

The Timberyards by RTL Co. Marrickville, NSW

Overshadowing Analysis



‘Gura Bulga’

Liz Belanjee Cameron

‘Gura Bulga’ – translates to Warm Green Country. Representing New South Wales.



‘Dagura Buumarri’

Liz Belanjee Cameron

‘Dagura Buumarri’ – translates to Cold Brown Country. Representing Victoria.



‘Gadalung Djarri’

Liz Belanjee Cameron

‘Gadalung Djarri’ – translates to Hot Red Country. Representing Queensland.

Ethos Urban acknowledges the Traditional Custodians of Country throughout Australia and recognises their continuing connection to land, waters and culture.

We acknowledge the Gadigal people, of the Eora Nation, the Traditional Custodians of the land where this document was prepared, and all peoples and nations from lands affected.

We pay our respects to their Elders past, present and emerging.

In supporting the Uluru Statement from the Heart, we walk with Aboriginal and Torres Strait Islander people in a movement of the Australian people for a better future.

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1. Introduction

Executive Summary	6
Development Summary	7
Purpose of Reoport	8
Proposal	9
DCP Controls	10
Methdology	11
Floorplan Analysis of Context	12
Solar Panel Context	15

2. Solar Study

Sun Eye View	18
Solar Compliance - Principal Living Area of Neighbouring Houses	44
Solar Compliance - PV Panels of Neighbouring Houses	46

Contents

1 Introduction

Executive Summary

This Overshadowing Analysis has been prepared on behalf of Varsity Assets Management Pty Ltd (Developer) on behalf of RTL Investments 2 Pty Ltd as trustee for RTL Marrickville Property Trust ('RTL Co.') (**the Applicant**) to support a State Significant Development Application (SSDA) for the proposed *Timberyards* development. The SSDA (SSD-76927247) seeks consent for a diverse rental housing precinct comprising build-to-rent (BTR), co-living and affordable housing. The precinct development comprises seven buildings ranging from eight to thirteen storeys, with open space that includes a pocket park, through site links and communal open spaces. Specifically, consent is sought for the following:

- Site preparation (including remediation), demolition and bulk excavation for basement parking;
- Residential accommodation (shop top housing, residential flat buildings and mixed use buildings) that includes BTR, co-living and affordable housing;
- Retail premises on the ground floor within the MUI zoned land and extending up to 25m into the R4 zoned land;
- Publicly accessible recreation area (pocket park) and through site links;
- Neighbourhood shop (within the R4 zoned land);
- Associated landscaping and public domain works; and
- Augmentation of, and connection to, existing utilities as required.

A detailed description of the proposal is provided in the Environmental Impact assessment (EIS) by Ethos Urban. The development is declared State Significant by virtue of being a BTR development on land in Greater Sydney with an Estimated Development Cost (EDC) of greater

than \$50 million, with the tenanted component representing greater than 60% of the EDC (Schedule 1, *State Environmental Planning Policy (Planning Systems)* 2021).

Project Vision

RTL Co. aim to deliver Sydney’s premier neo-industrial residential neighbourhood - a global benchmark for imaginative urbanism. The Timberyards aims to seamlessly integrate diverse residential offerings into the distinctive character of Marrickville, fostering a sense of pride among residents and the local community. The project will deliver a wide range of rental living solutions, complemented by recreation spaces and local retail, all underpinned by Connection to Country and environmentally sustainable design principles.

Site Description

The site is known as the ‘Timberyards’, located in Marrickville within the Inner West Local Government Area (LGA). The site comprises 39 lots with legal identification listed in the table below, and has a total area of 22,770m2 or, for the purpose of calculation of floor space, an area of 22,564m2 (excluding the SP2-zoned Victoria Road widening land, which is within the site boundary). The site is located within Precinct 47: Victoria Road in the *Marrickville Development Control Plan 2011* (MDCP 2011). The site is primarily contained in the Timber Yards sub-precinct of Precinct 47, with the lots fronting Victoria Road falling within the Victoria Road Corridor sub-precinct.

The site is approximately 800m walking distance to the newly opened Sydenham Metro Station, with 7-minute travel time to the Sydney CBD.

The site currently comprises primarily industrial and light industrial uses, with residential dwellings to a minor portion of the site on Farr Street (western boundary) and Victoria Road (eastern boundary). The site also has frontage to Sydenham Road to the south and Mitchell Street to the north (and encompassing a small lane off Mitchell Street). An aerial map is provided at Figure 1 on the following page.

Lot/DP	Property Address
1/724487	119A Sydenham Rd
1/972534	121 Sydenham Rd
B/439802	129 Sydenham Rd
A/439802	131 Sydenham Rd
D/377270	133 Sydenham Rd
1/700223	135 Sydenham Rd
B/343286	7 Farr St
A/304426	9 Farr St
A/304426	11 Farr St
1/78883	13 Farr St
1/252507	15 Farr St
2/252507	17 Farr St
345/587262	191 Victoria Rd
1/572829	35 Farr St
12/4590	14 Mitchell St
13/4590	10 Mitchell St
14/4590	8 Mitchell St
15/4590	183 Victoria Rd
16/4590	4 Mitchell St
17/4590	2 Mitchell St
3/4590	165 Victoria Rd

Lot/DP	Property Address
2/4590	167 Victoria Rd
1/4590	169 Victoria Rd
A/301985	171 Victoria Rd
B/301985	173 Victoria Rd
1/315293	183 Victoria Rd
3/252507	19 Farr St
4/252507	21 Farr St
5/252507	23 Farr St
6/252507	25 Farr St
7/252507	27 Farr St
8/252507	29 Farr St
9/252507	31 Farr St
1/583801	33 Farr St
C/301985	175 Victoria Rd
D/301985	183 Victoria Rd
E/301985	175 Victoria Rd
A/166330	183 Victoria Rd
20/667441	183 Victoria Rd

Development Summary



Figure 1. Aerial of Site with Cadastre. Source: Nearmap and SIXMaps.

Project Name	The Timberyards by RTL Co.
Description of Use	Mixed Use Rental Housing Precinct
Address	Multiple Lots Bound By Victoria Road, Sydenham Road, Farr Street And Mitchell Street
Purpose of Document	State Significant Development Application
Client	Varsity Assets Management Pty Ltd (Developer) on behalf of RTL Investments 2 Pty Ltd as trustee for RTL Marrickville Property Trust ('RTL Co.')

Site Area	22,770m ² (22,564m ² excluding the SP2-zoned Victoria Road widening land within the site boundary)
Residential GFA	71,350m ²
Retail GFA	2,041m ²
Commercial GFA	353m ²
Communal GFA	2,890m ²
Total Proposed GFA	76,634m ²
Number of Buildings	7
Number of Storeys	Between 8 to 13 Storeys
Number of BTR/AH Units	599 (including 144 Affordable)
Number of Co-Living Dwellings	589
Total Number of Units & Dwellings	1188
Total No. of Livable (Silver) Units	619
Total No. of Accessible Units	24
Residential car spaces	155 (inc. 6 accessible) @ B1, 83 (inc. 2 accessible) @ GF, total 238 (inc. 8 accessible + 22 x car share)
Retail car spaces	33 (inc. 1 accessible and 2 drop off)
RTLco. staff car spaces	7 (including 2 accessible)
Total number of car spaces	278 car spaces

Purpose of Report

The purpose of this report is to assess the overshadowing impact to the single detached houses fronting Sydenham Road southwest of the Subject Site. The overshadowing analysis undertaken focuses on the solar access to the principal living areas and PV panels of those dwellings.

The solar assessment was performed for both the following scenarios:

- Proposed design (with height variation as part of Clause 4.6 variation request)
- Compliant height (Proposed design less exceedance above the 20% Affordable Housing Bonus)

Section 1 of this report outlines the relevant DCP controls, the methodology used in this overshadowing analysis and the research of the internal floor space of impacted houses along Sydenham Road.

Section 2 of this report contains the sun eye view exports at 15min interval comparing both scenarios followed by a solar compliance table summarizing the outcome of the overshadowing analysis.

In summary:

	Proposed Design	Compliant Height Scheme
Total number of dwellings impacted by overshadowing	19 dwellings	
Compliance with DCP Solar Access Provision to Principal Living Area	16 out of 19 dwellings	18 out of 19 dwellings
Compliance with DCP Solar Access Provision to PV Panels	2 out of 5 dwellings	4 out of 5 dwellings



Figure 2. Site Condition. Source: Nearmap and SIXMaps.



Proposal

The proposed redevelopment of the Marrickville Timber Yards will be a mixed-use residential focused precinct with a mix of residential accommodation (shop top housing, residential flat buildings and mixed use buildings) that includes BTR, co-living and affordable housing.

Buildings within the proposal vary in heights from 8-storeys to a maximum of 13-storeys. Details of the proposed variation to building height are as below:

Building	LEP	Maximum building height	Proposed Building Height
A	20m	24m	31.2m
C	23m	27.6m	33.3m
D	23m	27.6m	31.1m
E	RL50	RL50	RL50.8
F	11m	13.2m	29.2m
	20m	24m	
G	13.2m	13.2m	30.2m
	20m	24m	

Building	Exceedance to max. building height	Variation & to maximum building height	Overview of variation
A	7.2m	30%	1 Storey + Plant
C	5.7m	20.7%	Plant + Roof
D	3.5m	12.7%	Plant + Roof
E	0.8	1.6%	Parapet
F	16m	121%	1 storey + Plant
	5.2m	21.7%	
G	17m	155%	4 Storeys + Plant
	6.2m	25.8%	

Refer to the Clause 4.6 Variation Request for further detail around proposed variation to building height

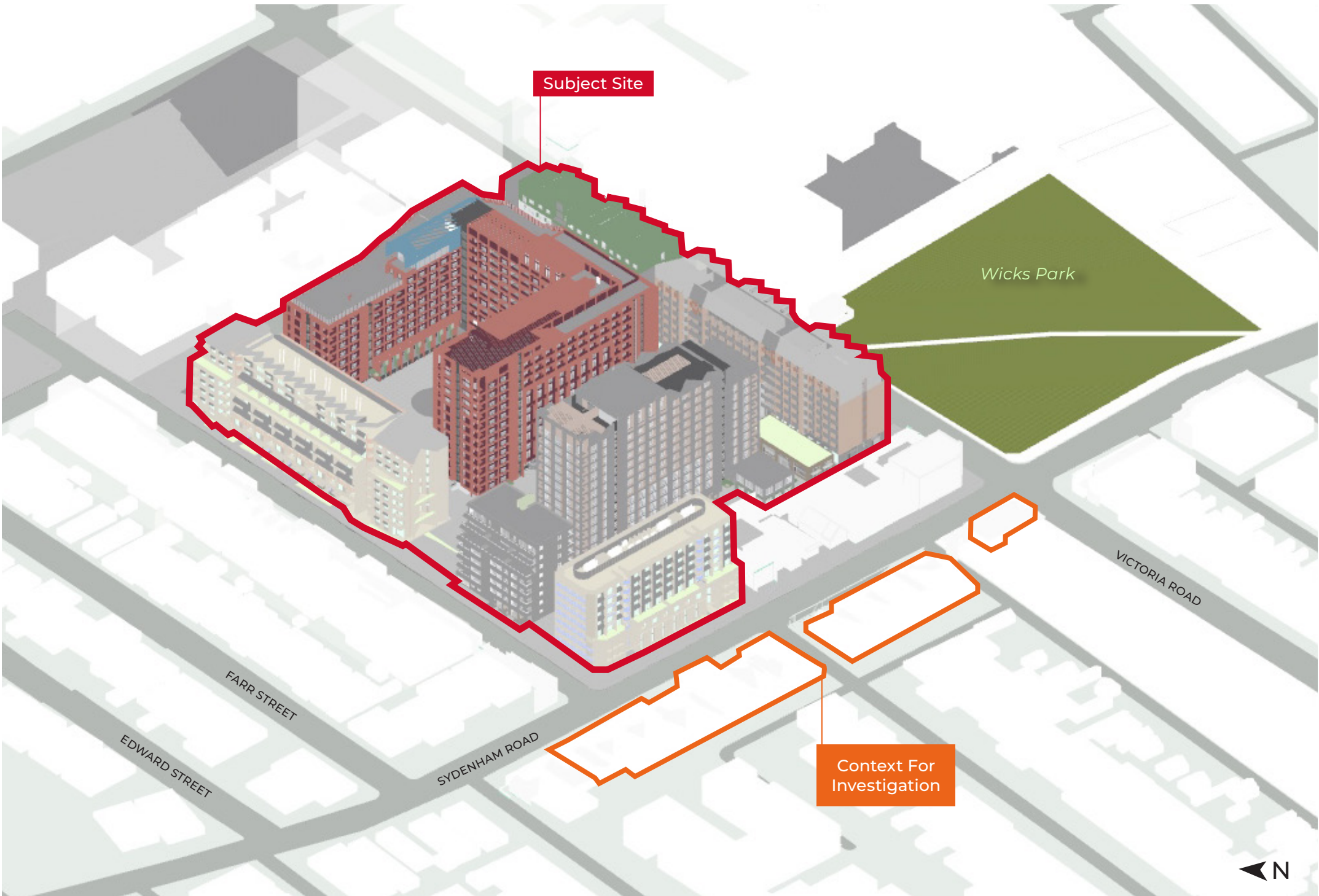
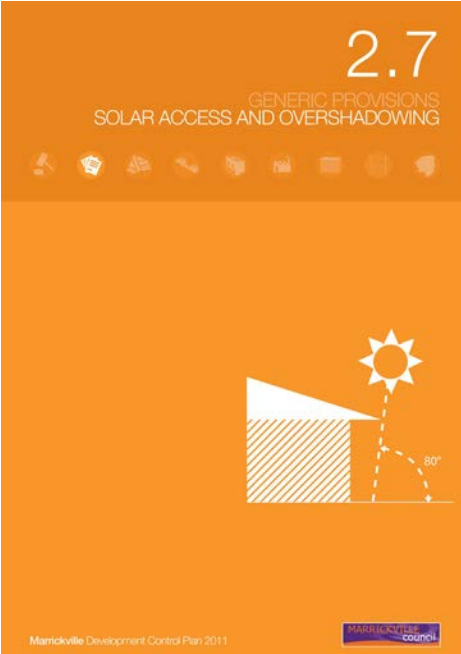


Figure 3. Site proposal within context.

DCP Controls



Marrickville DCP Part 2 - Generic Provisions Part 2.7 Solar Access and Overshadowing

The following solar provisions outlined in the DCP applies:

- Principal living areas and principal areas of open space must receive a minimum of 2 hours sunlight between 9am and 3pm on 21 June.
- PV Panels must receive a minimum of 4 hours sunlight between 9am and 3pm on 21 June.

PART 2: GENERIC PROVISIONS

- iv. Specify the use of the rooms that have windows or skylights that are impacted by the existing or proposed shadowing; and
- v. Indicate and use the true north point (not magnetic north).

2.7.3 Solar access for surrounding buildings

- C2** Direct solar access to windows of principal living areas and principal areas of open space of nearby residential accommodation must:
- i. Not be reduced to less than two hours between 9.00am and 3.00pm on 21 June; or
 - ii. Where less than two hours of sunlight is currently available on 21 June, solar access should not be further reduced. However, if the development proposal results in a further decrease in sunlight available on 21 June, Council will consider:
 - a. The development potential of the site;
 - b. The particular circumstances of the neighbouring site(s), for example, the proximity of any residential accommodation to the boundary, the resultant proximity of windows to the boundary, and whether this makes compliance difficult;
 - c. Any exceptional circumstances of the subject site such as heritage, built form or topography; and
 - d. Whether the sunlight available in March to September is significantly reduced, such that it impacts upon the functioning of principal living areas and the principal areas of open space. To ensure compliance with this control, separate shadow diagrams for the March/September period must be submitted in accordance with the requirements of C1;

Where less than two hours of sunlight is currently available on 21 June and the proposal is not reducing it any further, Council will still consider the merits of the case having regard to the above criteria described in points a to d.

- C3** Where adjoining sites include non-residential uses like commercial, industrial and other public/community buildings, Council will consider the merits of the case having regard to the use of those parts of such buildings that are impacted by any additional overshadowing.
- C4** Council will also consider the overshadowing impacts of a proposal upon a window which provides ambient light to a principal living area within a neighbouring dwelling where that window results in the only source of light to that room.

Window	Includes a roof skylight, glass panel, glass brick, glass louvre, glazed sash, glazed door, translucent sheeting or other device which transmits natural light directly from outside a building to the room concerned.
Principal Living Area	Means rooms with a high level of use including a lounge room, living room, dining room, kitchen, but not including bedrooms and non habitable rooms such as laundries and bathrooms.
Principal Open Space	Means that portion of level open space utilised by, or most likely to be utilised by, occupants for rest



and recreation. **NB** For the assessment of overshadowing impacts, if this area is not readily identifiable, an area adjacent to the dwelling with a minimum width of 3 metres, will be used for assessment purposes.

2.7.4 Solar access for PV panels and solar hot water system

- C5** PV panels and solar hot water systems must be placed on areas of a building where there is minimal or no adverse impacts on the streetscape or architectural integrity of the host building and where there is minimal or no overshadowing.
- C6** The best location for a PV panel or solar hot water system must be determined through a site and context analysis taking into account the following:

NB Section 2.3 (Site and Context Analysis) of this DCP provides detailed objectives and controls on carrying out a site and context analysis.

- i. Features of the site or of the proposed development on which the PV panels or hot water system will be placed (for example shadows within the site from trees or any architectural features of the proposed building);
- ii. Features of the adjoining site and developments that may impact on the placement of the PV panels or solar hot water system; and
- iii. The maximum building envelope permitted on an adjoining property, where the adjoining property has not been developed to the maximum extent permissible under planning or zoning provisions.

NB The presence of PV panels or solar hot water systems on a site and the potential that they may be overshadowed when an adjoining site is redeveloped in accordance with applicable development controls must not be used as grounds for objection to restrict development of an adjoining site where the extent of that development could have been anticipated at the site and context analysis stage.

- C7** PV panels and solar hot water systems must receive a minimum four hours of direct sunlight between 9.00am and 3.00pm during midwinter.

2.7.5 Solar access for new development

2.7.5.1 Attached dwellings, dwelling houses, semi-attached dwellings and secondary dwellings

- C8** Where site orientation permits, new buildings and additions must be sited and designed to maximise direct solar access to north-facing living areas and outdoor recreation areas such that:
- i. At least one habitable room (other than a bedroom) must have a window having an area not less than 15% of the floor area of the room, positioned within 30 degrees east and 20 degrees west of true north and allow for direct sunlight for at least two hours over a

Methodology

Survey drawing and 3D

- Survey drawing used in this study has been provided by Turner dated 18 October 2024.
- This includes the ifc file “52202-002-LTS-SU-MARV [2024-08-16]” containing the detailed model of the houses across Sydenham Road with architectural features such as windows, front porch, roof feature, etc suitable for detailed solar assessment.
- Both files are geo-referenced to GDA2020 MGA56 with references to MGA North and True North

3D Model of the Compliant Scheme and the Proposed Architectural

- 3D model of the Compliant Scheme and the proposed design used in this overshadowing study were issued by Turner Studio dated 3 December 2024.
- The following steps were undertaken in geo-locating the 3D models in preparation of detailed solar analysis.
 - Both models were located at project local and oriented to project north.
 - As advised by BUILDIGITAL, the Digital Engineering Consultant for this project, the reference point 0,0,0 was used as the internal origin.
 - This point relates to 330,092.289, 6,246,347.464,0 at the georeferenced location of GDA2020 MGA56 AHD (Australian Height Datum).
 - A cuboid was provided by BUILDIGITAL in 3D format pointing towards MGA North to assist in the rotation of the 3D files to MGA North.
 - This resulted in a rotation of 56.841 anticlockwise.

Merging of Survey 3D and with Compliant Scheme and Proposed Design

- The geo-located 3D of both the height compliant scheme and architectural is combined with the detailed context from the 3D survey.
- Both of these files are geo-referenced to GDA2020 MGA56 oriented to MGA North
- For the purpose of detailed solar study, a further rotation of 1 degrees clockwise was undertaken to ensure all the 3D including height compliant scheme, proposed design and context are oriented to True North.

Setting Up Sun Eye View

- 3D modelling software Rhino3D has been used in the undertaking of this solar assessment.
- Grasshopper (and Ladybug) is a plugin to Rhino which is used for environmental assessment such as solar studies.
- Sun rays between the hours of 9am-3pm are extracted from Grasshopper Ladybug at 15min interval.
- These were used as a reference in setting up the sun eye view in Rhino 3D.

Solar Assessment to Principal Living Areas

- Research was undertaken in identifying the internal spaces of the elevation fronting Sydenham Road. The extent of this research is limited to publicly available information such as floor plans from realestate or domain websites.
- Where floor plans are available, the assessment was carried out based on the internal spaces of these houses.
 - For example, a bedroom fronting Sydenham Road might have two windows, solar access to either of those windows

- within the protection period counts towards the solar access of this space/ dwelling.
- Where floor plans are unavailable, the assessment was carried out per window as seen from the façade of those houses fronting Sydenham Road.
 - For example, a house within one lot could have 4 windows fronting Sydenham Road with the internal spaces unknown.
 - The assessment has been carried out four times for the windows individually with each of the windows assumed to potentially be towards a living room.
- The sun eye view set up at 15min interval was used to review solar access to each of the houses/windows potentially impacted by the proposed design on the Subject Site
- A tick is recorded if direct solar access is available for 2 consecutive time intervals (eg. 9am and 9.15am). The full 15min period is assumed to receive a similar amount of direct solar access.
- One tick represents 15min period and 8 ticks are required to be compliant with the controls as per the DCP.
- This is recorded in an excel format including a summary of compliance for each of the houses and windows (where internal floor space is not available).

Solar Assessment to PV Panels

- The same methodology has been adopted for the assessment of overshadowing impact to PV panels of neighboring houses. The location of these PV panels were traced off an high resolution Nearmap aerial image.
- The results are tabulated in an excel format based on the following conditions:
 - A tick is recorded if approximately 50% or more surface area of all solar panels receive solar access for 2 consecutive time intervals (eg. 9am and 9.15am).
 - A cross is recorded if none of the solar panels receive sunlight for 2 consecutive time intervals.
 - A negative number shown in the excel table reflects the total number of solar panels not receiving any direct sun.
- For the purpose of this study, a solar panel is not considered to be receiving direct sunlight if approximately more than 50% of its surface area is impacted by overshadowing.

Floorplan Analysis of Context

An audit of the houses facing the Subject Site along Sydenham Road reveals that a majority of the dwellings have bedrooms fronting the street. Amongst the available data, only 2 terrace houses at 116-118 Sydenham Road are identified to have living rooms situated on the ground floor facing Sydenham Road.

For the purpose of this study, where the floor plans are not available from publicly accessible sources, these windows will be assessed individually assuming the internal space to be potentially the principal living space of the house.

LEGEND

Window No.

Principal Living Area

Bedroom / Walk-In-Robe / Sun Room



Figure 4. Floorplan analysis of houses along Sydenham Road. Source: Nearmap.



Figure 5. Floorplan analysis of houses along Sydenham Road. Source: Nearmap.



