408	
TOTAL	698	584	84%

Appendix 8 - Perspective Views & Height Comparison Diagrams

V1 - PUBLIC DOMAIN PERSPECTIVE

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V2 - DUNMORE STREET VIEW

V3 - COURTYARD TO NORTH - PUBLIC DOMAIN

PTW

V4 - DUNMORE STREET TO WEST - CURRENT AND DRAFT LEP

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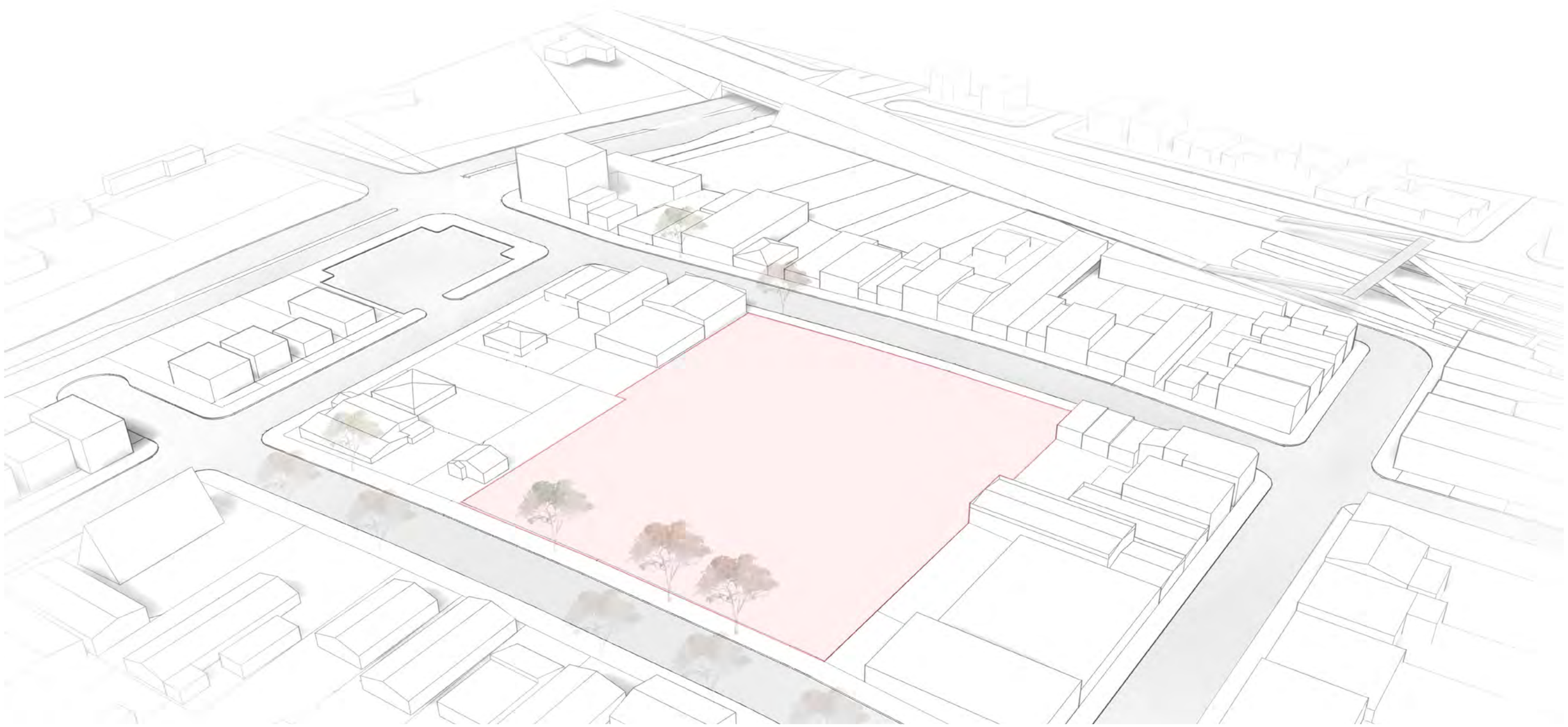
Architectural SEPP 65 for 42-44 Dunmore Street Wentworthville, PTW Architects