Solar Panel Context

An audit of solar panels from Nearmap reveals that only 5 houses have PV panels. The details are as follows:

Address	No. of Solar Panels
122 Sydenham Road	12
Unit 3/116-118 Sydenham Road	10
Unit 1/116-118 Sydenham Road	44
114 Sydenham Road	20
102 Sydenham Road	18

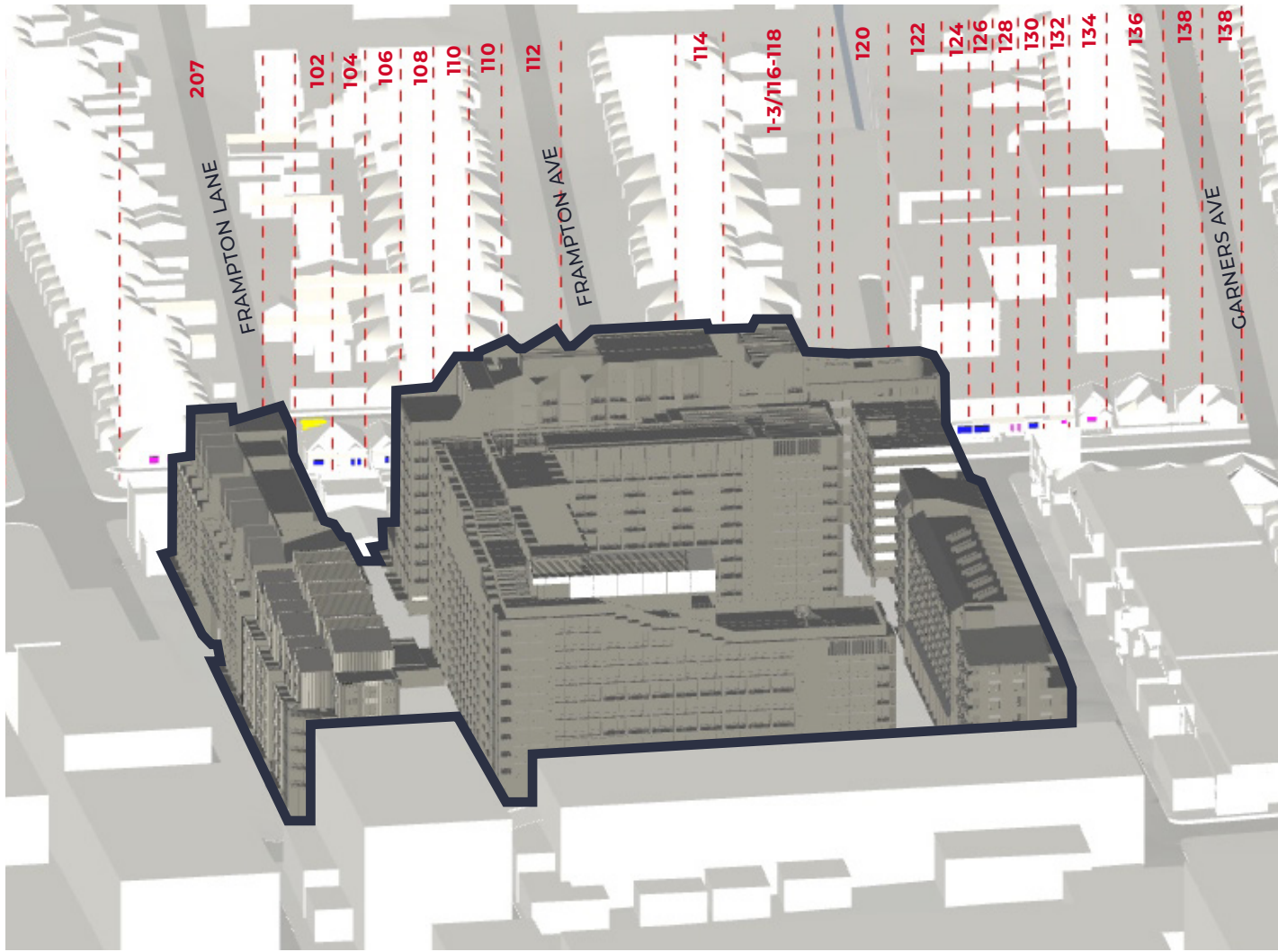


Figure 7. Analysis of houses with solar panels along Sydenham Road. Source: Nearmap.

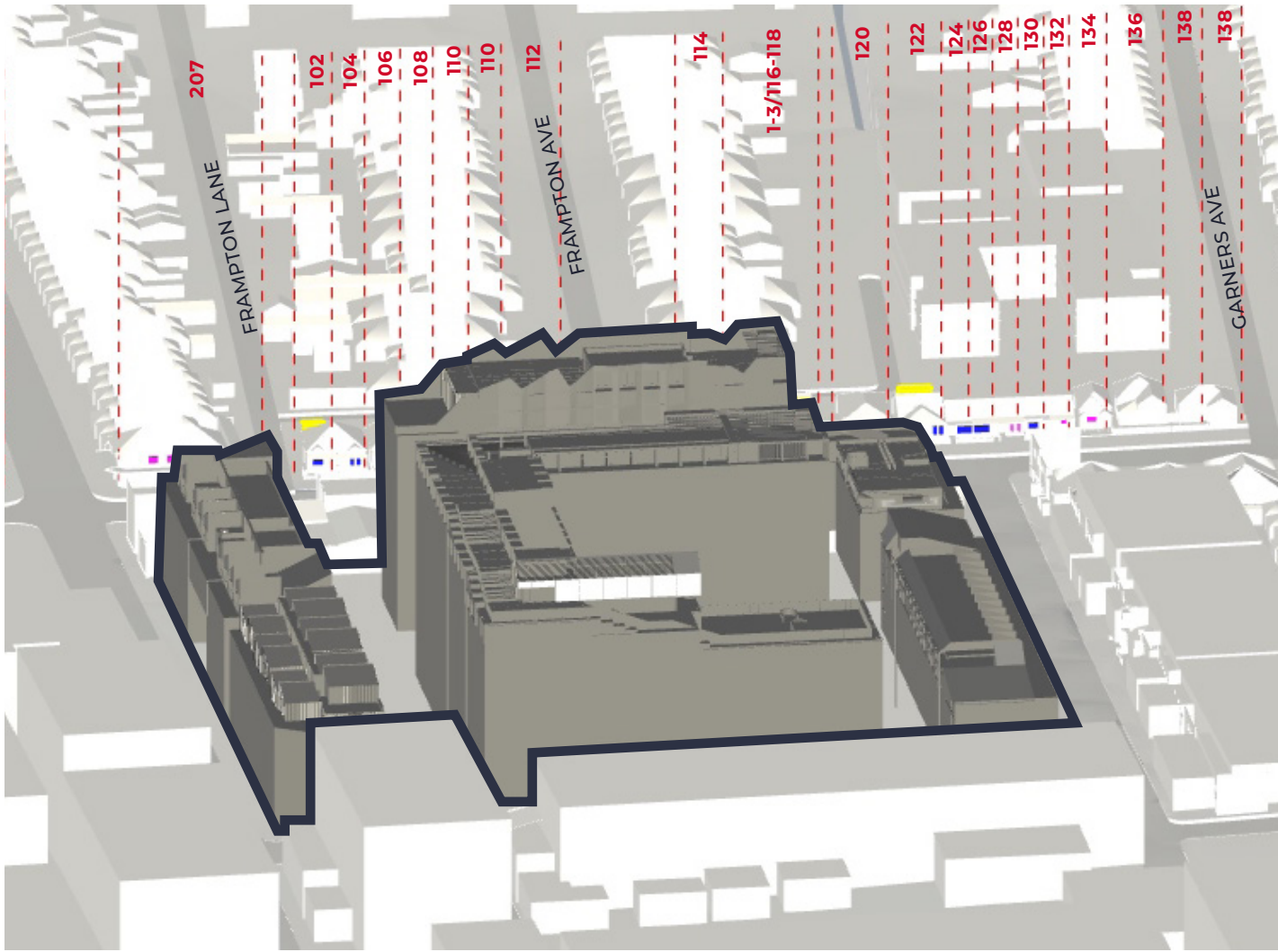
2 Solar Analysis

21 June
09.00am

Proposed Design



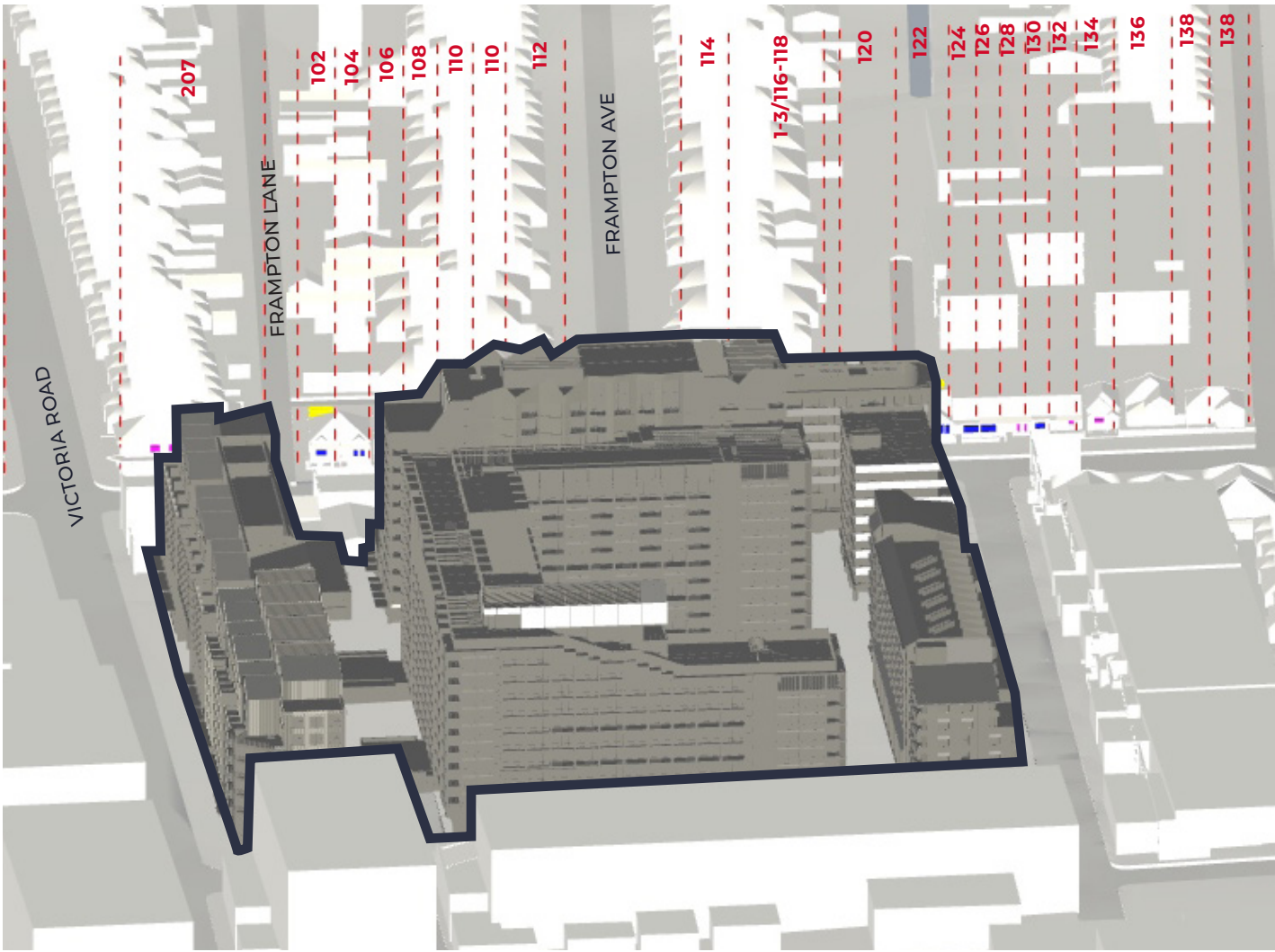
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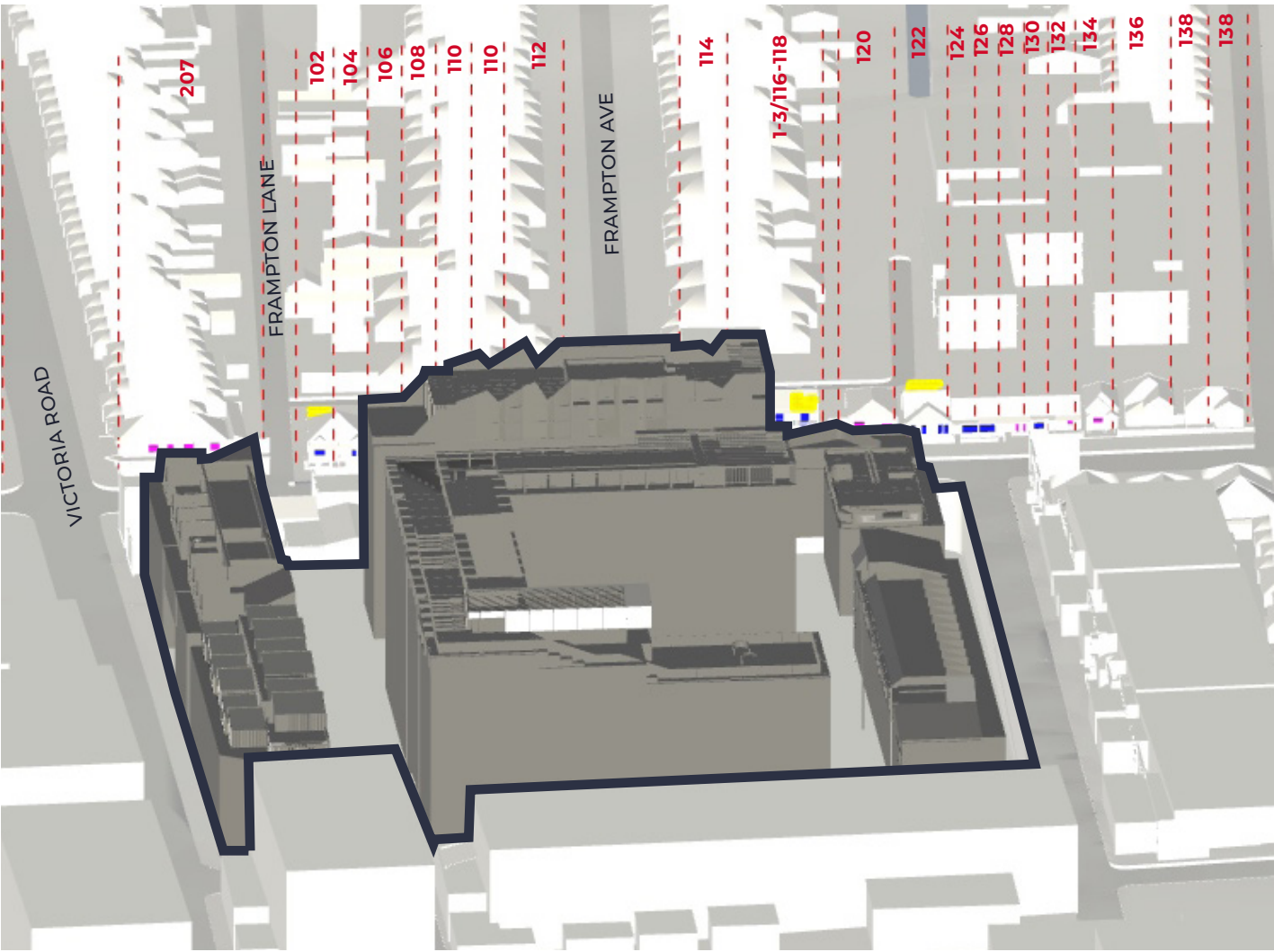
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 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
09.15am

Proposed Design



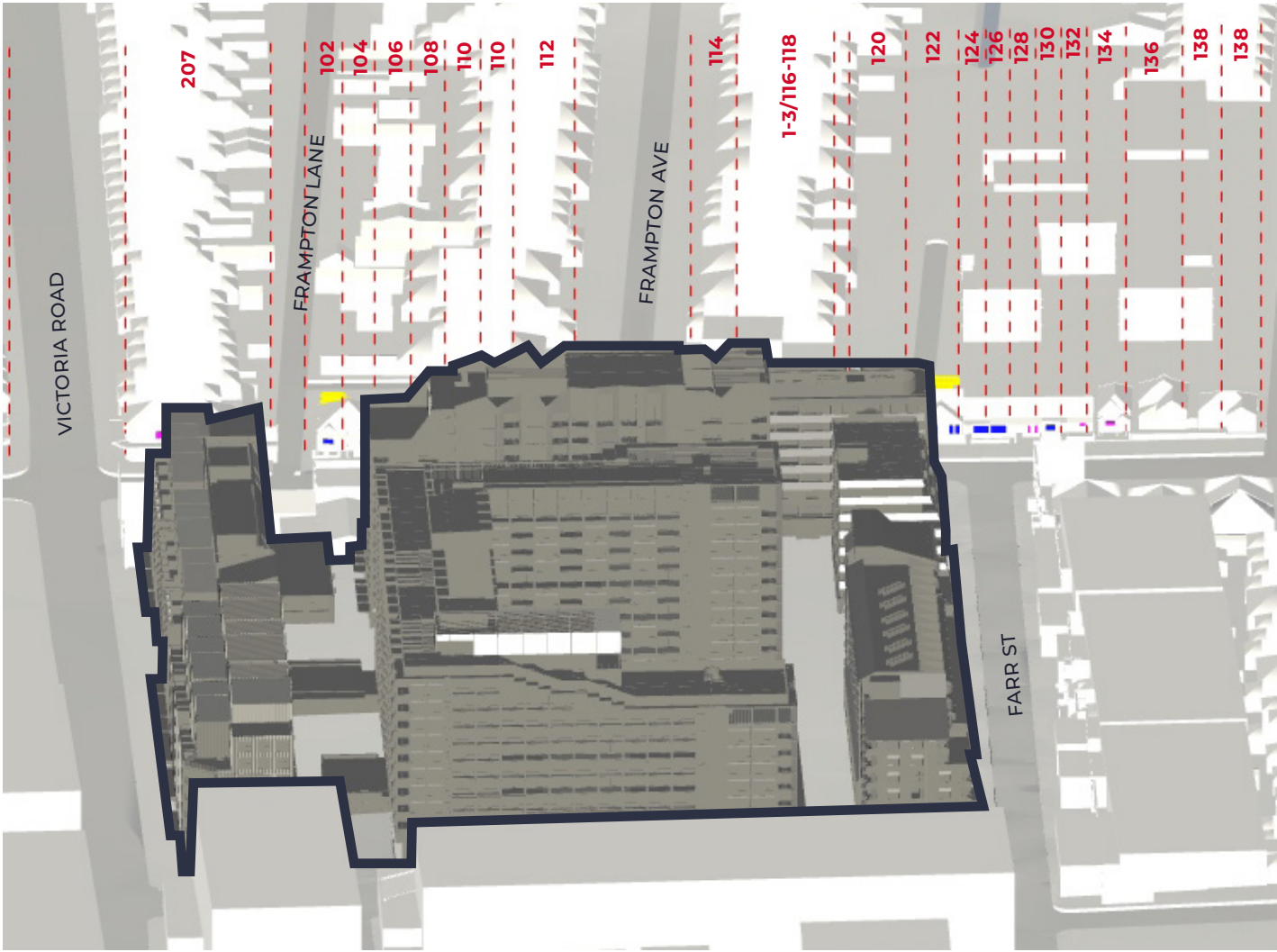
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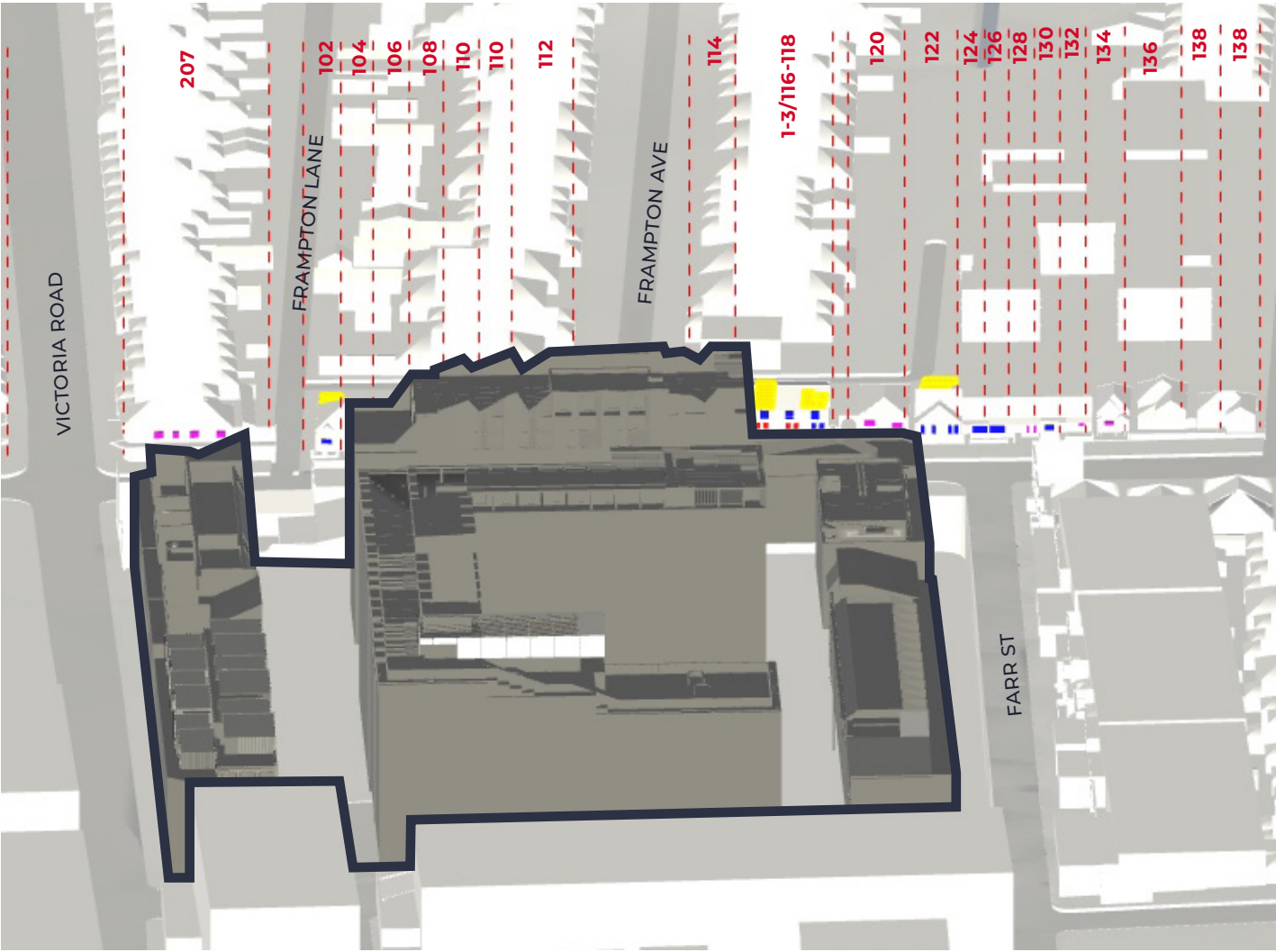
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- Solar Panels
 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
09.30am