V5 - PRITCHARD STREET TO WEST - CURRENT AND DRAFT LEP

PTW

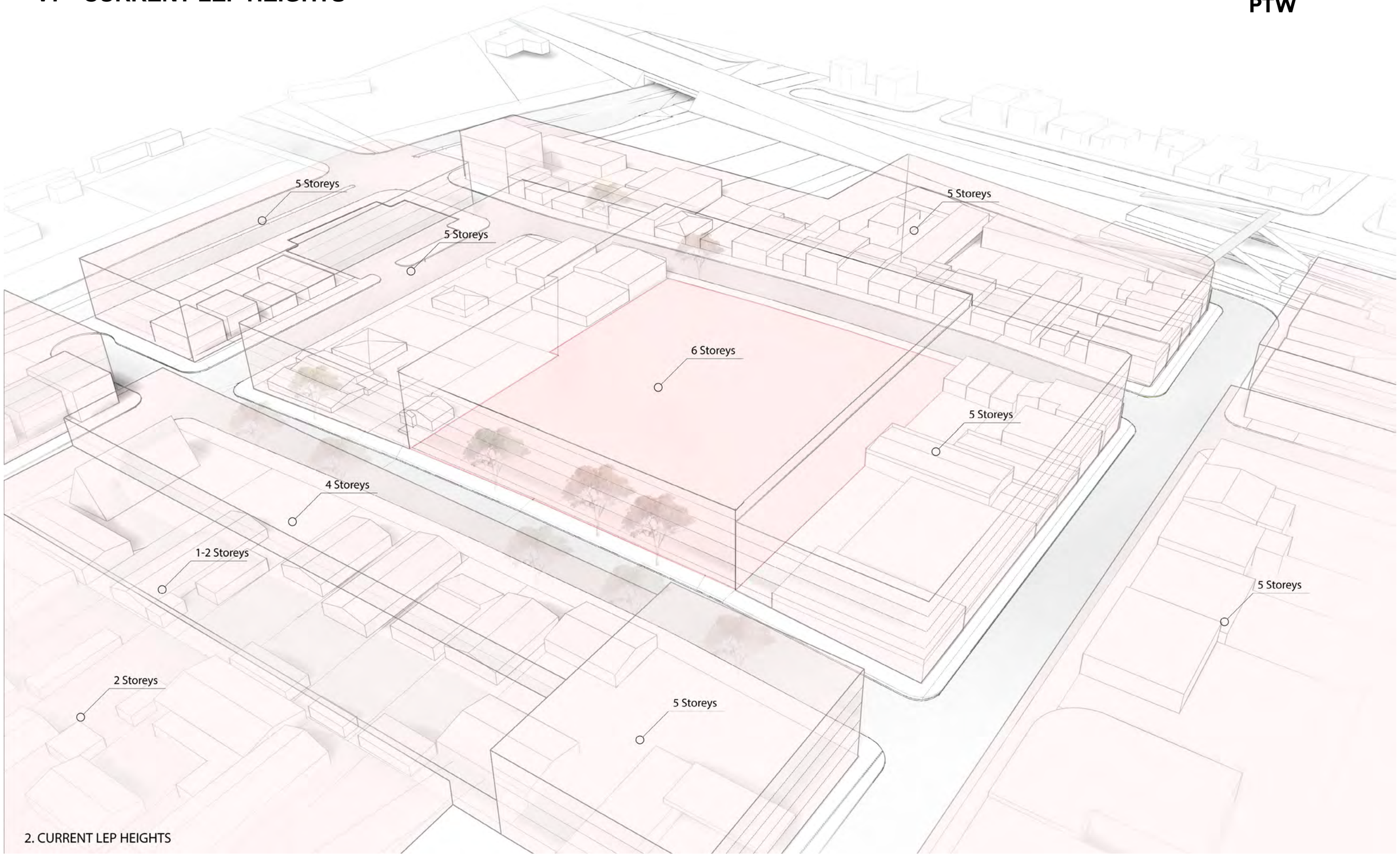
V6 - EXISTING SURROUNDING BUILDINGS

PTW



V7 - CURRENT LEP HEIGHTS