Proposed Design



Compliant Height Scheme



LEGEND

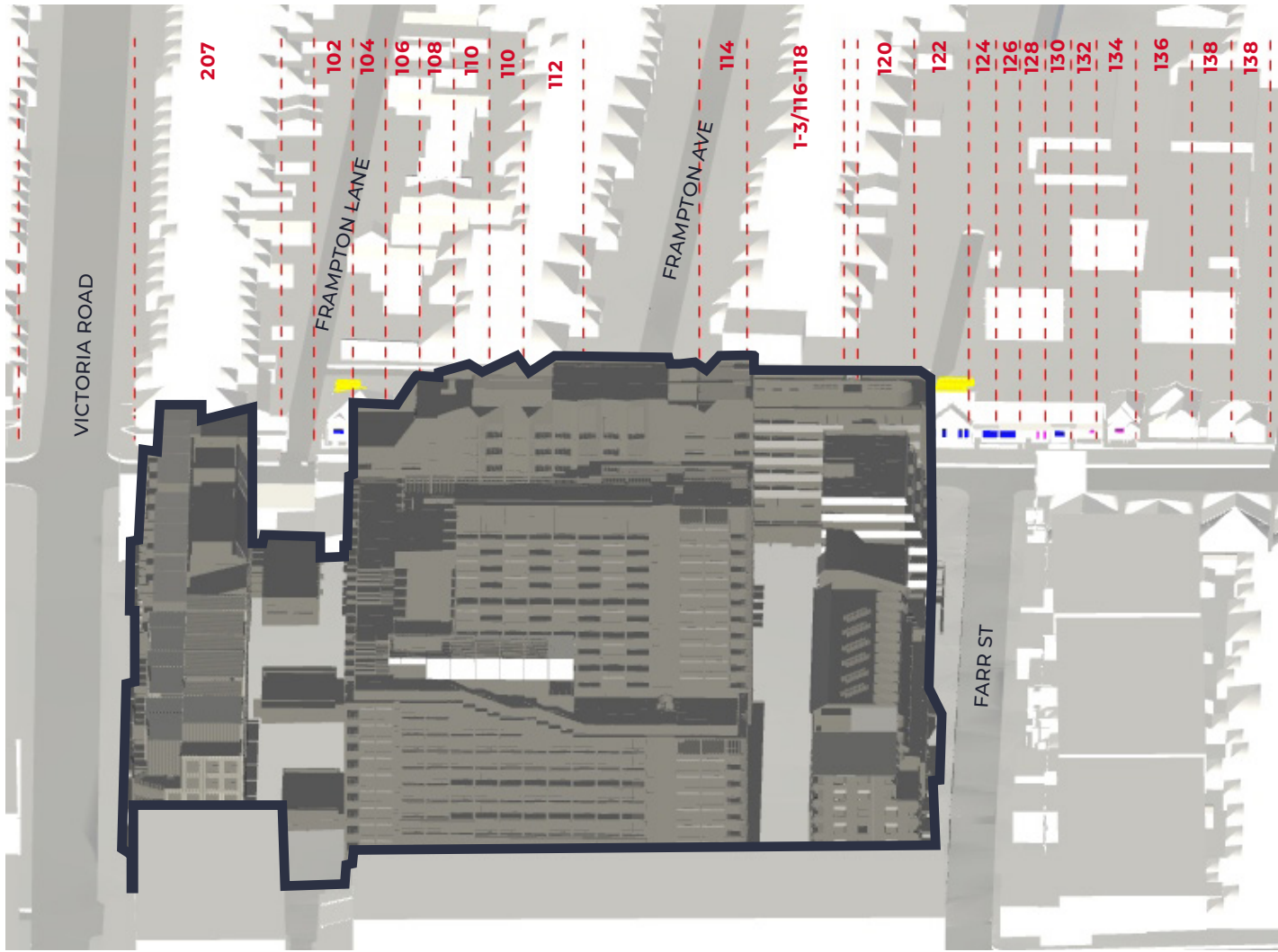
- Solar Panels
- Cadastral Lot

WINDOW LEGEND

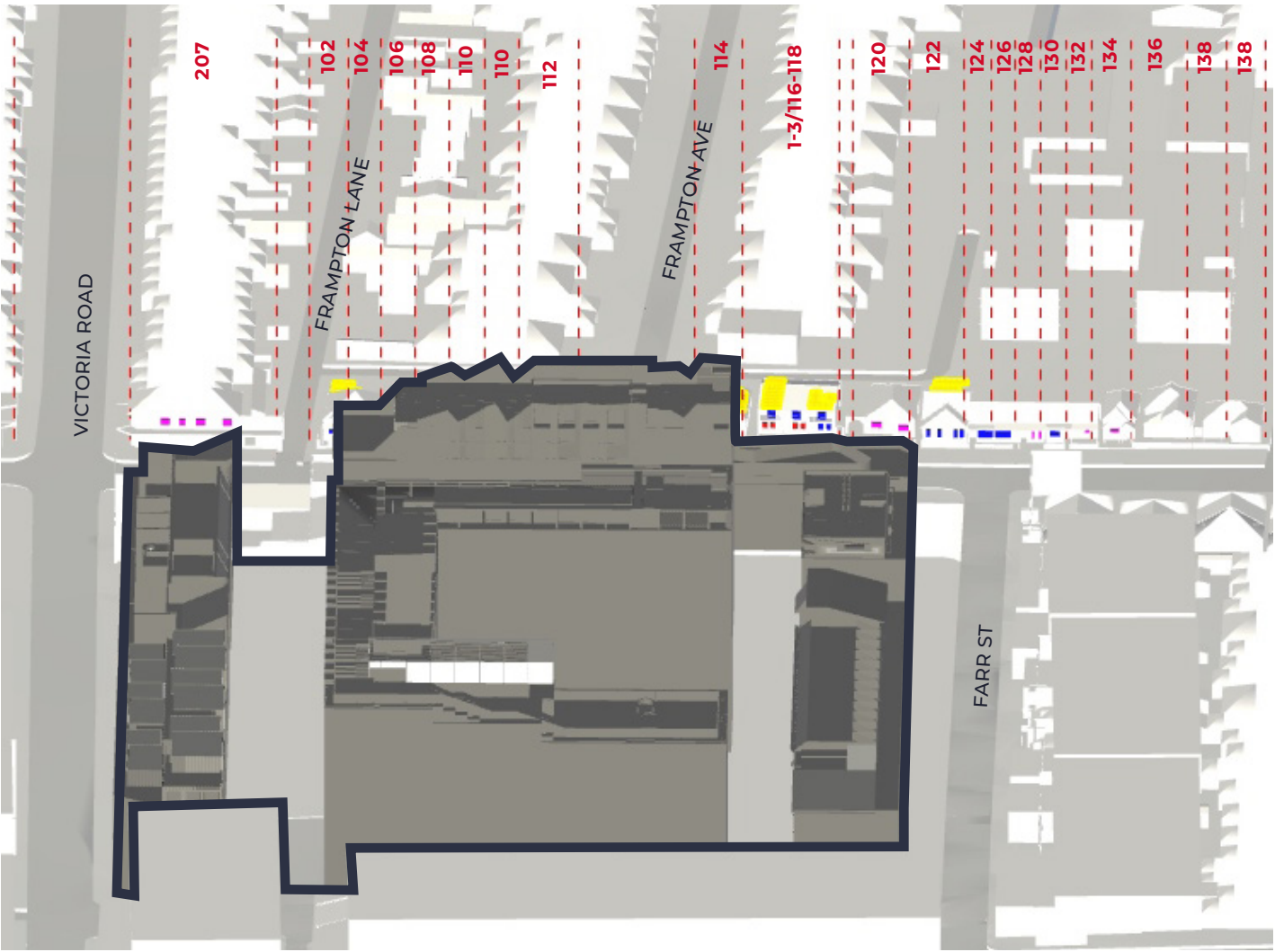
- Unknown Internal Space
- Bedroom
- Living Room

21 June
09.45am

Proposed Design



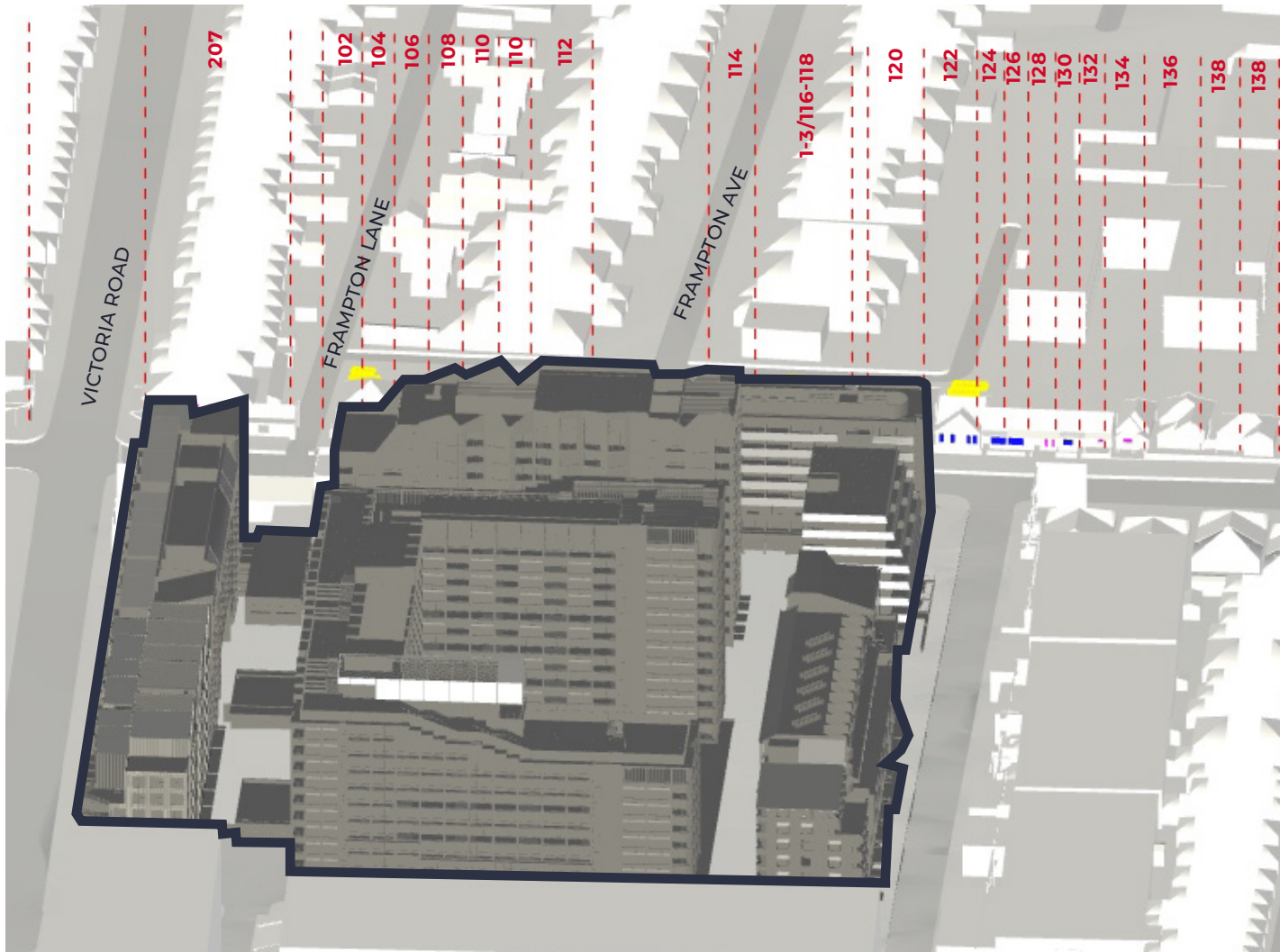
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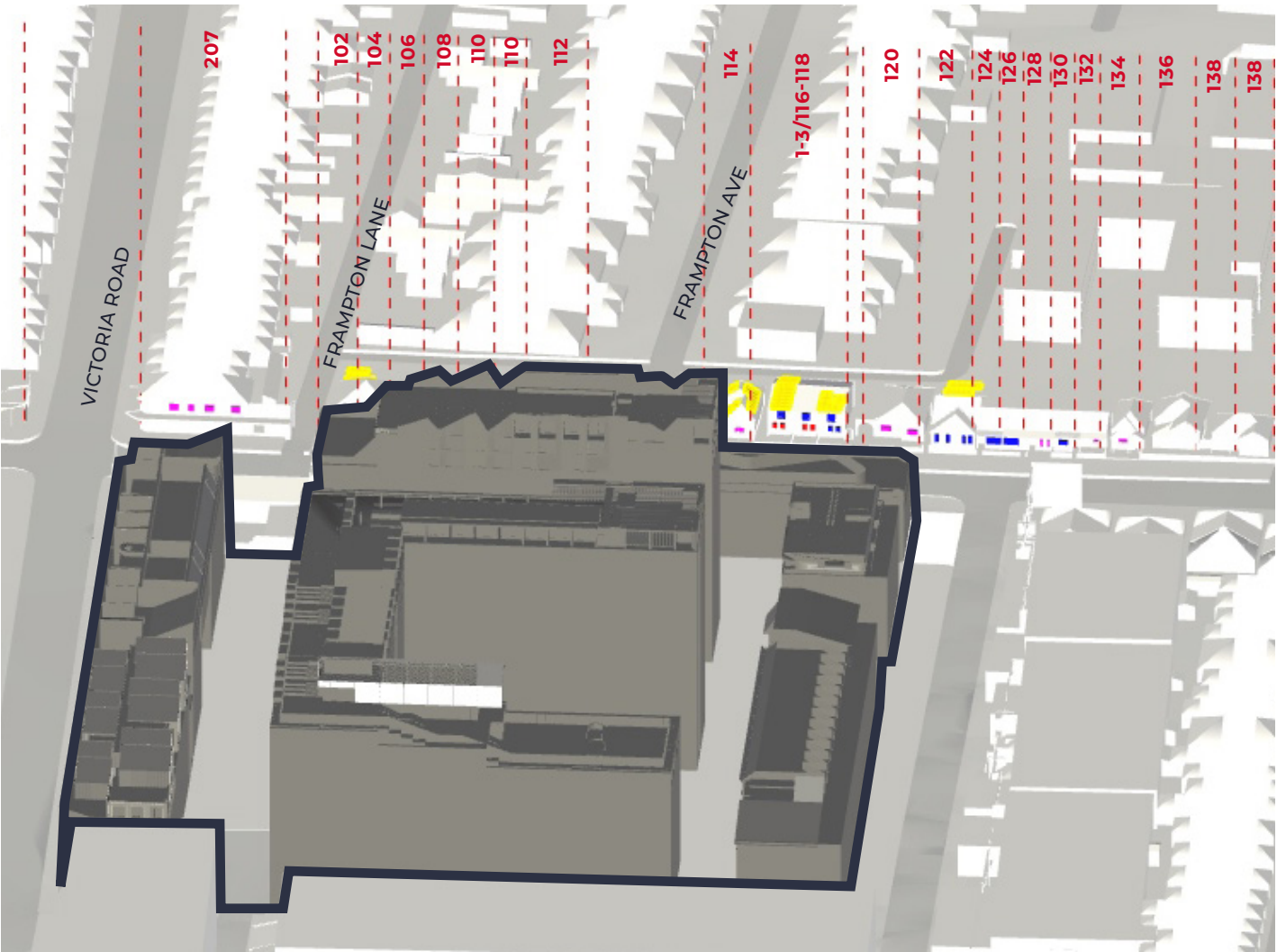
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- Solar Panels
 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
10.00am

Proposed Design



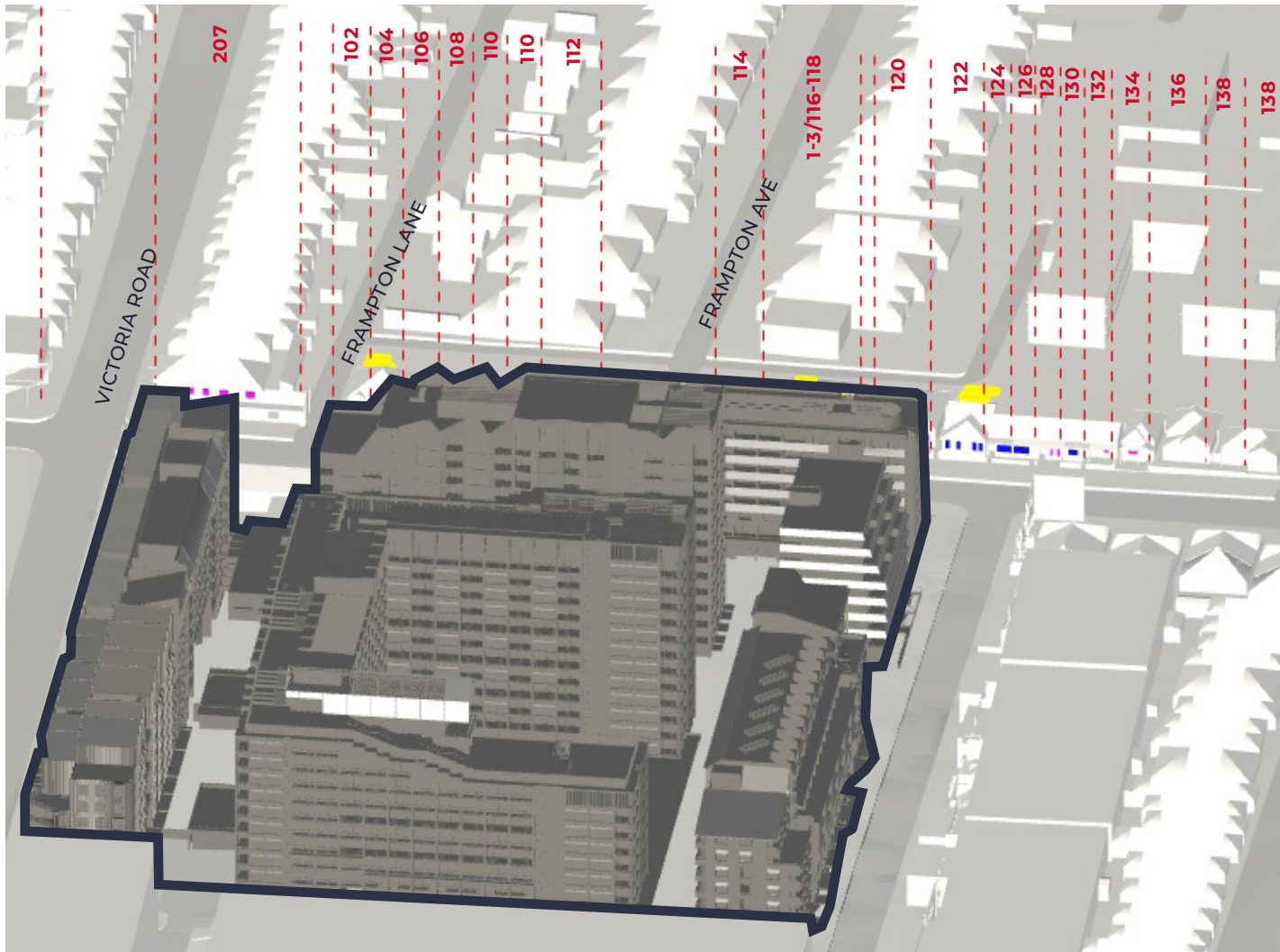
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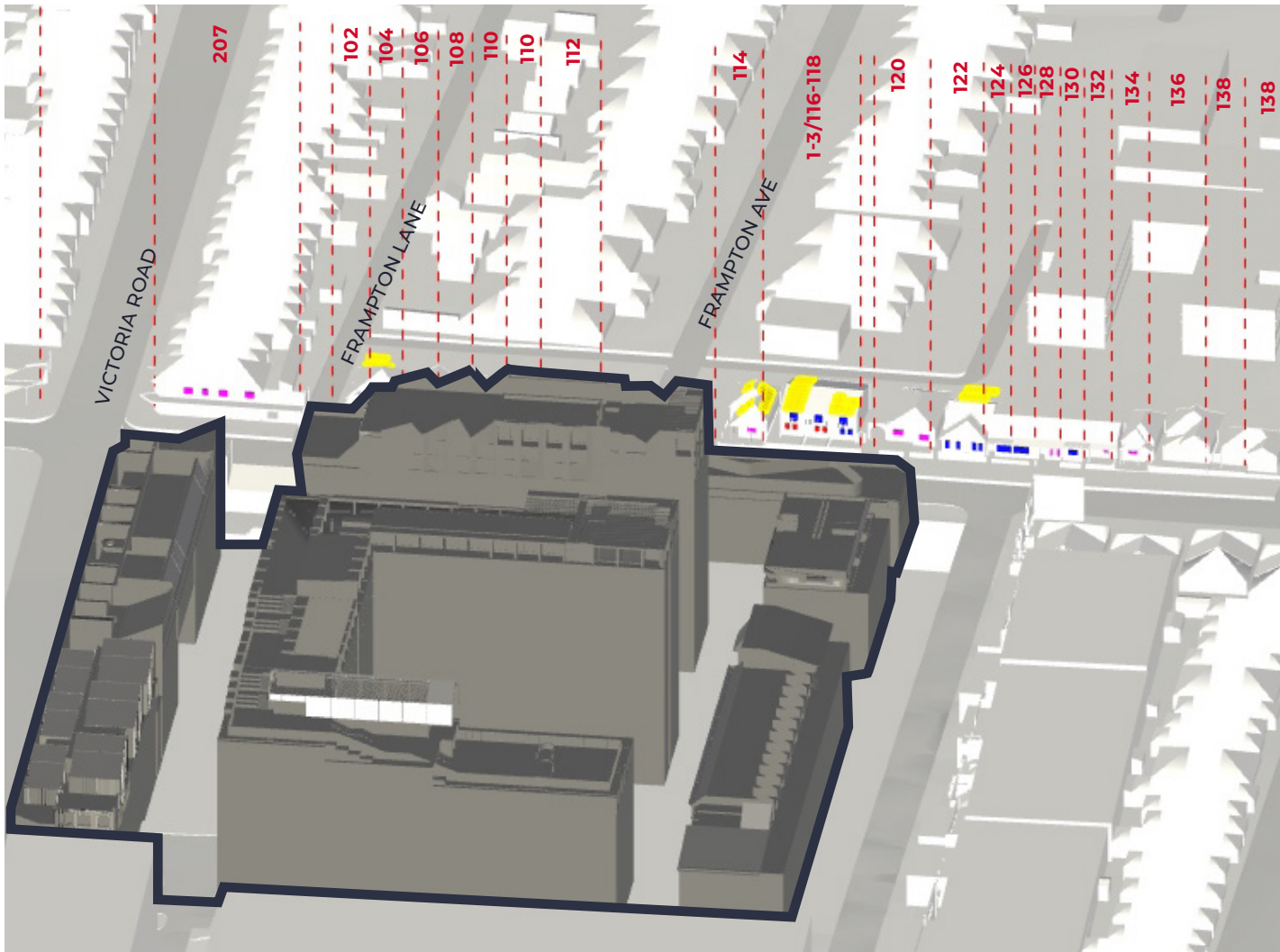
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- Solar Panels
 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
10.15am

Proposed Design



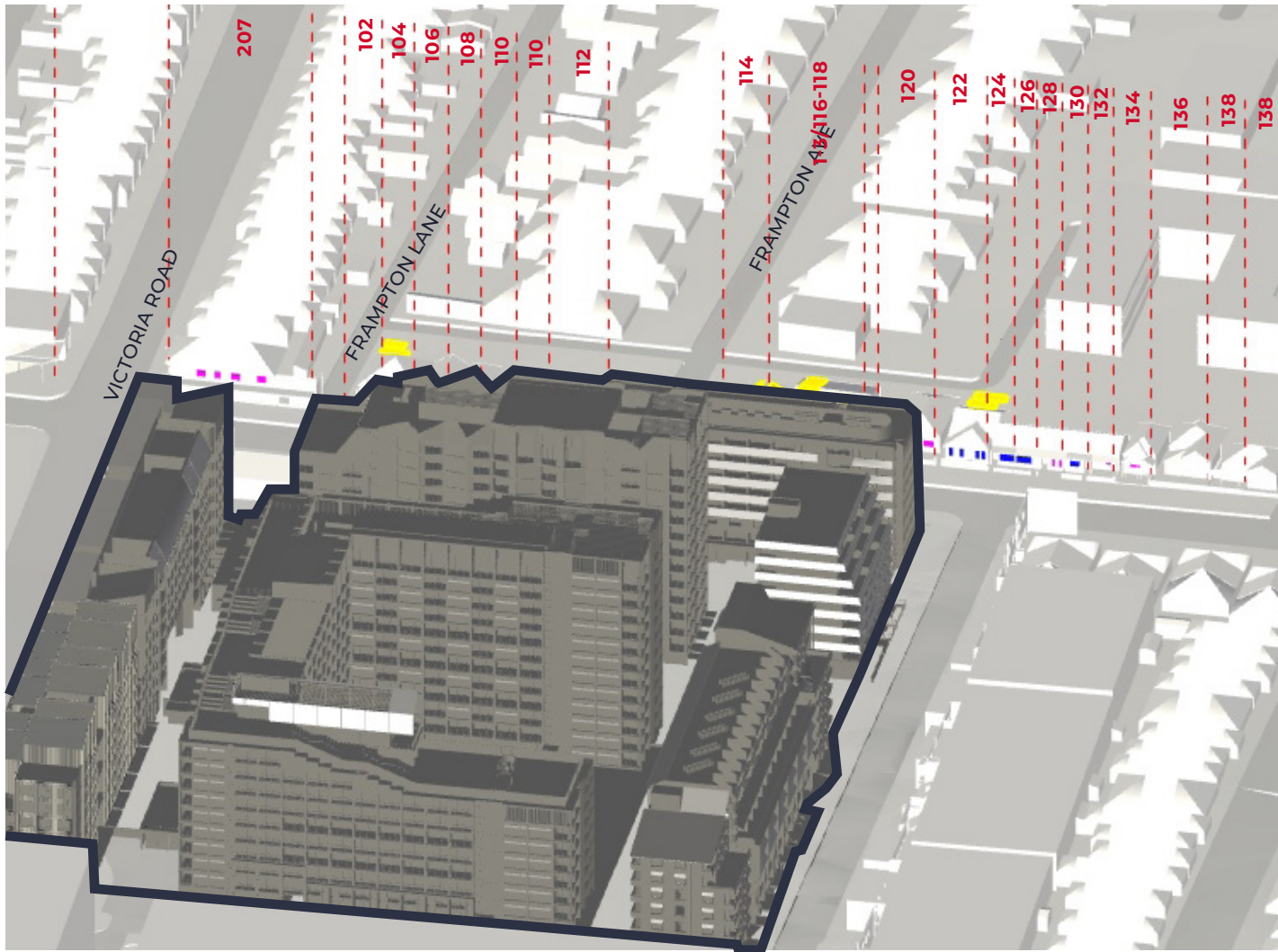
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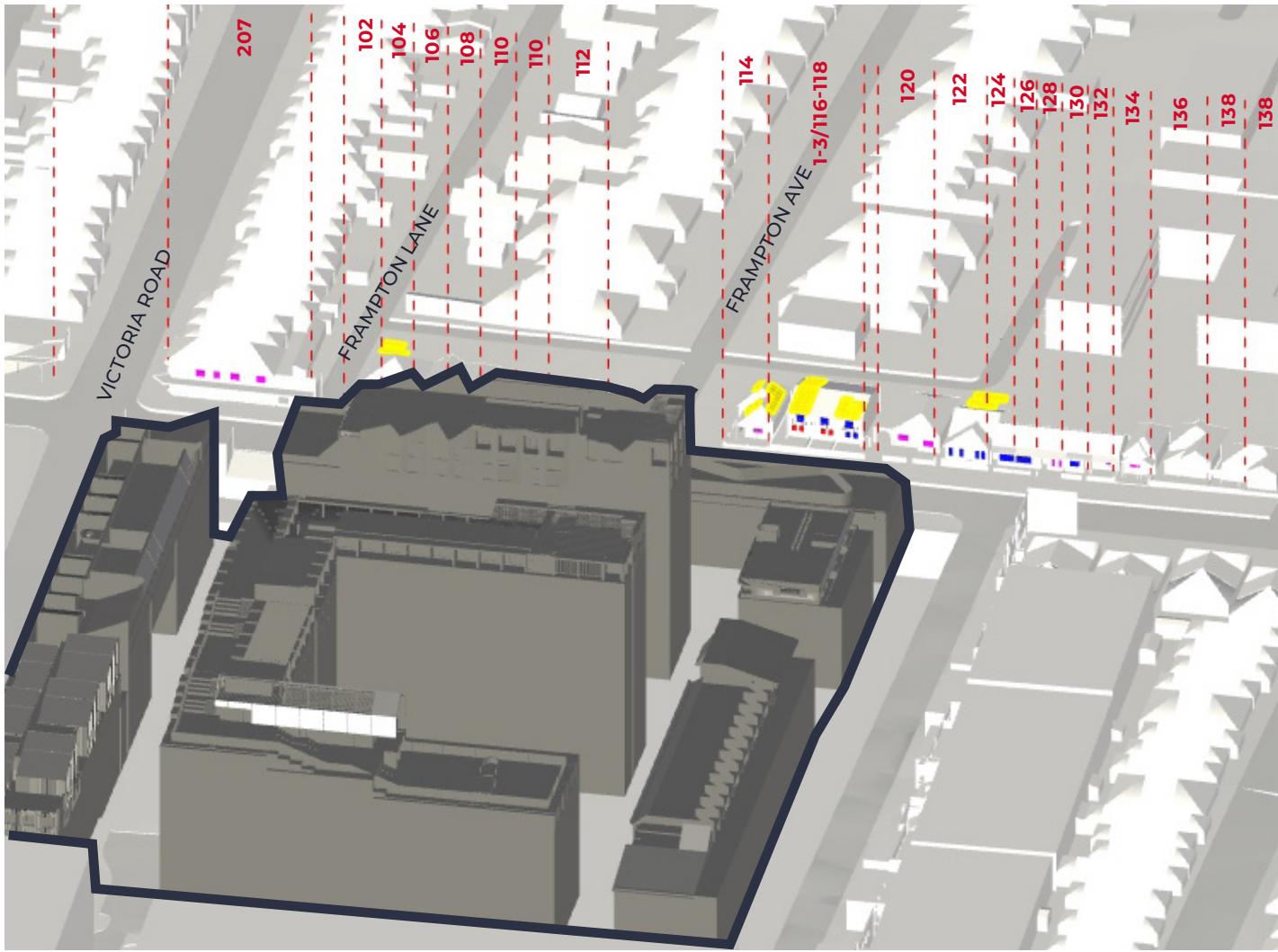
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- Solar Panels
 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
10.30am