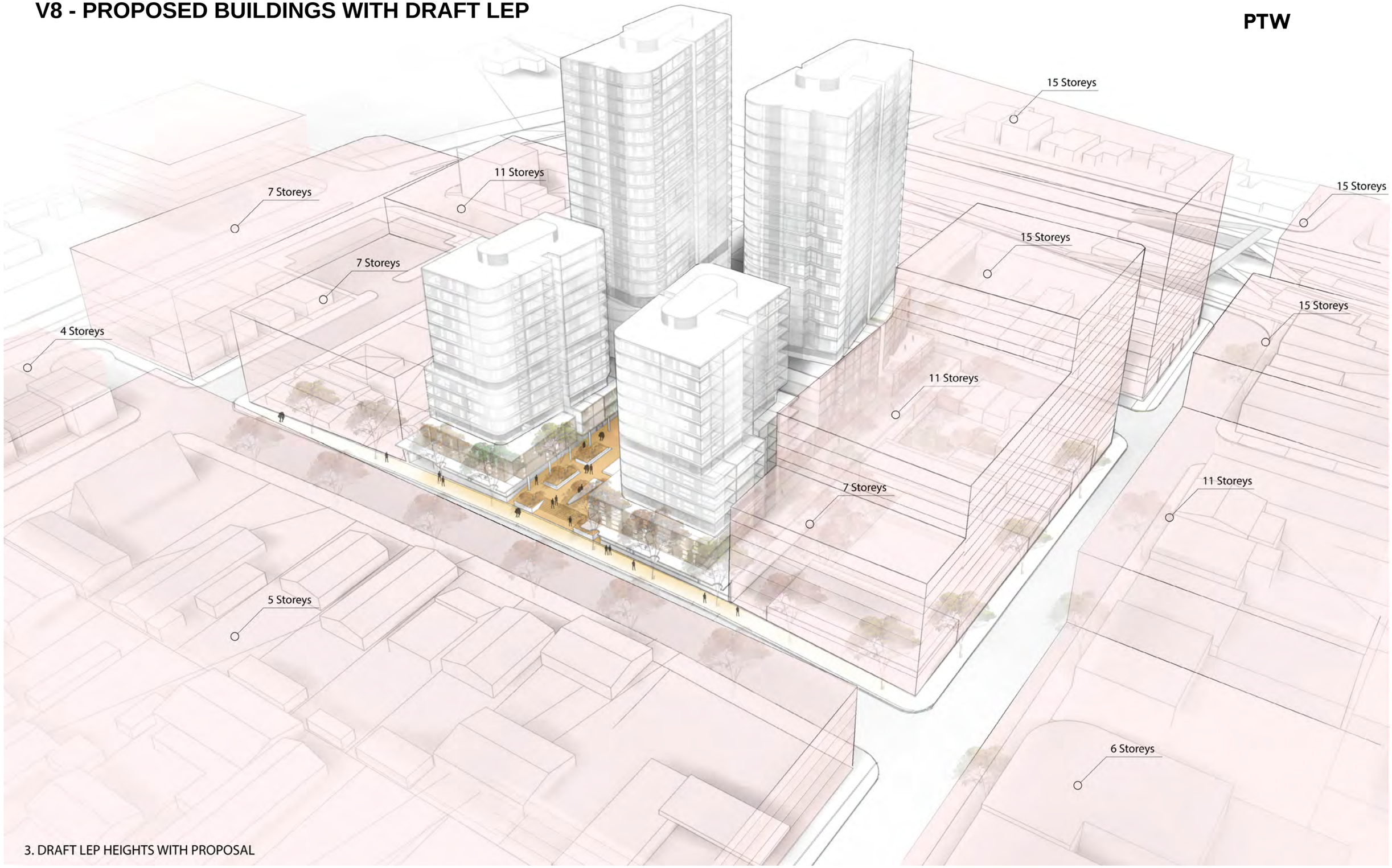
PTW



2. CURRENT LEP HEIGHTS

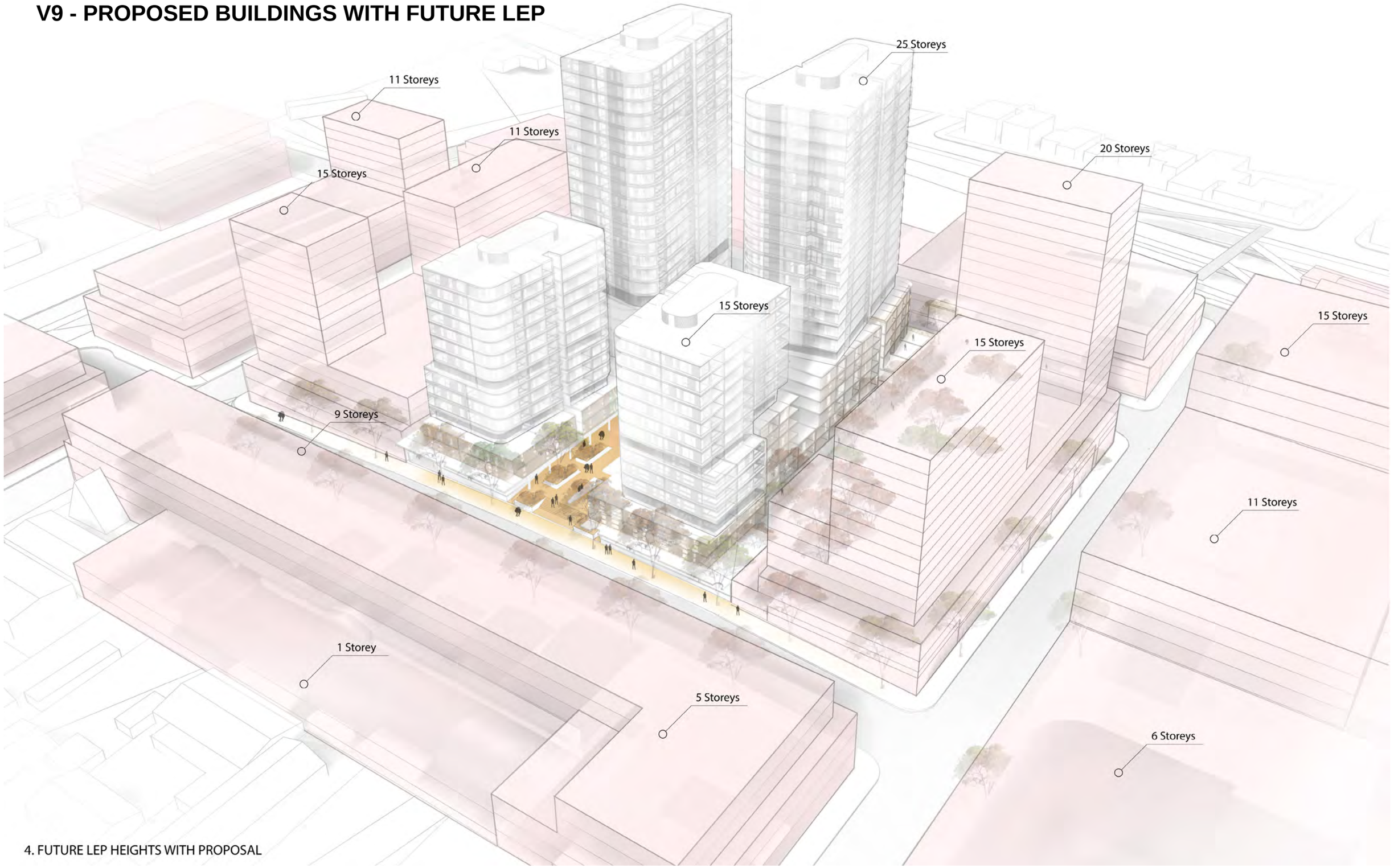
V8 - PROPOSED BUILDINGS WITH DRAFT LEP

PTW



3. DRAFT LEP HEIGHTS WITH PROPOSAL

V9 - PROPOSED BUILDINGS WITH FUTURE LEP



4. FUTURE LEP HEIGHTS WITH PROPOSAL

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Appendix 9– Overview of the SEPP 65 RFDC Key Compliance Checklist