Proposed Design



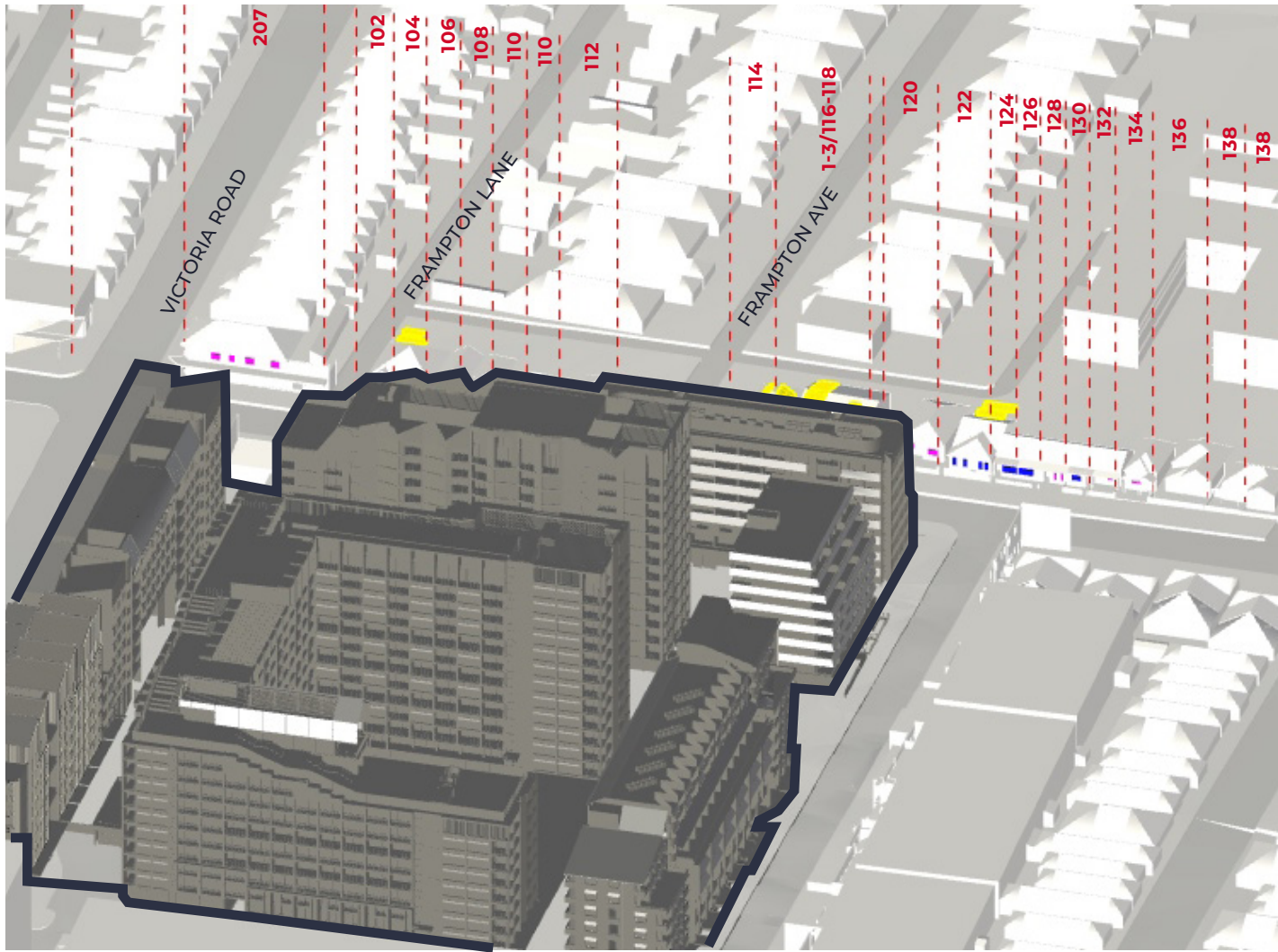
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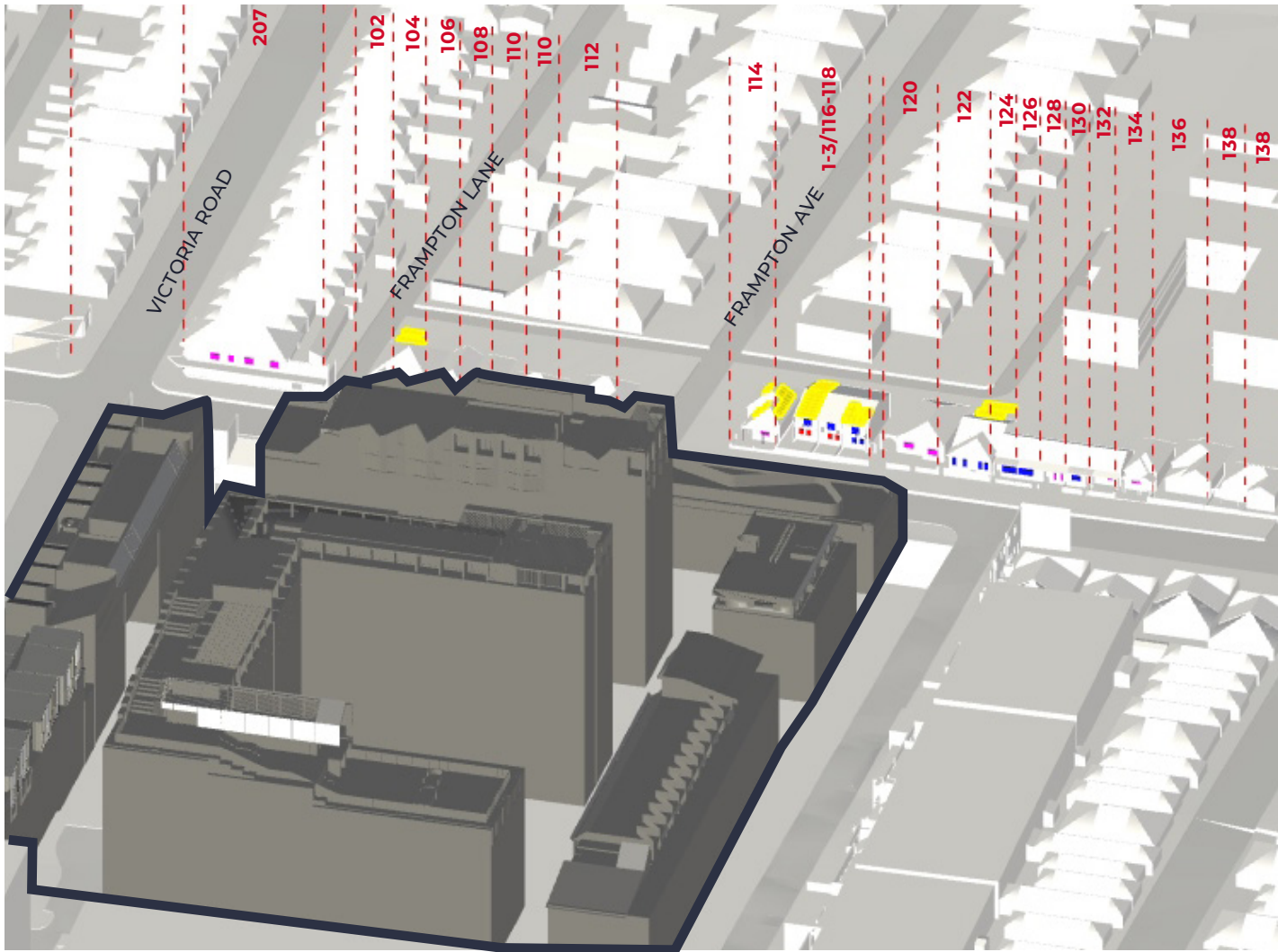
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- Solar Panels
 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
10.45am

Proposed Design



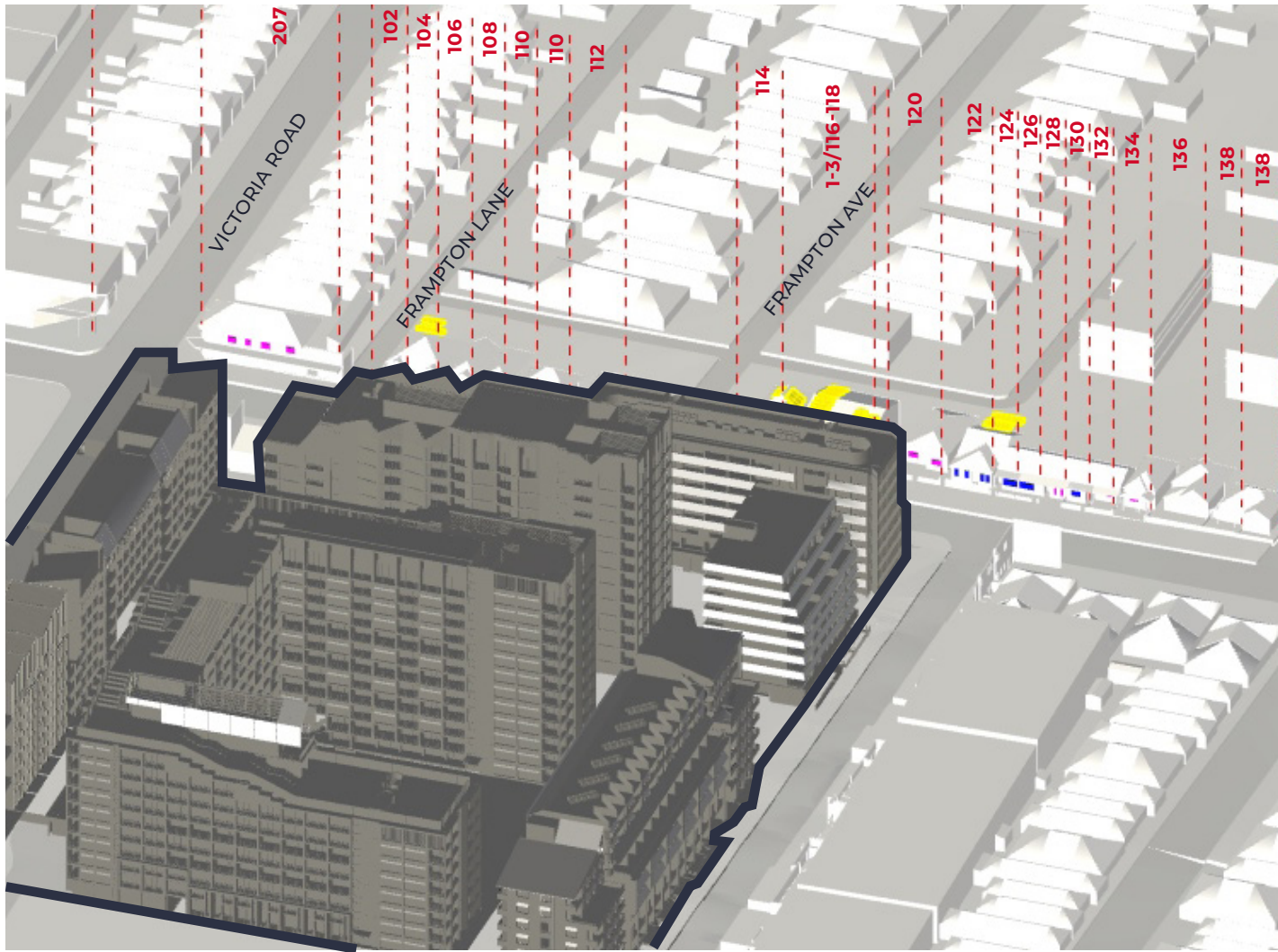
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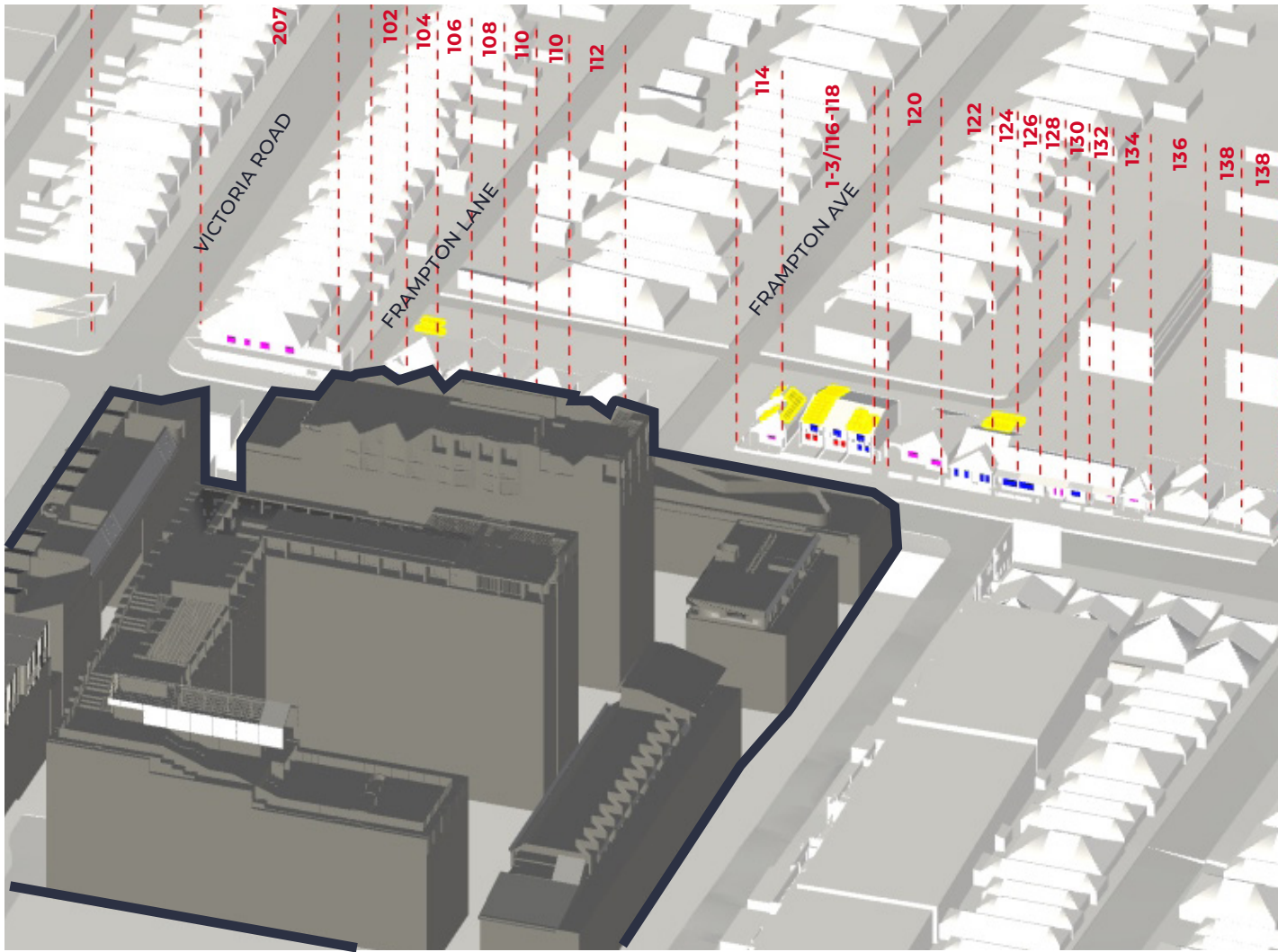
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 - Bedroom
 - Living Room

21 June
11.00am

Proposed Design



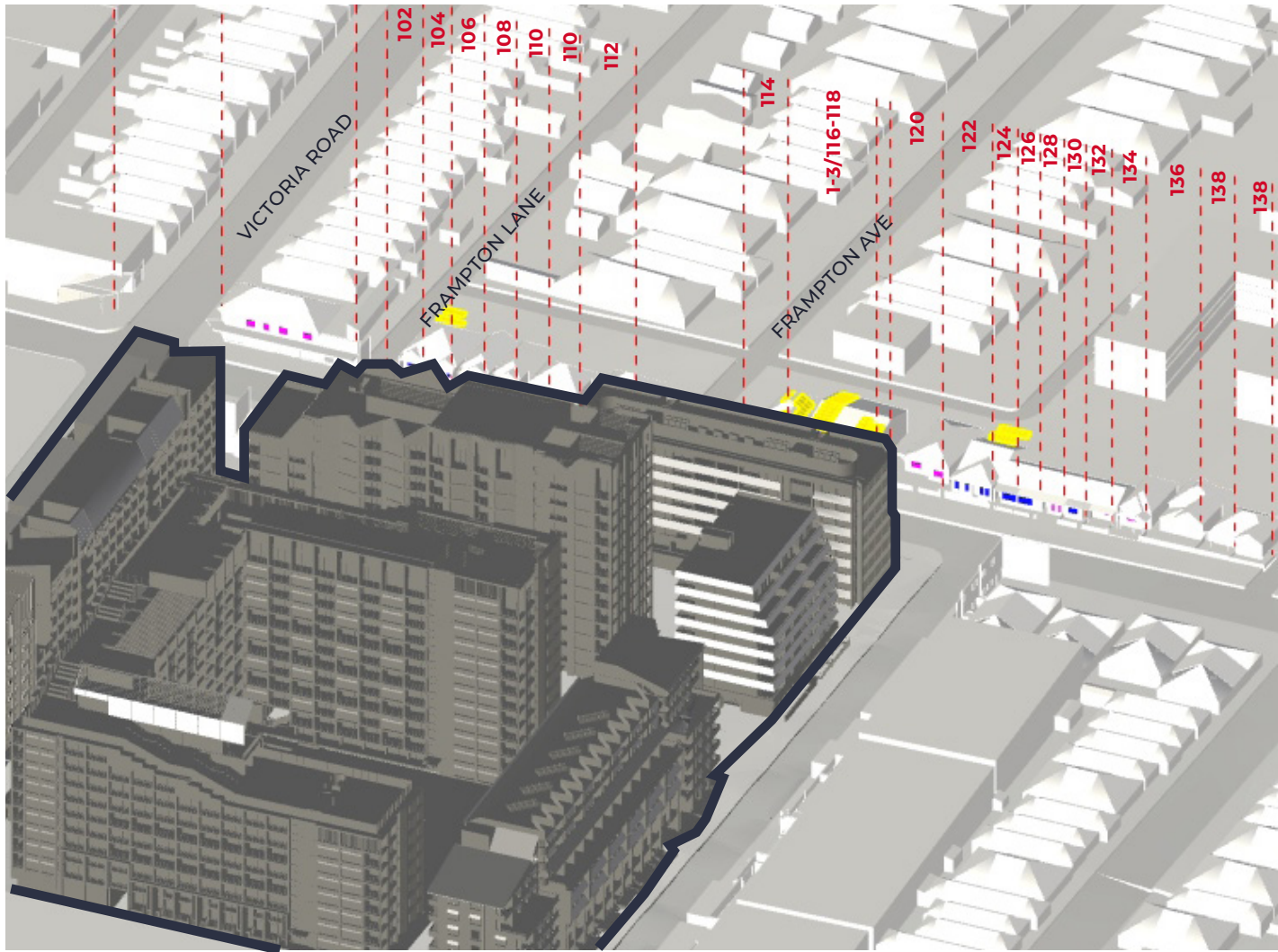
Compliant Height Scheme



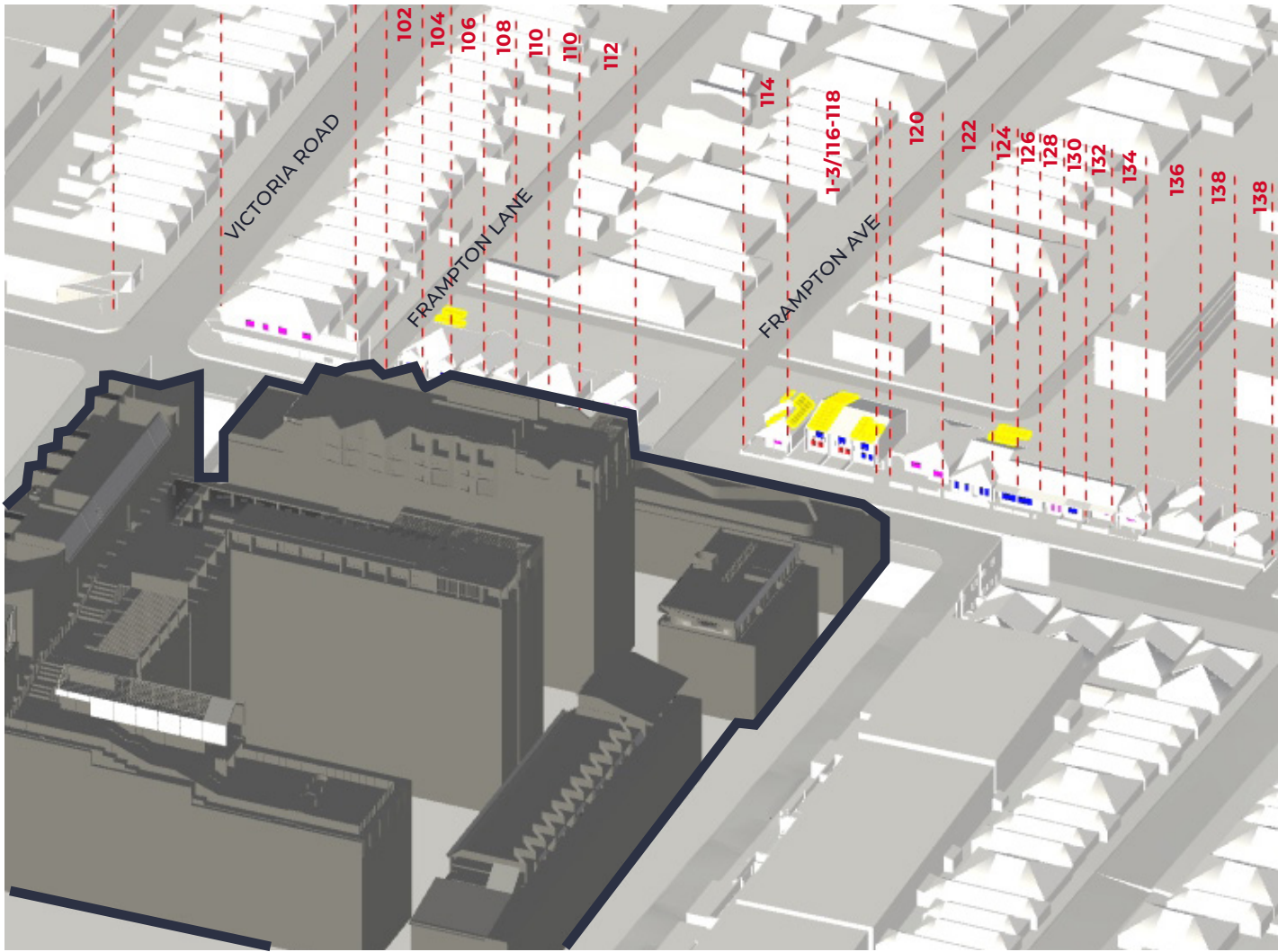
- LEGEND**
- Solar Panels
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- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
11.15am

Proposed Design



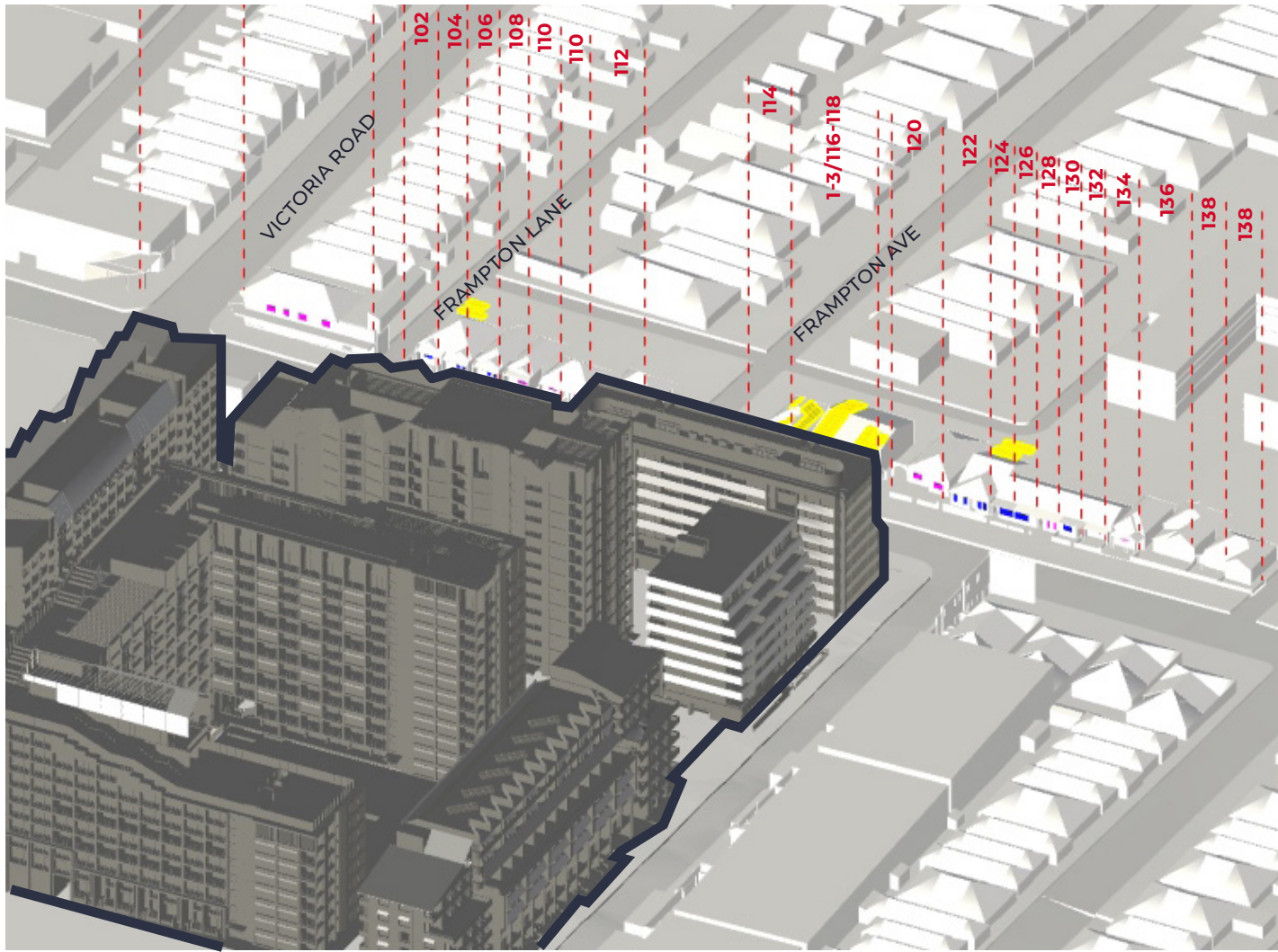
Compliant Height Scheme



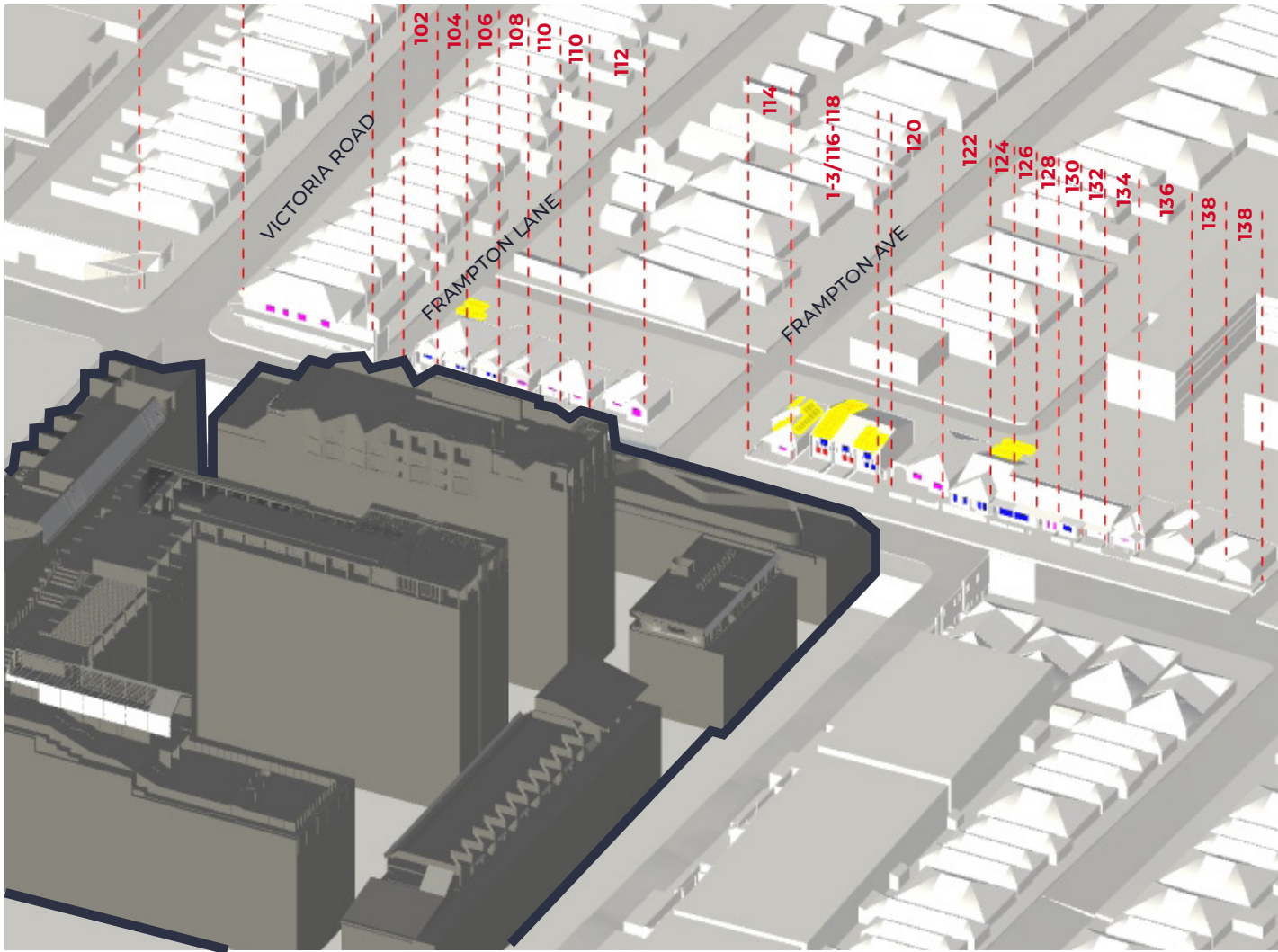
- LEGEND**
- Solar Panels
 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
11.30am

Proposed Design



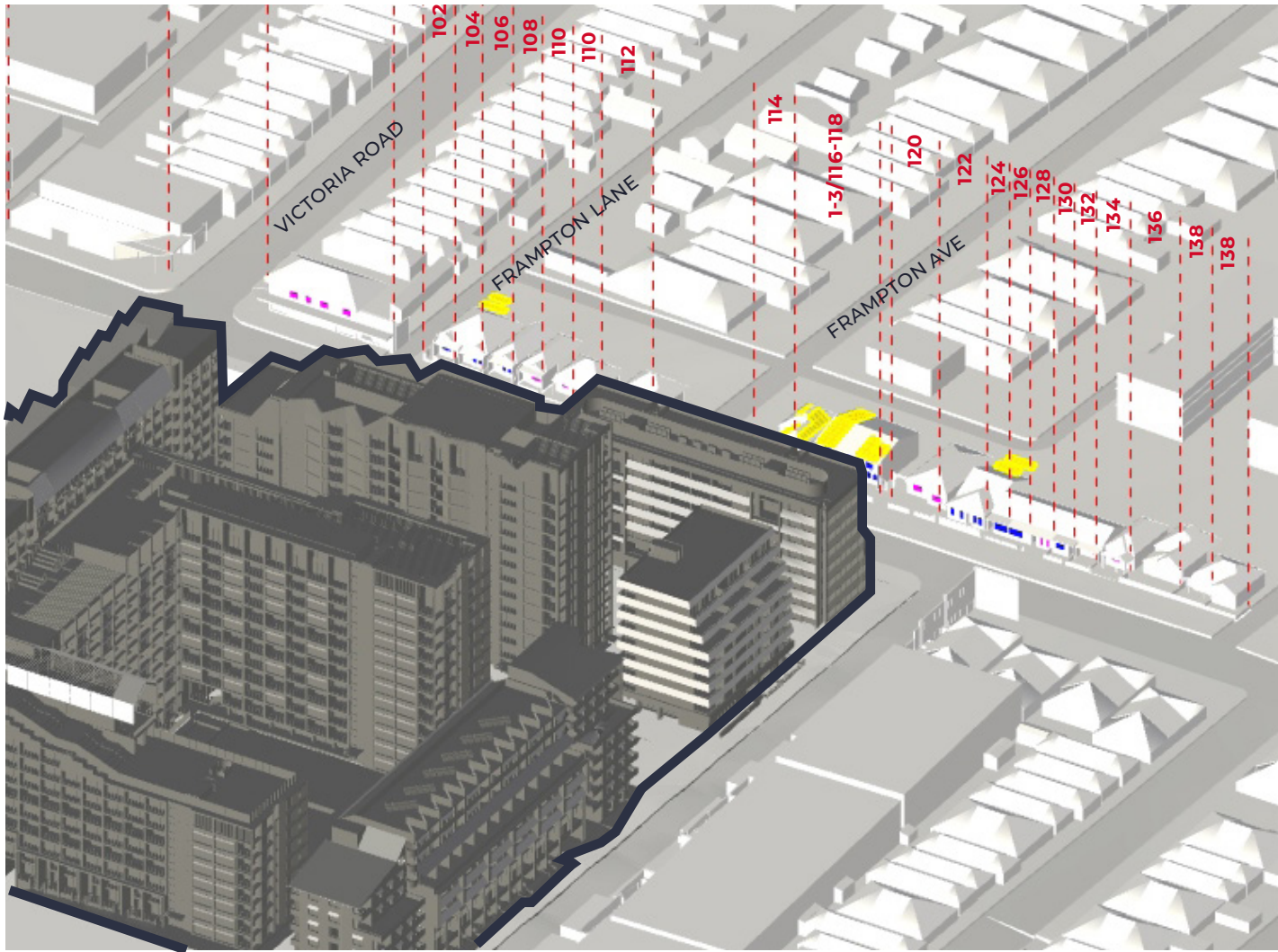
Compliant Height Scheme



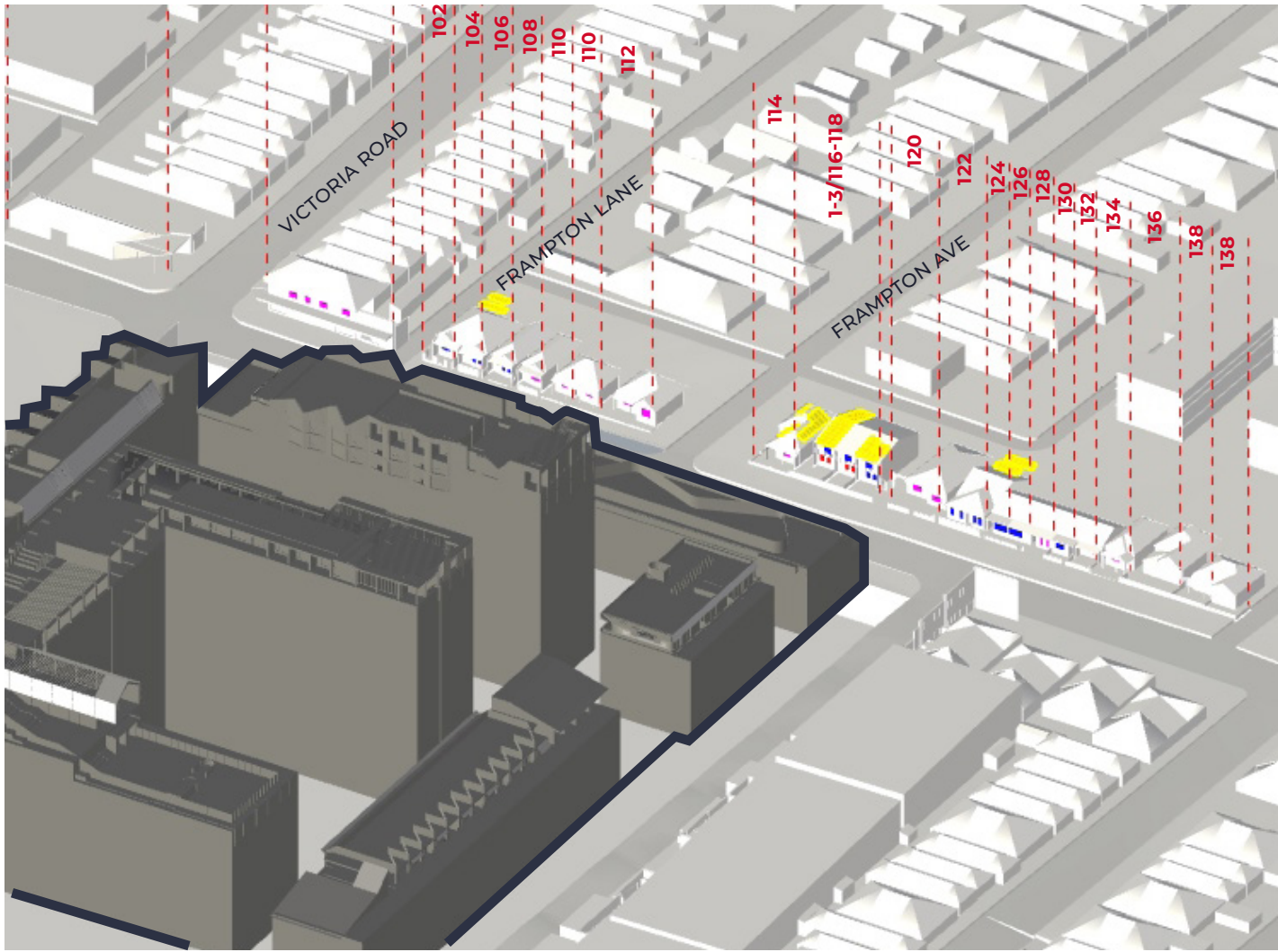
- LEGEND**
- Solar Panels
 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
11.45am

Proposed Design



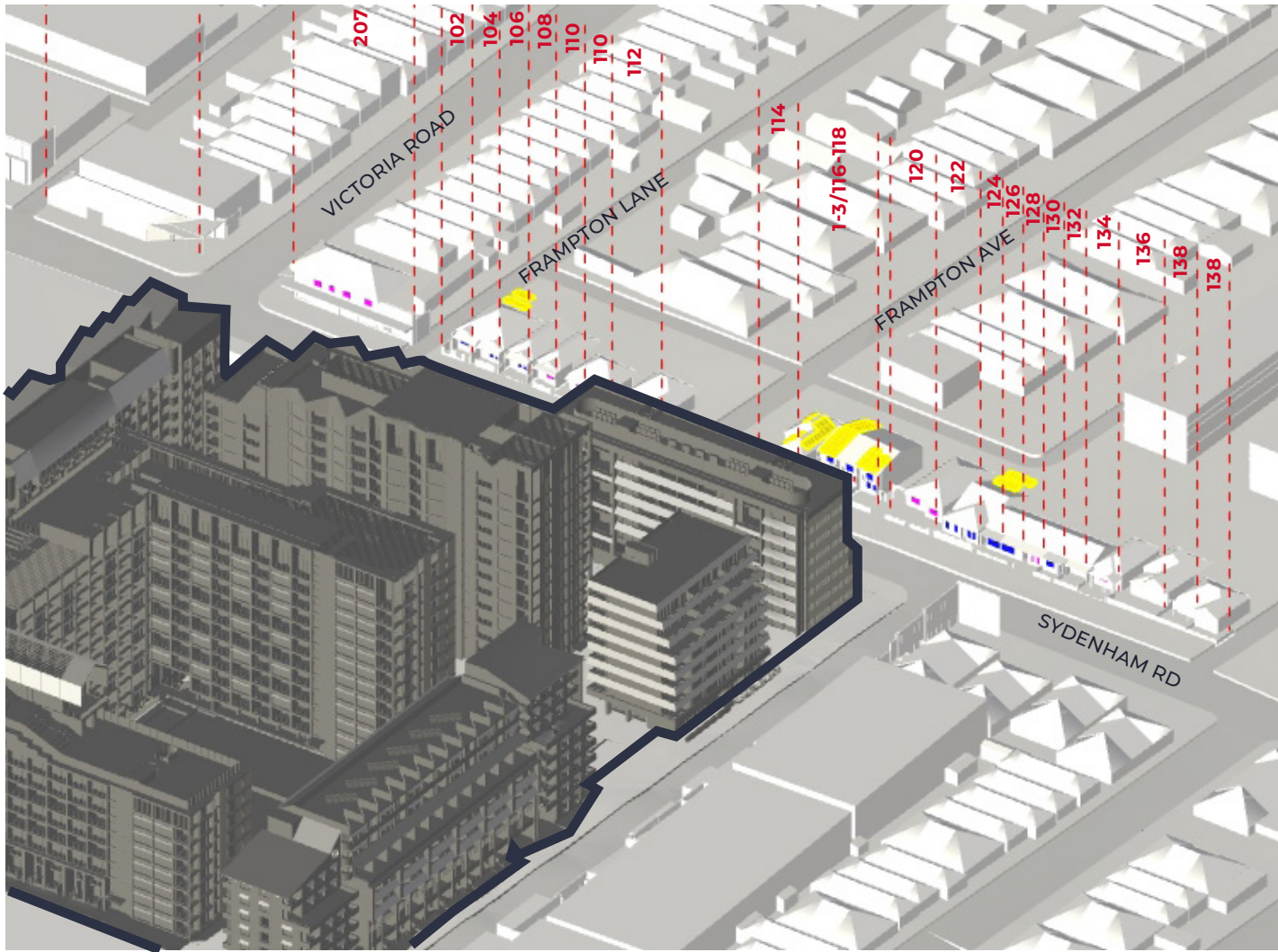
Compliant Height Scheme



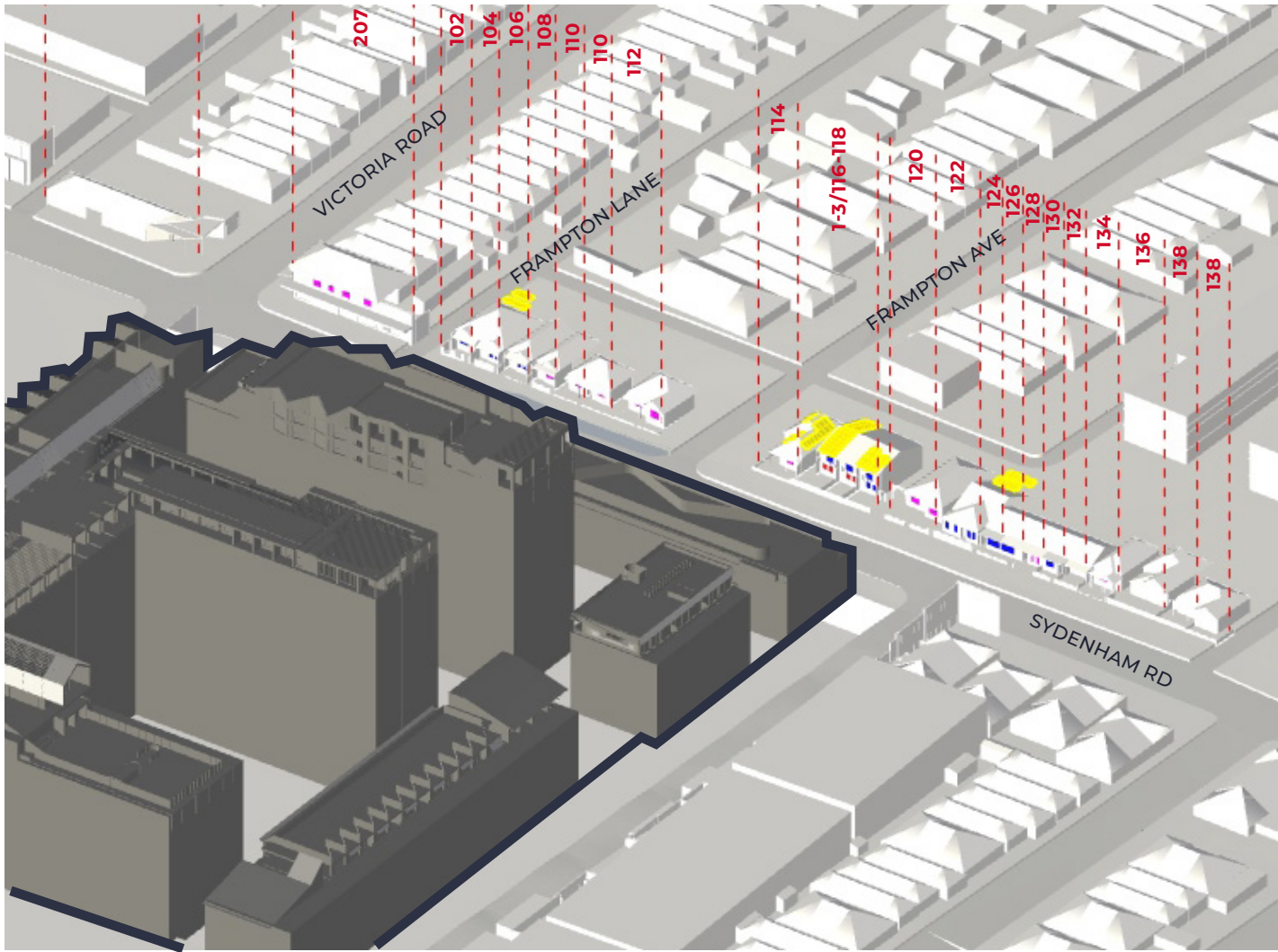
- LEGEND**
- Solar Panels
 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
12.00pm