Key Provisions of Residential Flat Design Code

PTW

Section	Rule of Thumb	Planning Proposal Compliance
Local Context		
Building Depth	10-18 metres for adequate daylight and natural ventilation.	Compliant: Widths are generally compliant when averaged out along the lengths of the various tower buildings. S*lot recesses* tend to reduce the width and these are introduced to allow natural ventilation into the rear of otherwise single aspect apartments. They also bring natural ventilation and daylight into shared lift lobbies.
Building Separation	Buildings up to 4 storeys / 12 metres • 12 metres between habitable rooms/balconies • 9 metres between habitable /balconies and non-habitable rooms • 6 metres between non-habitable rooms For buildings five to eight storeys / 25 metres • 24 metres between habitable rooms/balconies • 18 metres between habitable /balconies and non-habitable rooms • 12 metres between non-habitable rooms	Compliant: The main public space is more than compliant in terms of distances between eastern and western buildings. It is 20.5m between buildings to 3 stories above courtyard level and then 24m min. (with a maximum of 30m) above this level. The space between north and south buildings comply to residential code building separation through manipulation of their internal planning to prevent overlooking of habitable rooms and by directing these rooms towards outward views, see discussion under 4: Built Form.
Site Design		
Open Space	The area of open space should generally be between 25 – 30% of the site area.	The proposed new public space is 2,570sqm Which represents 29% of the total site area. The area of Open Space is 2,069sqm Which represents 23% of the total site area.
Building Configuration		
Apartment Layout	Max depth 8 metres from a window for single aspect units. Back of kitchen shall be max 8 metres from a window. Minimum unit sizes • Studio – 40 • One bed – 50 • Two bed – 70	Compliant or capable of being made to comply.
	• Three bed – 95	
Apartment Mix	Provide a variety and diversity of apartment types.	Compliant
Balconies	Provide primary balconies for all apartments with a min depth of 2 metres.	Compliant
Ceiling Heights	Recommended ceiling heights are: • 2.7m – habitable rooms • 2.4m – non-habitable rooms • For two storey units, 2.4 metres for the second storey if 50%or more of the apartment has 2.7m ceiling height.	Compliant
Storage	Provide storage areas as follows: Studio – 6m3 One bed – 6m3 Two bed – 8m3 Three + bed – 10m3	Compliant
Building Amenity		
Acoustic Privacy	Utilise the site and building layout to maximise the potential for acoustic privacy. Arrange apartments to minimise noise transmission.	Compliant
Daylight access	70% of living rooms and private open space to receive a minimum of 3 hours solar access between 9am to 3pm. Can be reduced to 2 hours in urban areas.	Compliant
Natural ventilation	Building depths that typically support natural ventilation range from 10 to 18 metres. 60% of units should be cross ventilated.	Compliant
Building Performance		
Energy Efficiency	Incorporate passive solar design techniques. Improve the control of mechanical space heating and cooling by targeting areas, allow adjustable awnings, provide gas bayonets and ceiling fans. Reduce the reliance on artificial lighting by providing a mix of lighting types and high efficient lighting. Maximise the efficiency of household appliances.	Compliant or capable of being made to comply
Maintenance	Select manually operated systems for blinds, sunshades etc. Select durable materials. Select appropriate landscape elements and vegetation and provide appropriate irrigation systems.	Compliant or capable of being made to comply
Water conservation	Use AAA rated appliances. Encourage the use of rainwater tanks. Collect, store and use rainwater on site. Incorporate local indigenous native vegetation in landscape design.	Compliant or capable of being made to comply