Proposed Design



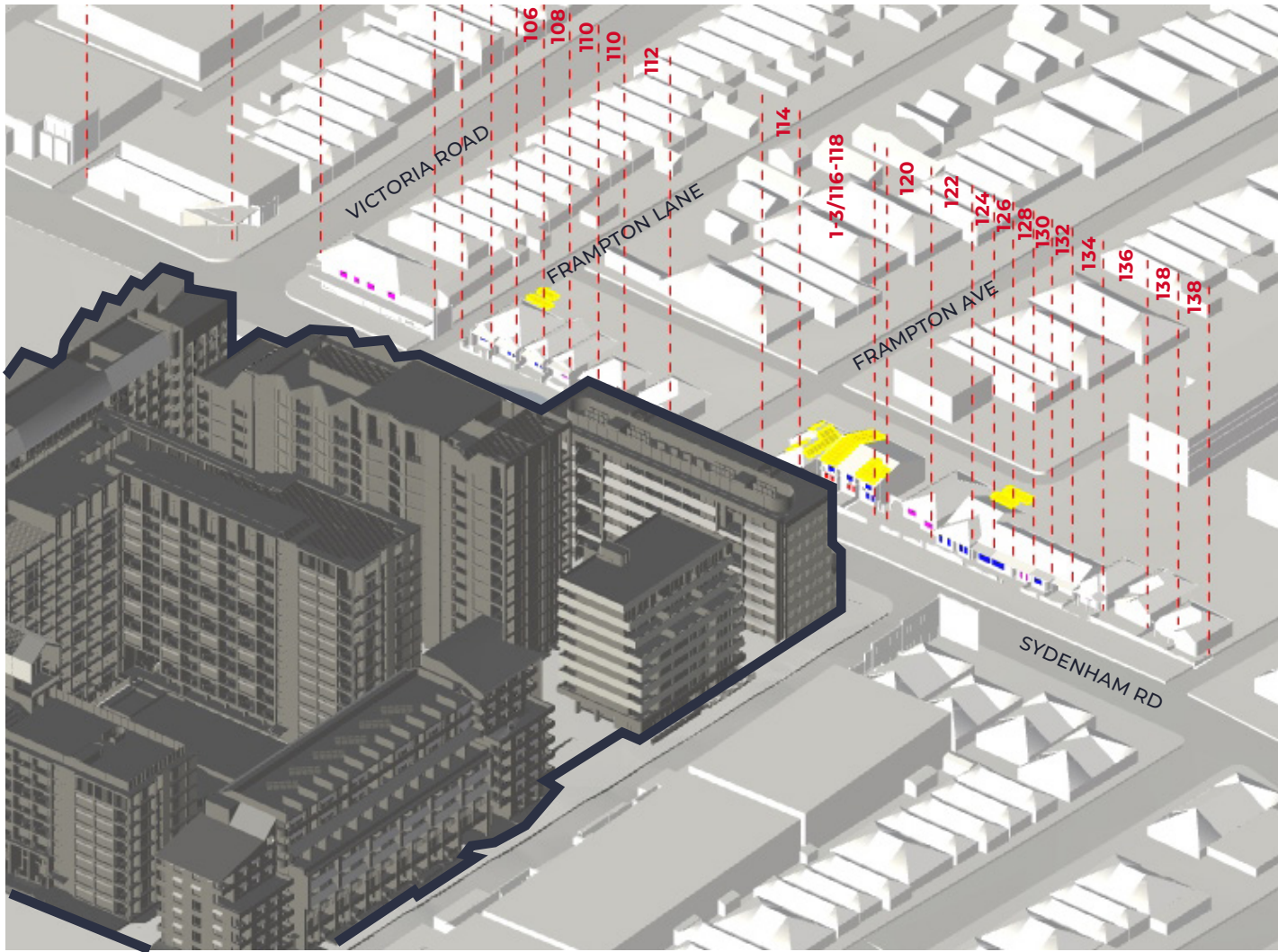
Compliant Height Scheme



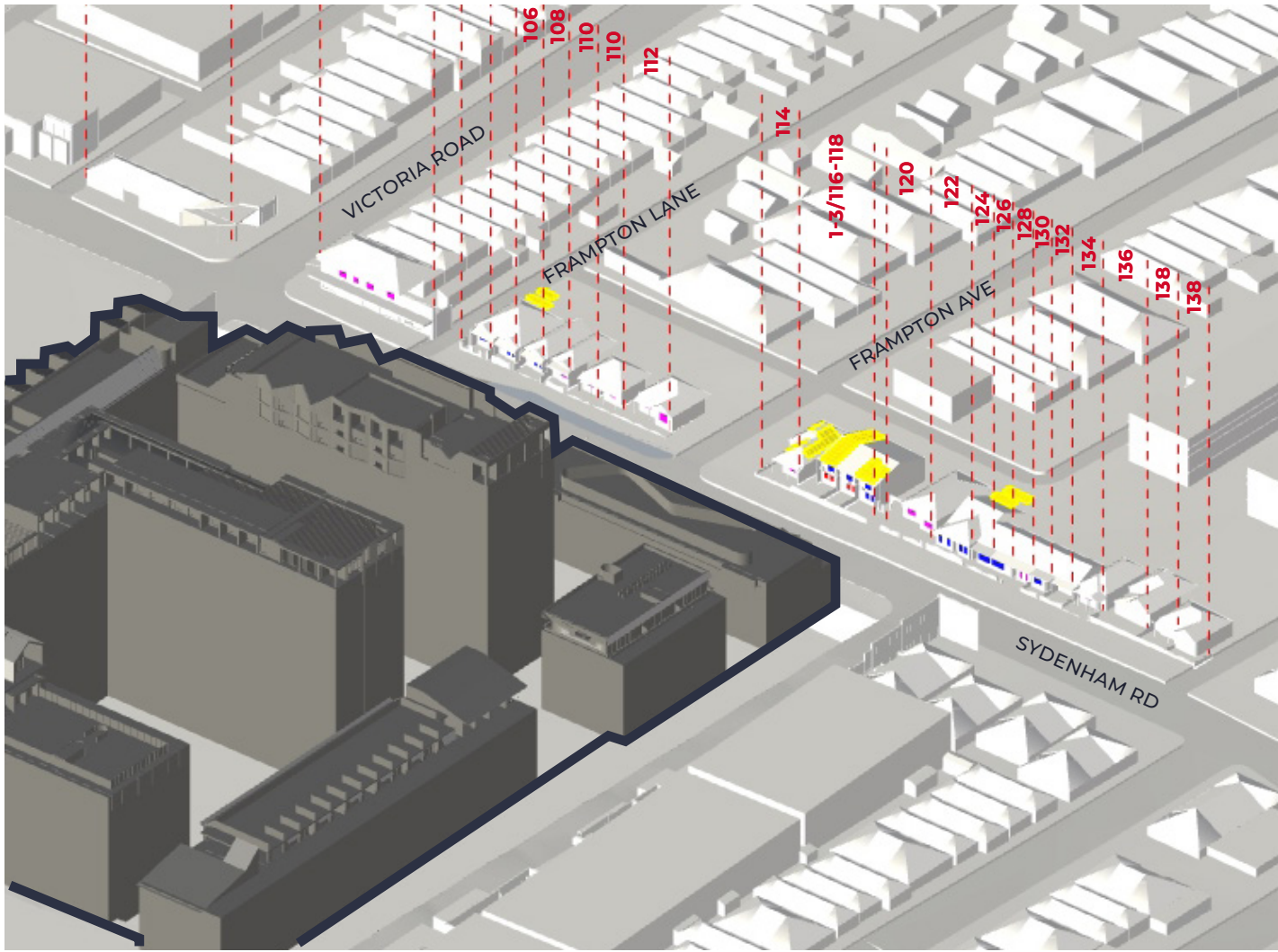
- LEGEND**
- Solar Panels
 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
12.15pm

Proposed Design



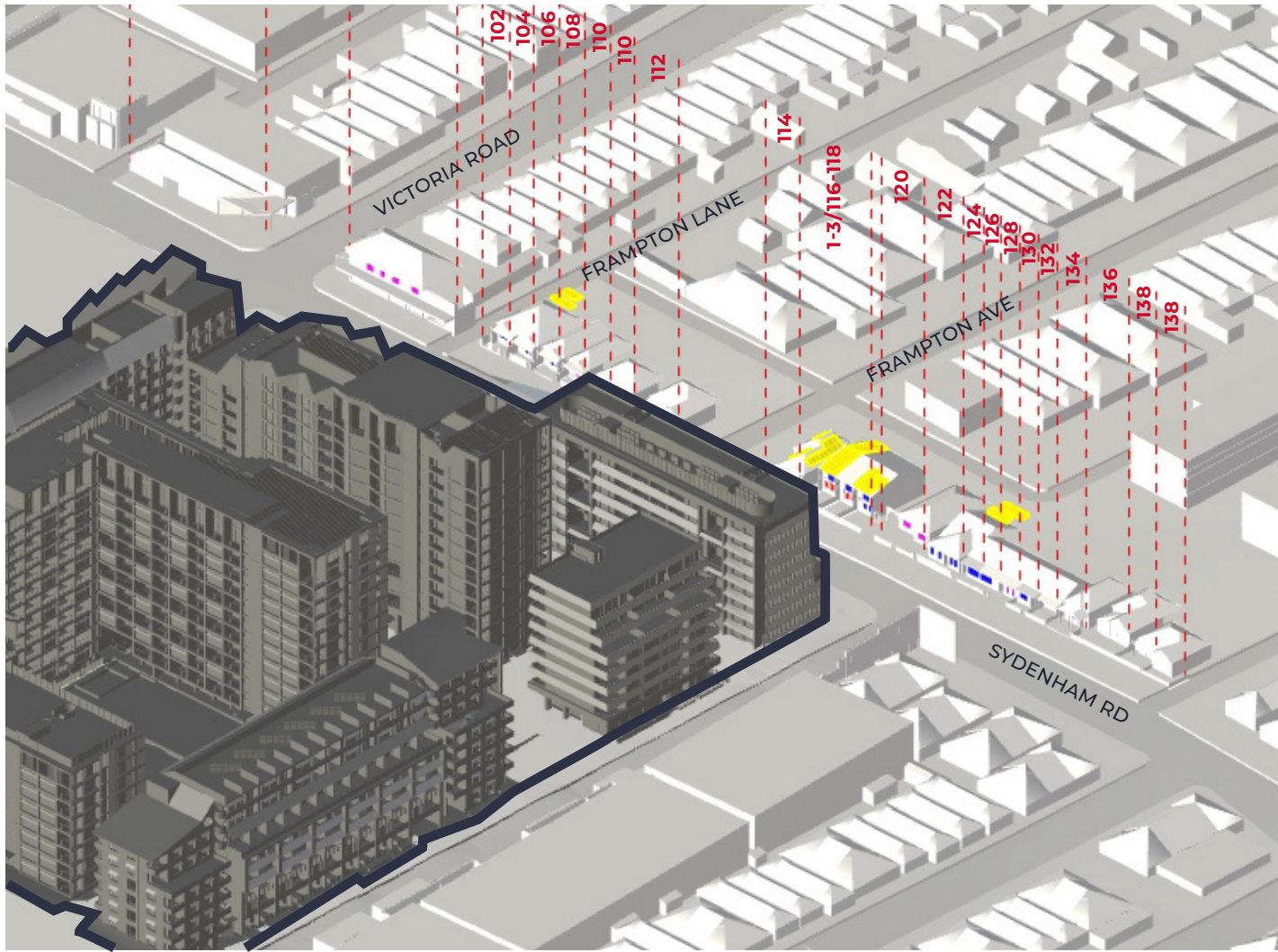
Compliant Height Scheme



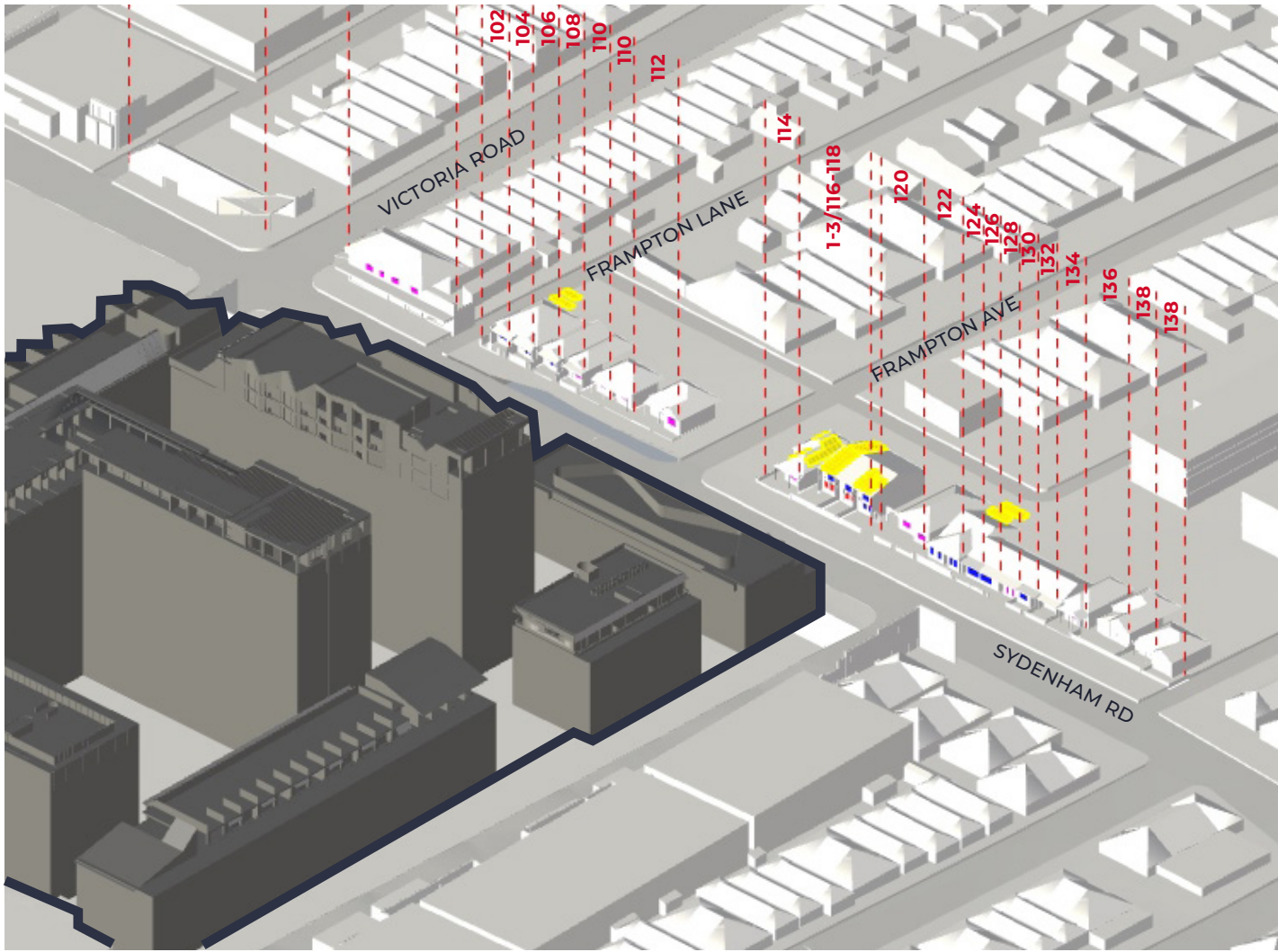
- LEGEND**
- Solar Panels
 - Cadastral Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
12.30pm

Proposed Design



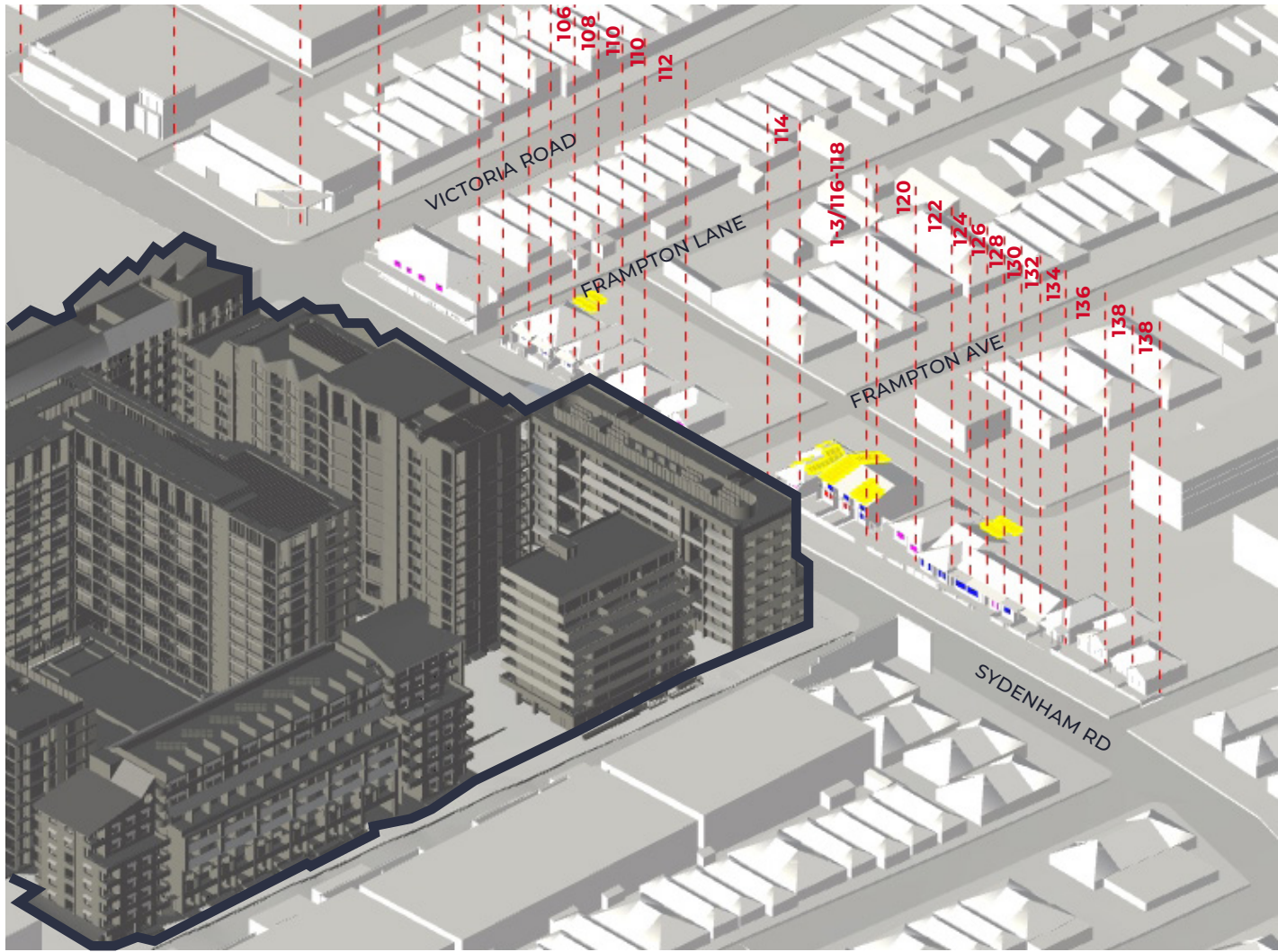
Compliant Height Scheme



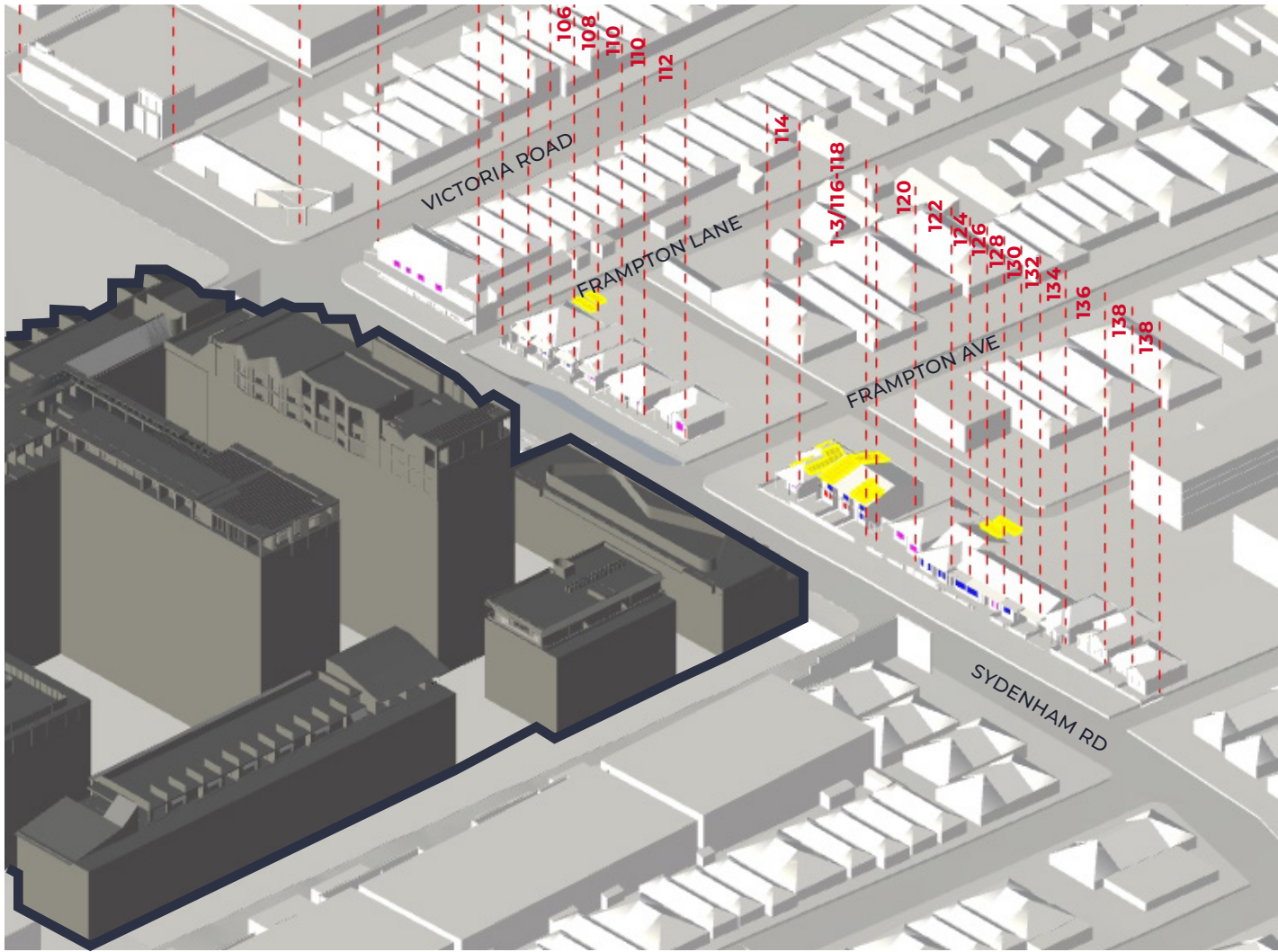
- LEGEND**
- Solar Panels
 - Cadastral Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
12.45pm

Proposed Design



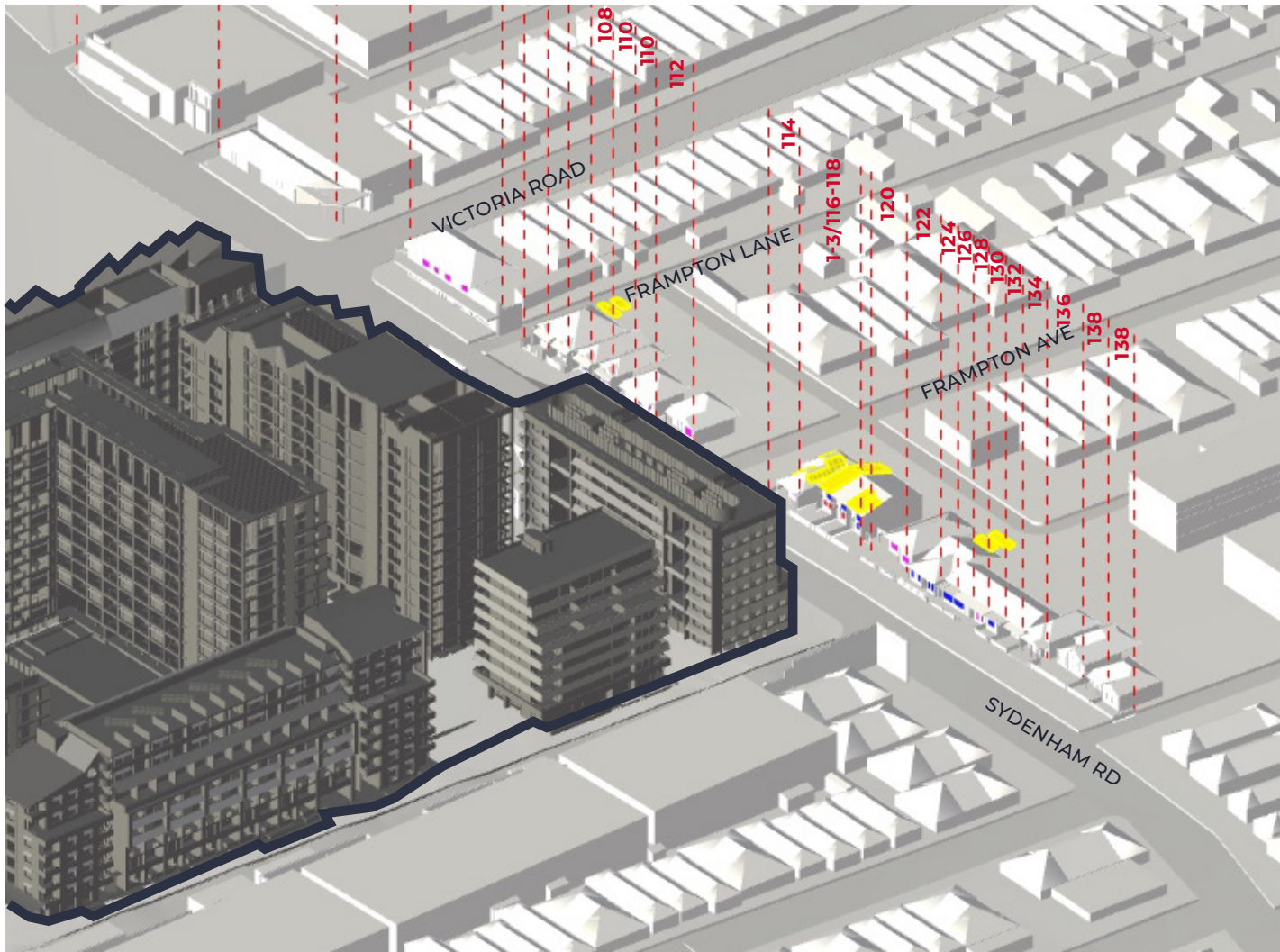
Compliant Height Scheme



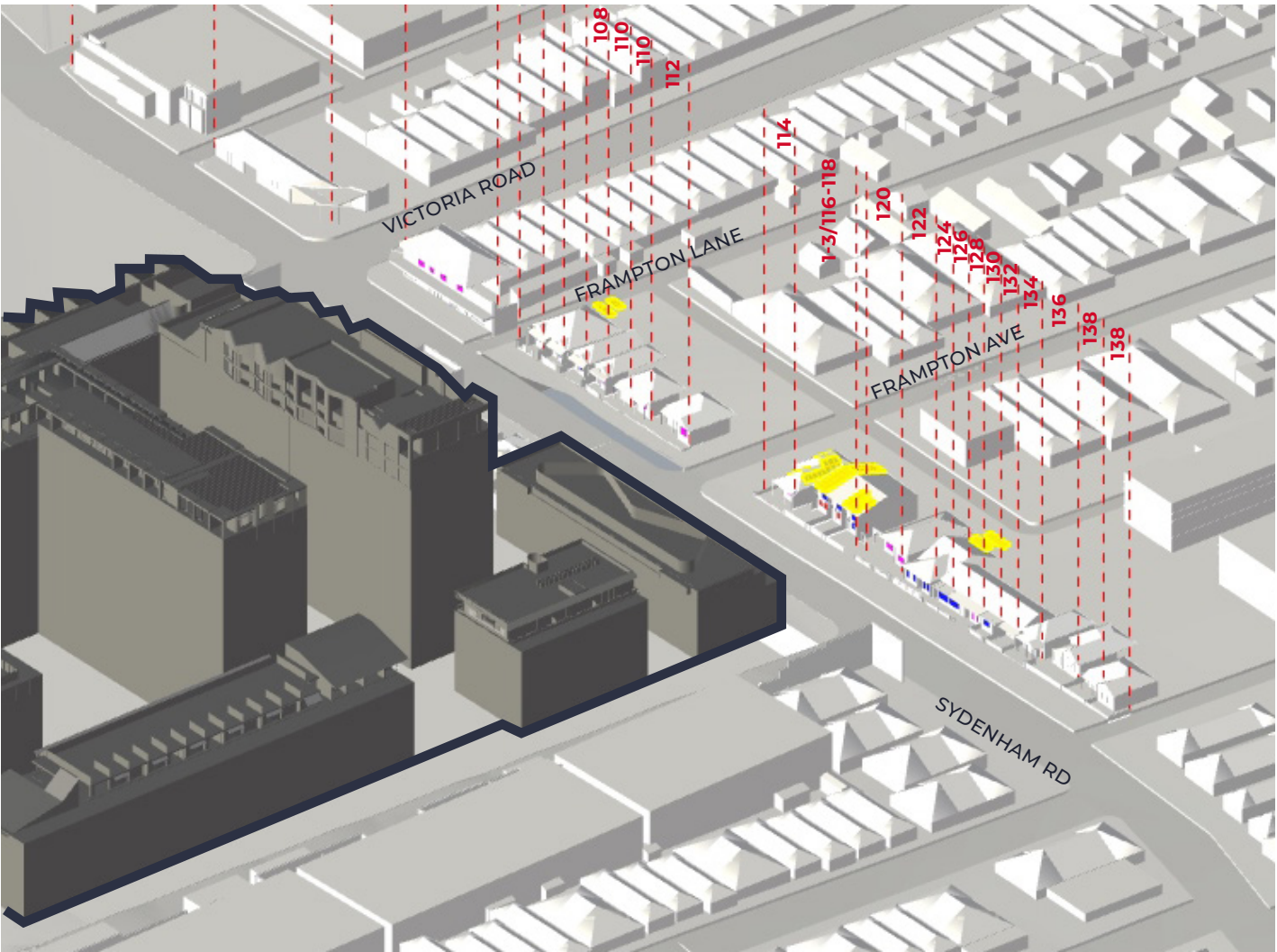
- LEGEND**
- Solar Panels
 - Cadastral Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
1.00pm

Proposed Design



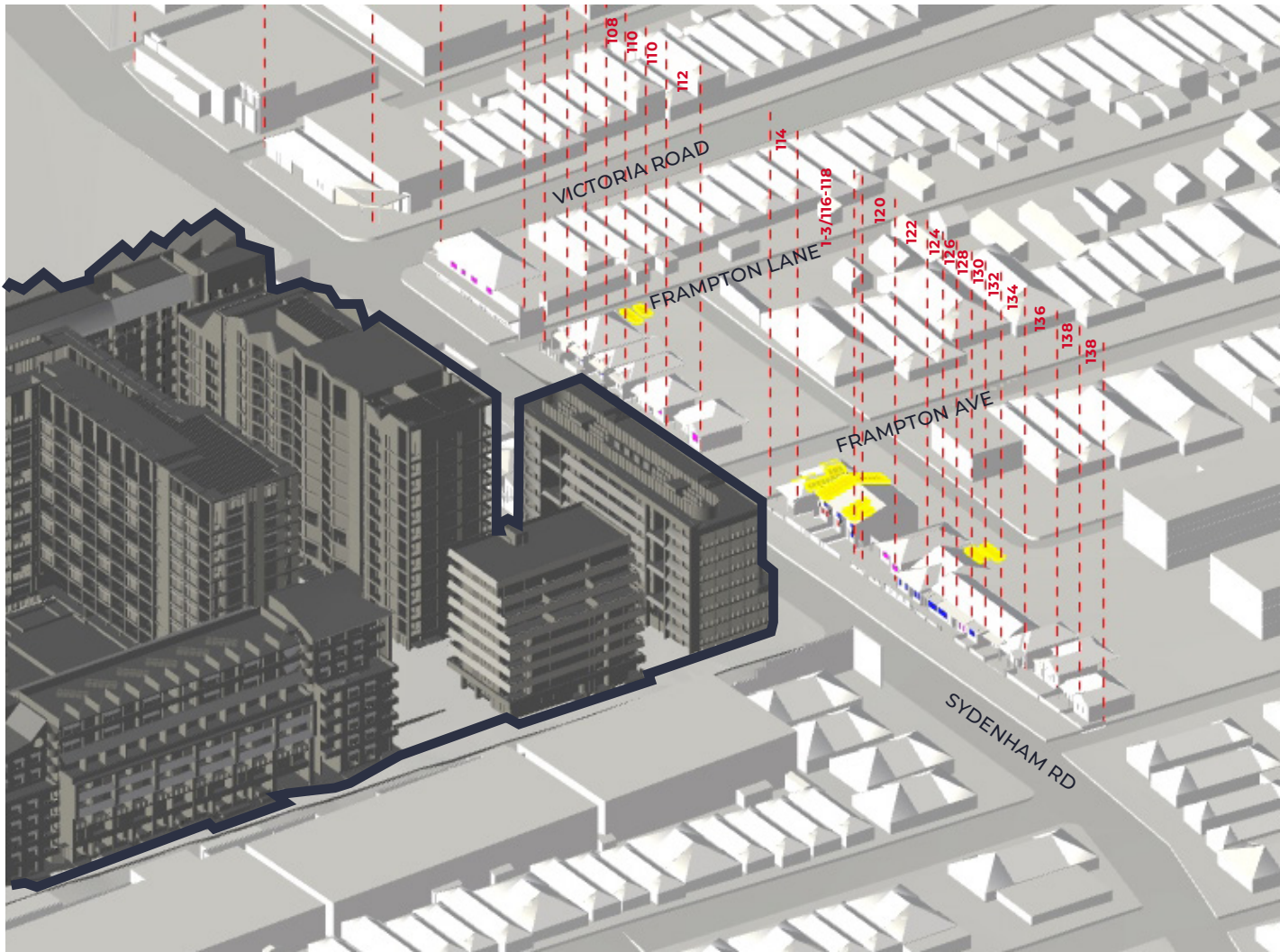
Compliant Height Scheme



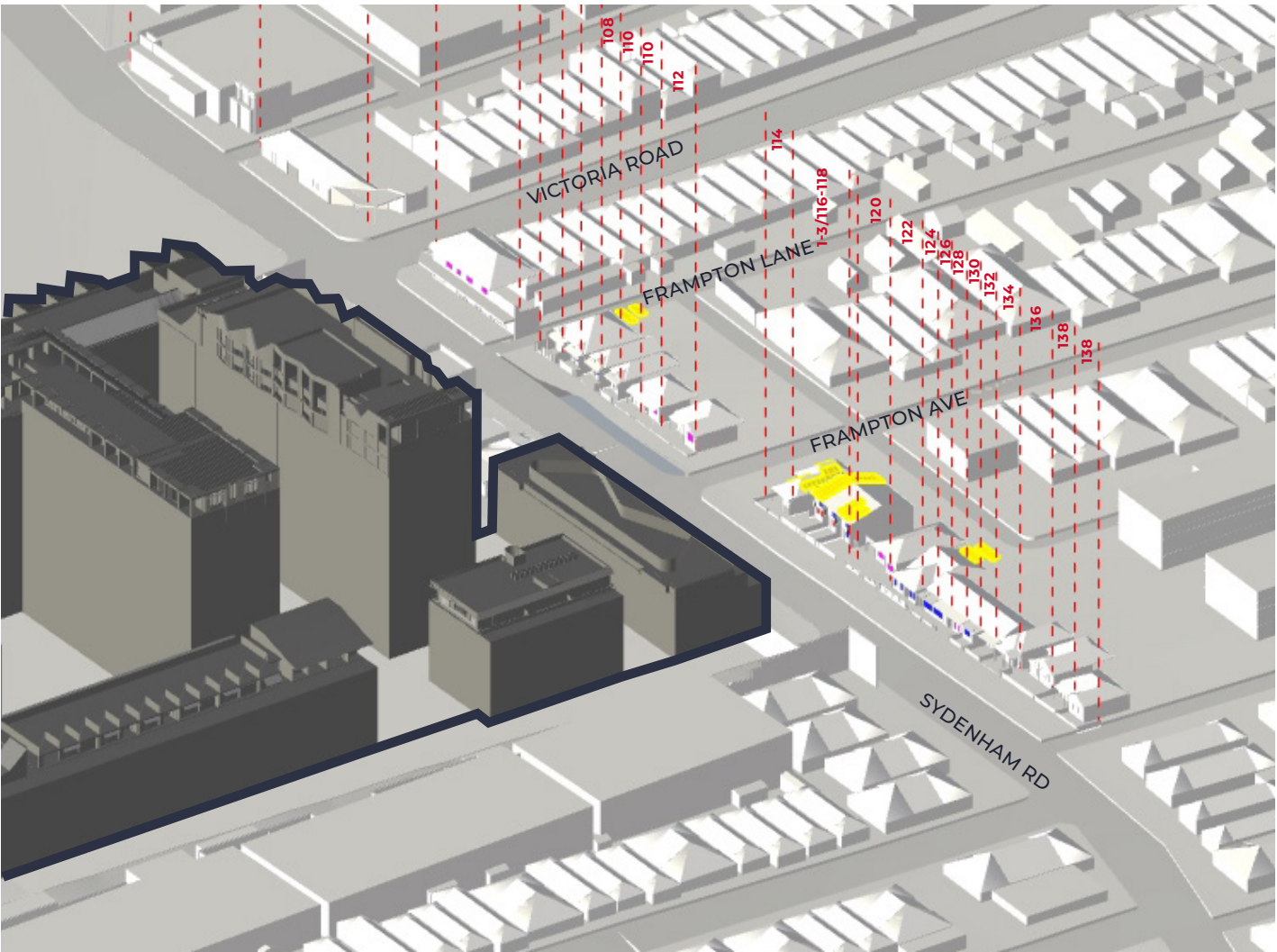
- LEGEND**
- Solar Panels
 - Cadastral Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
1.15pm

Proposed Design



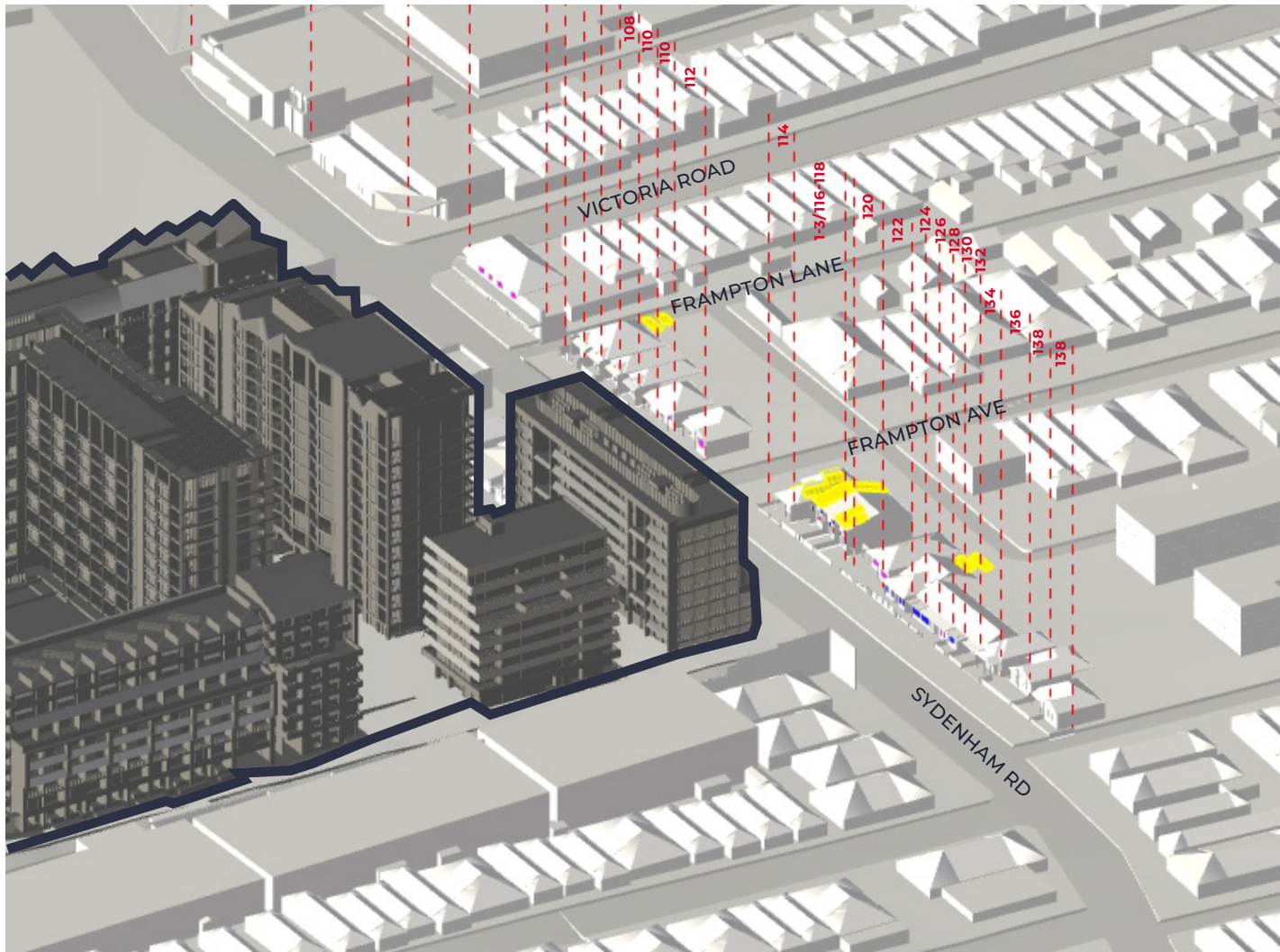
Compliant Height Scheme



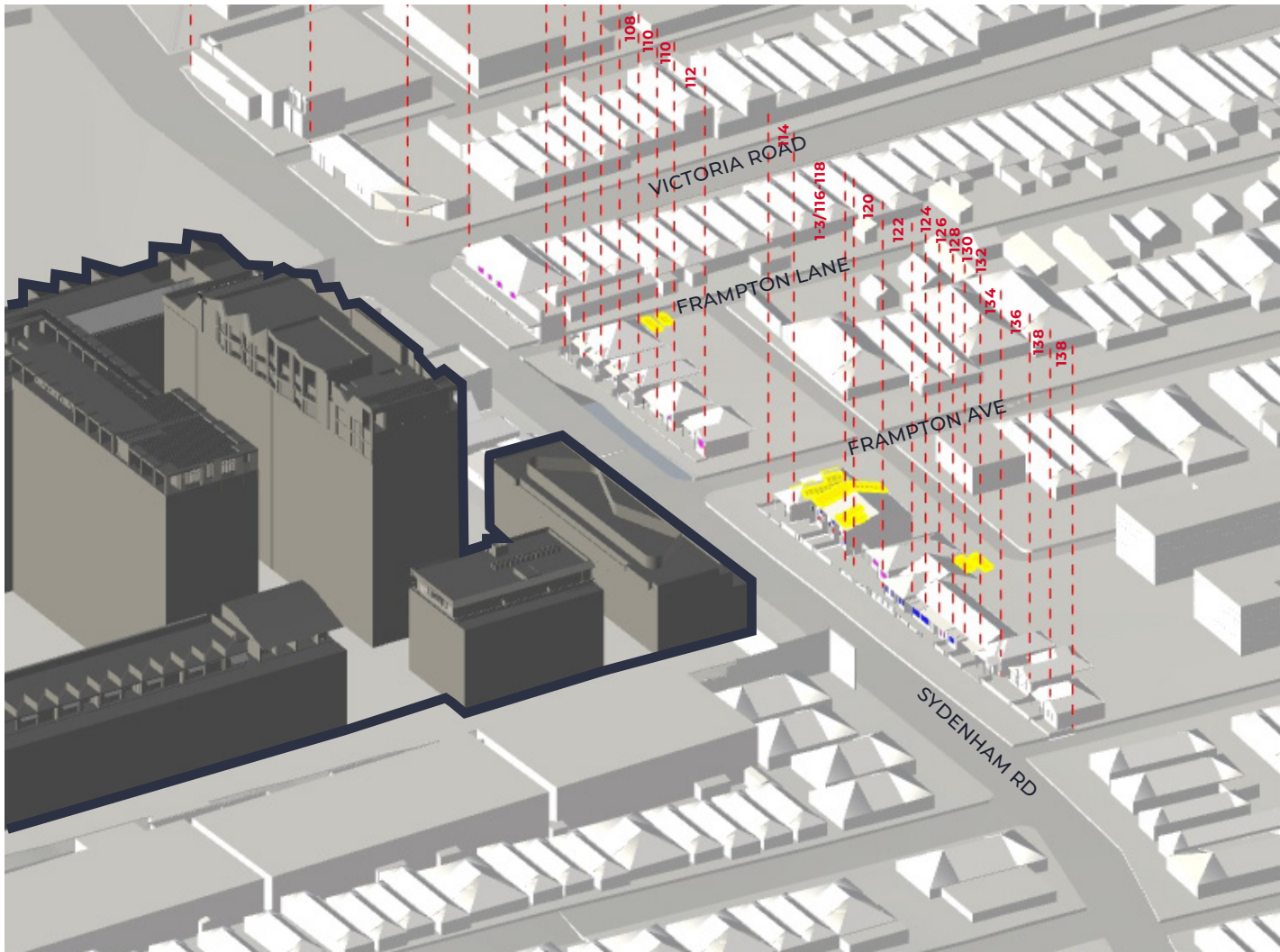
- LEGEND**
- Solar Panels
 - Cadastral Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
1.30pm

Proposed Design



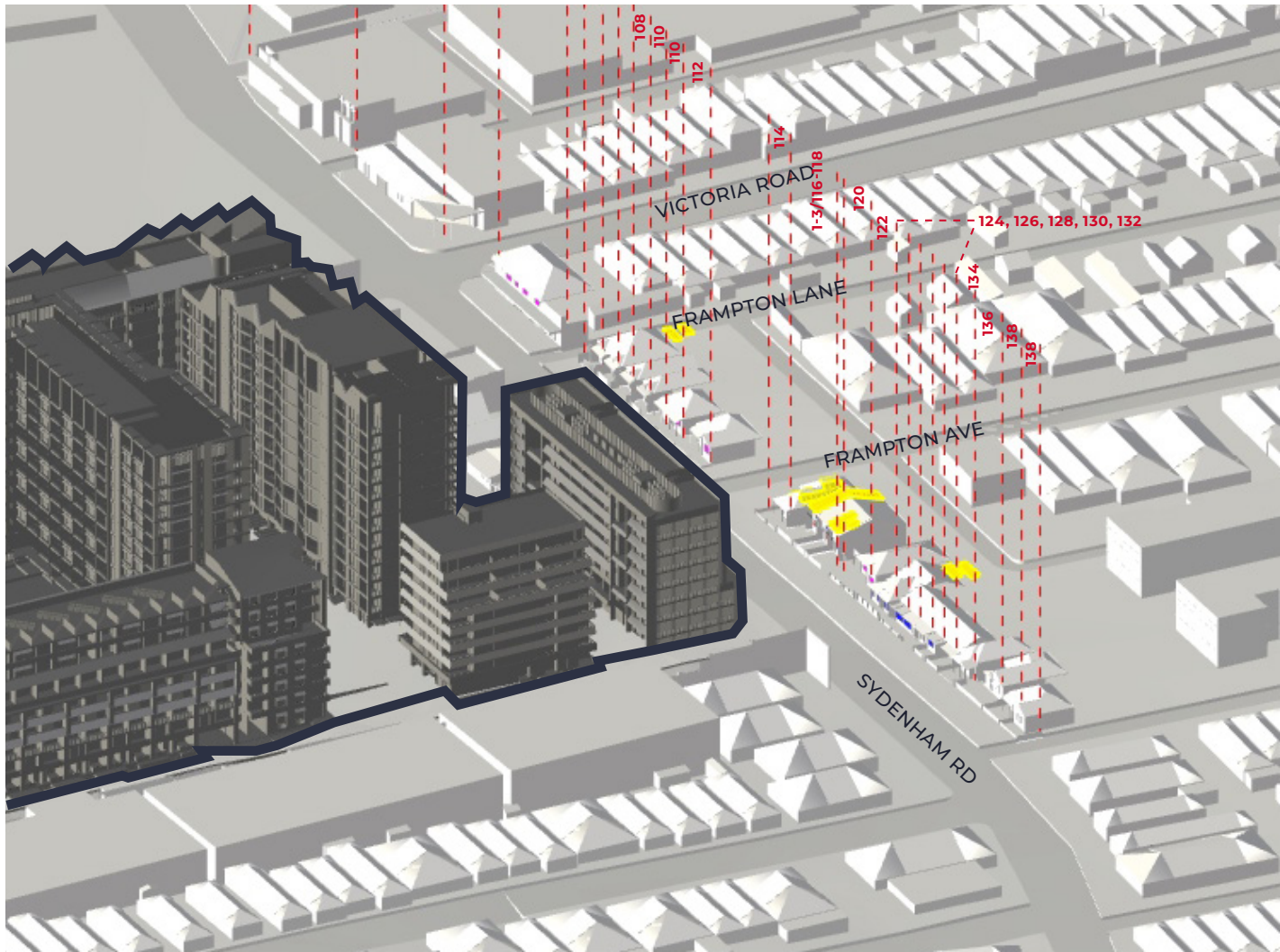
Compliant Height Scheme



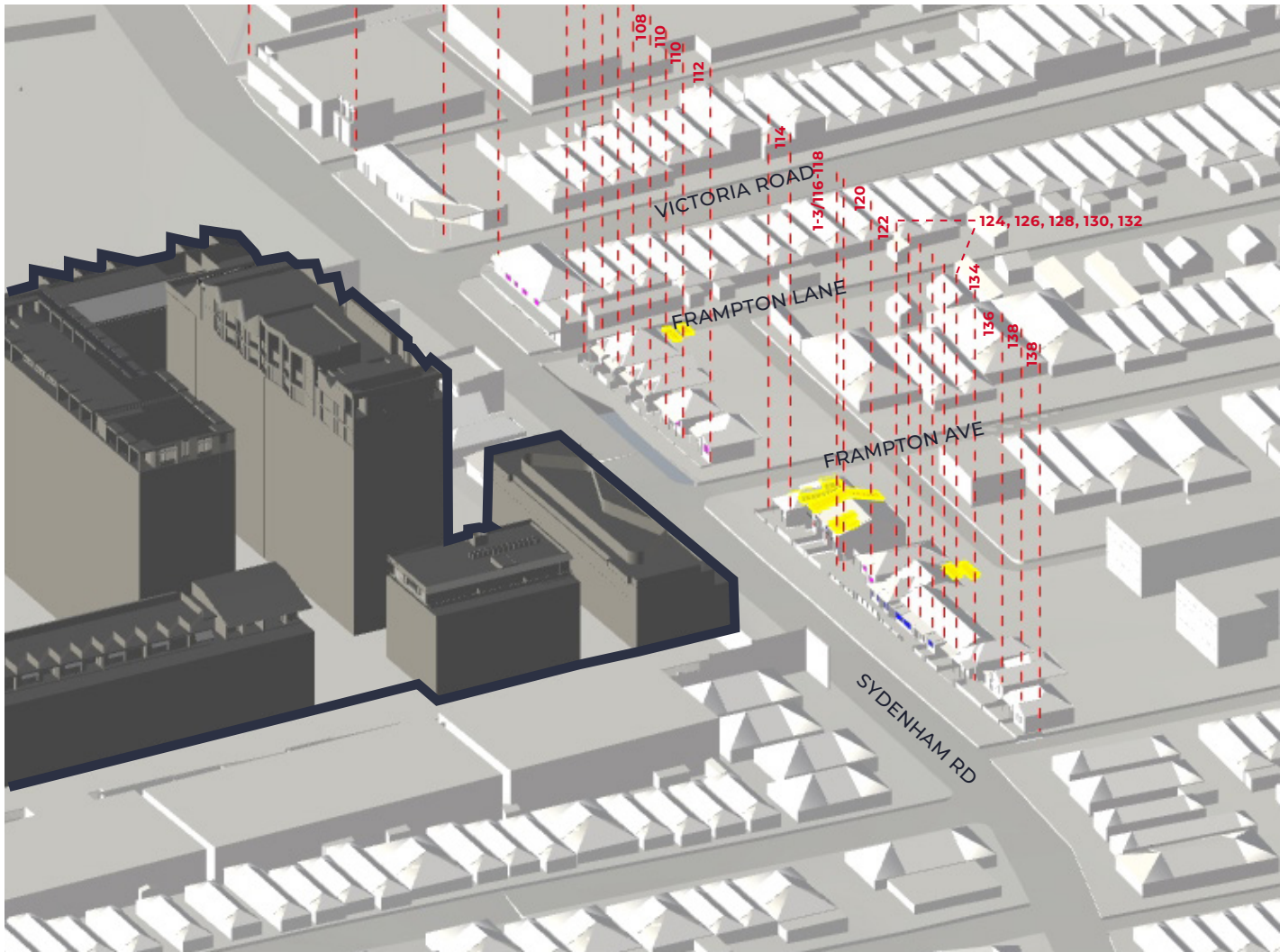
- LEGEND**
- Solar Panels
 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
1.45pm

Proposed Design



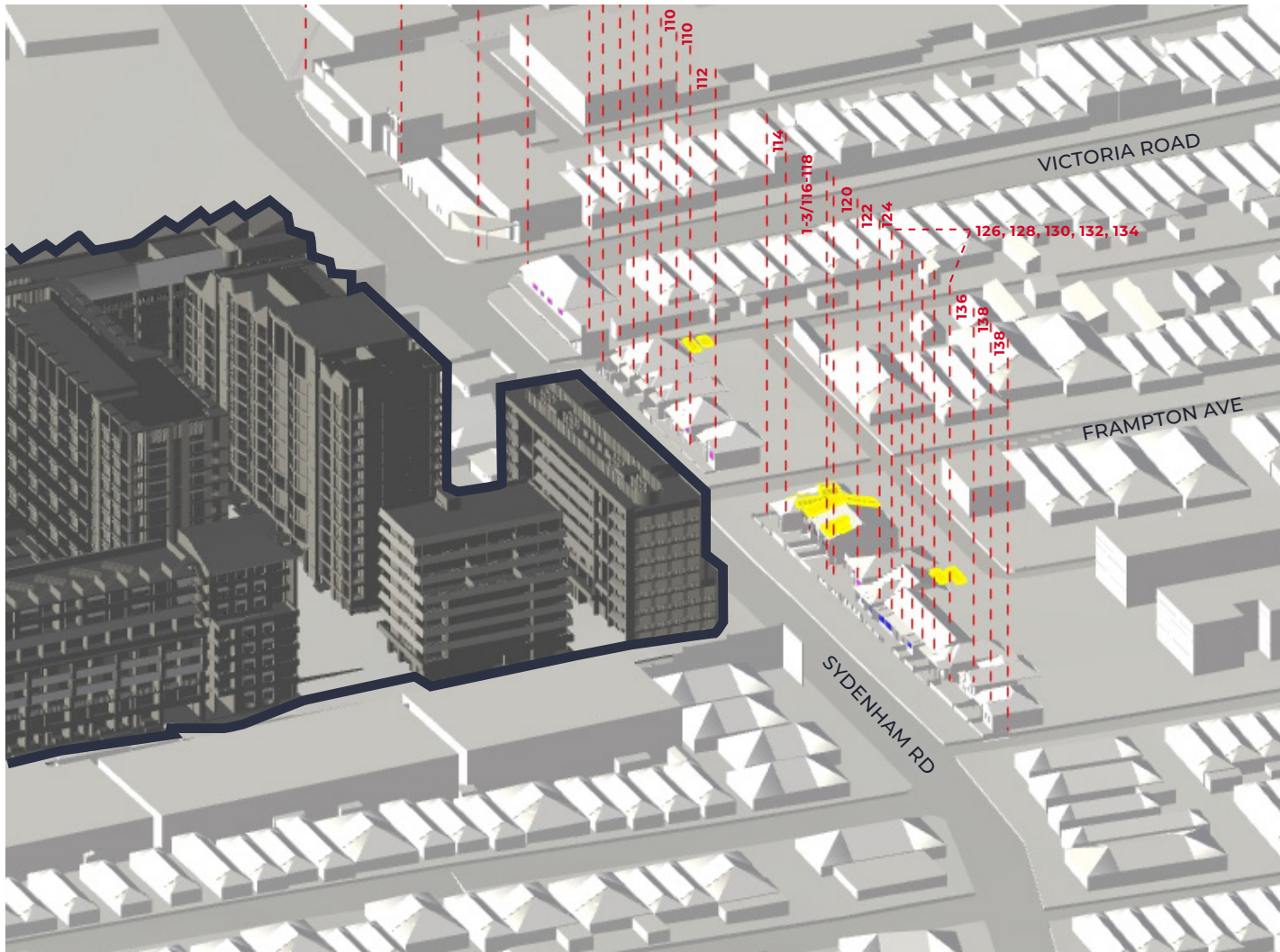
Compliant Height Scheme



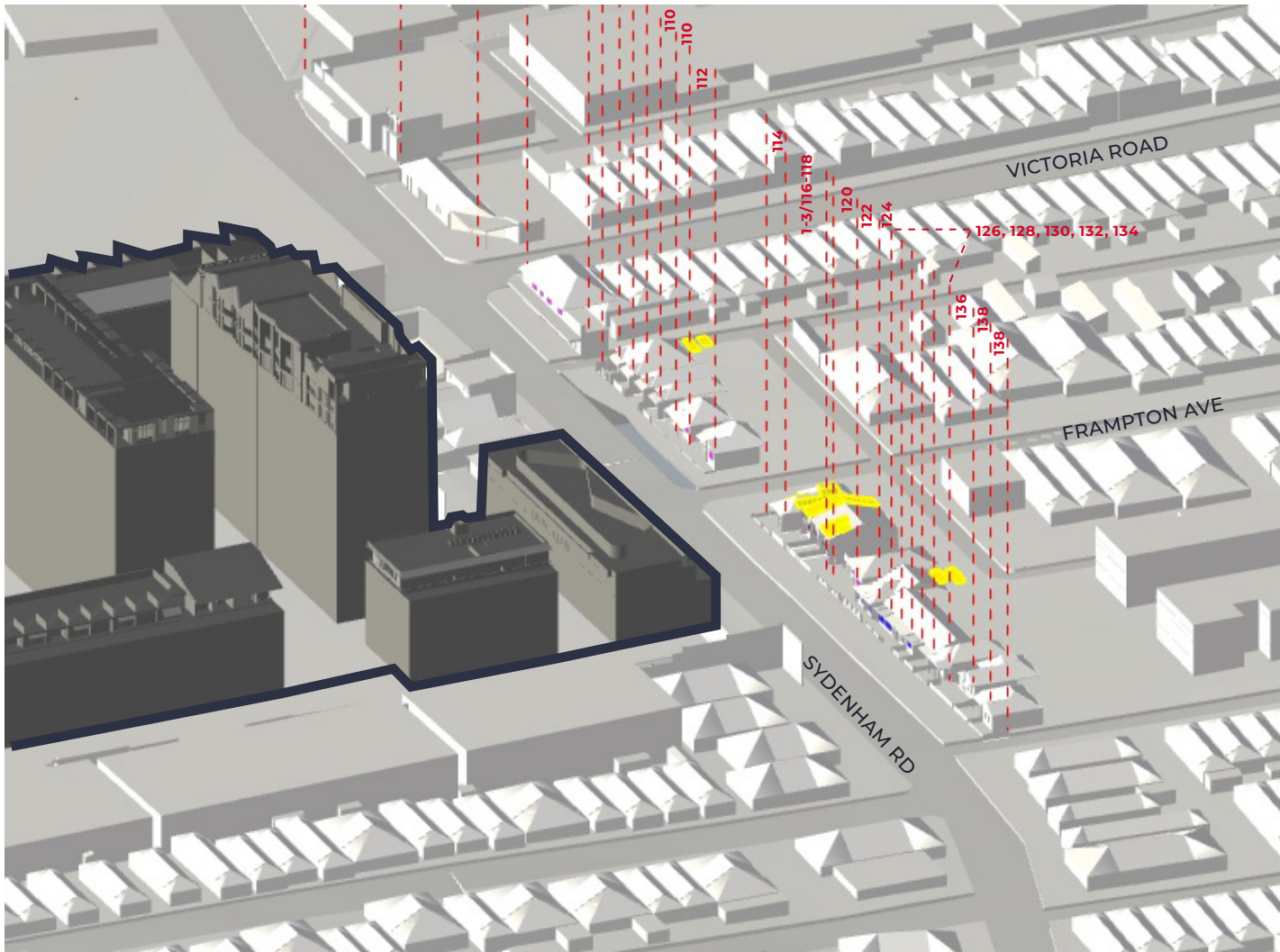
- LEGEND**
- Solar Panels
 - Cadastral Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
2.00pm

Proposed Design



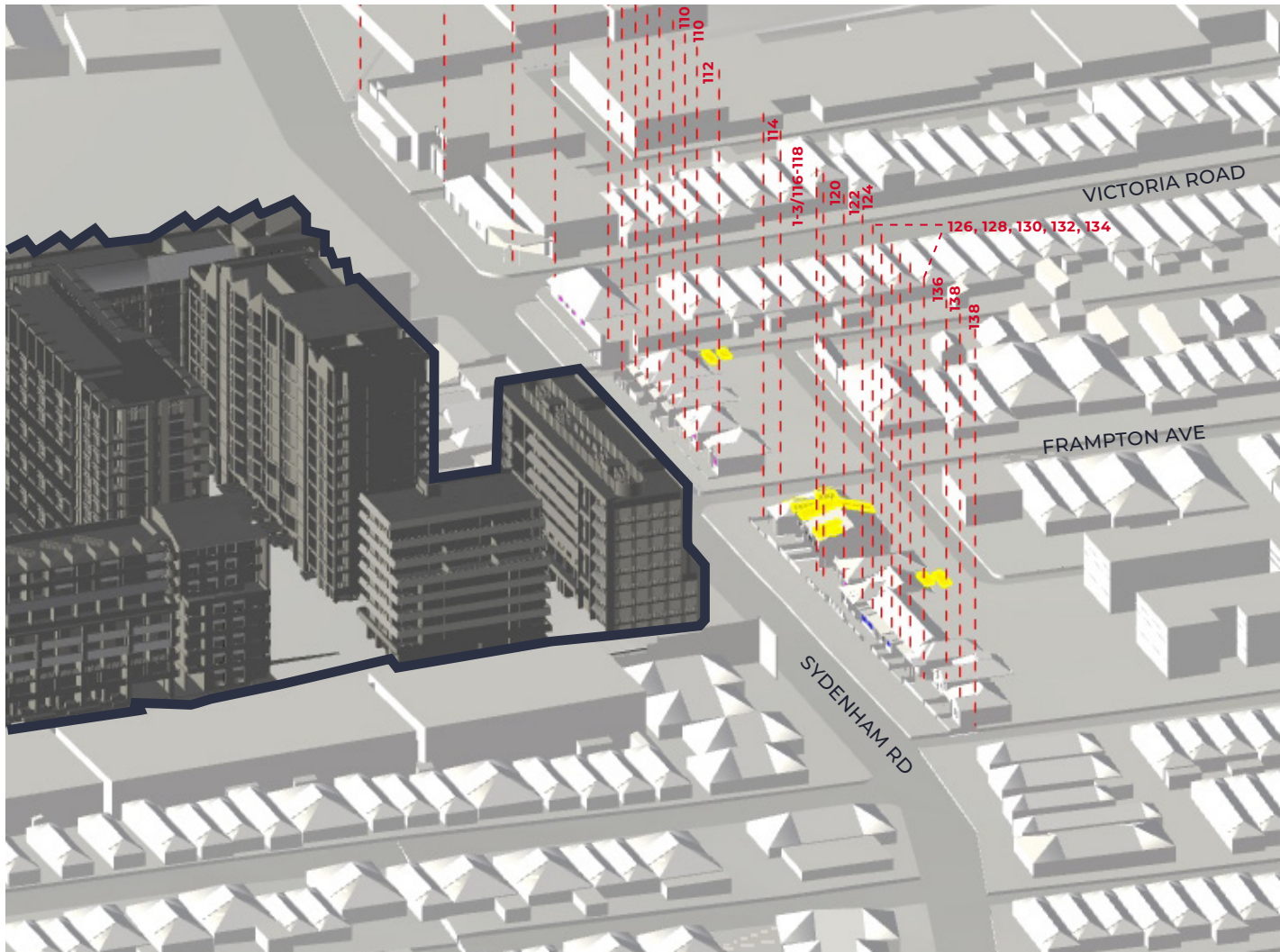
Compliant Height Scheme



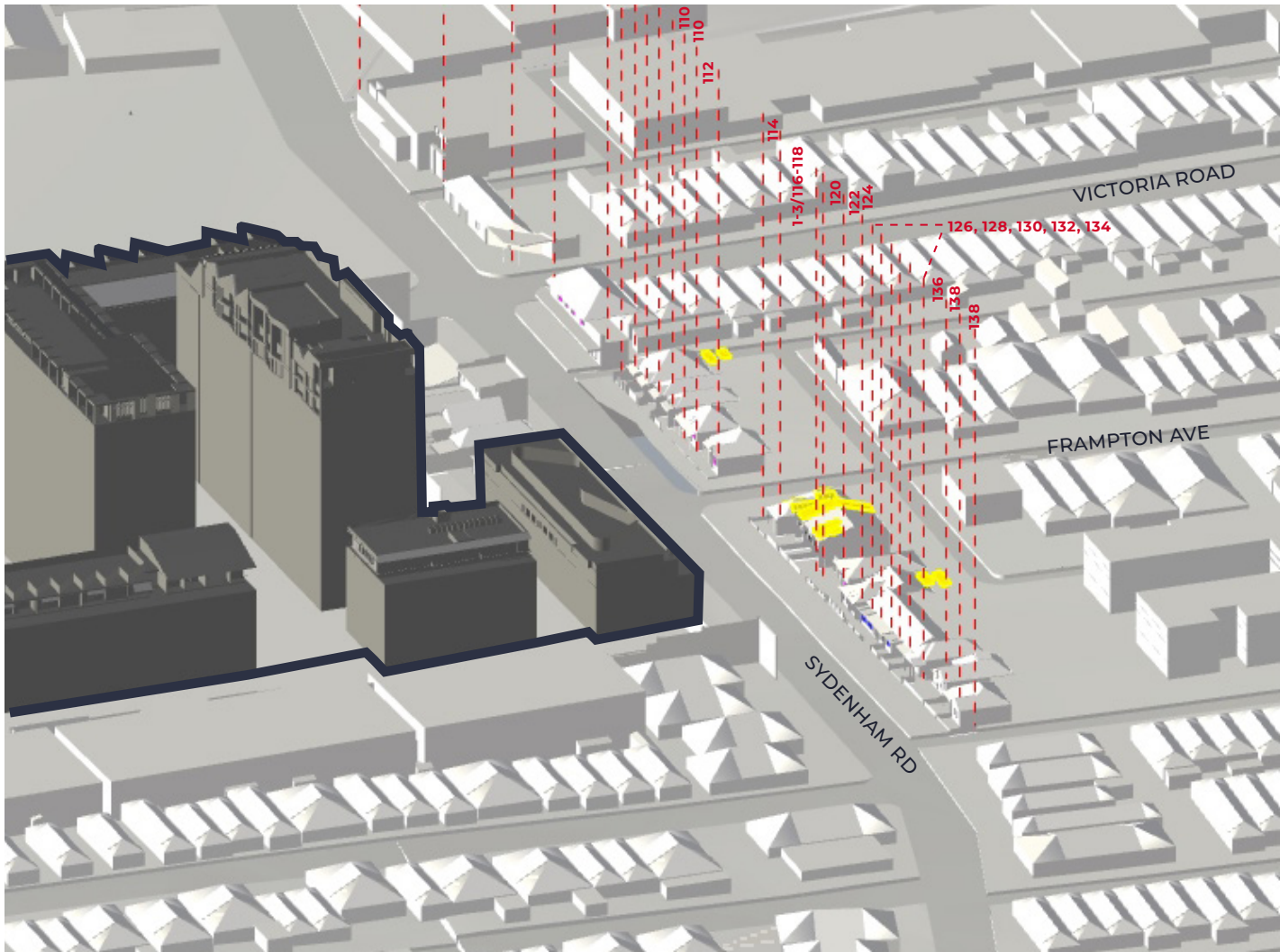
- LEGEND**
- Solar Panels
 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
2.15pm

Proposed Design



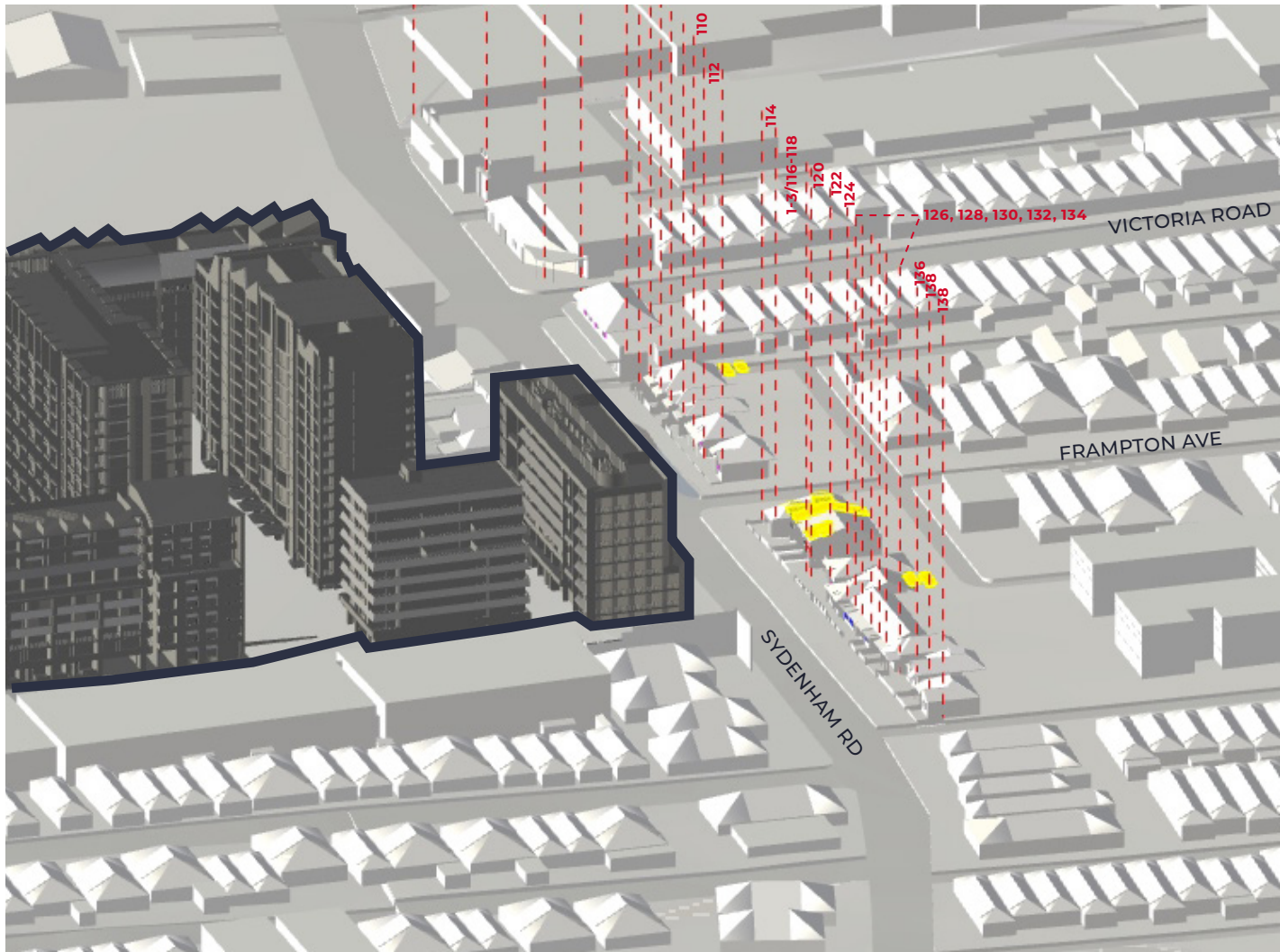
Compliant Height Scheme



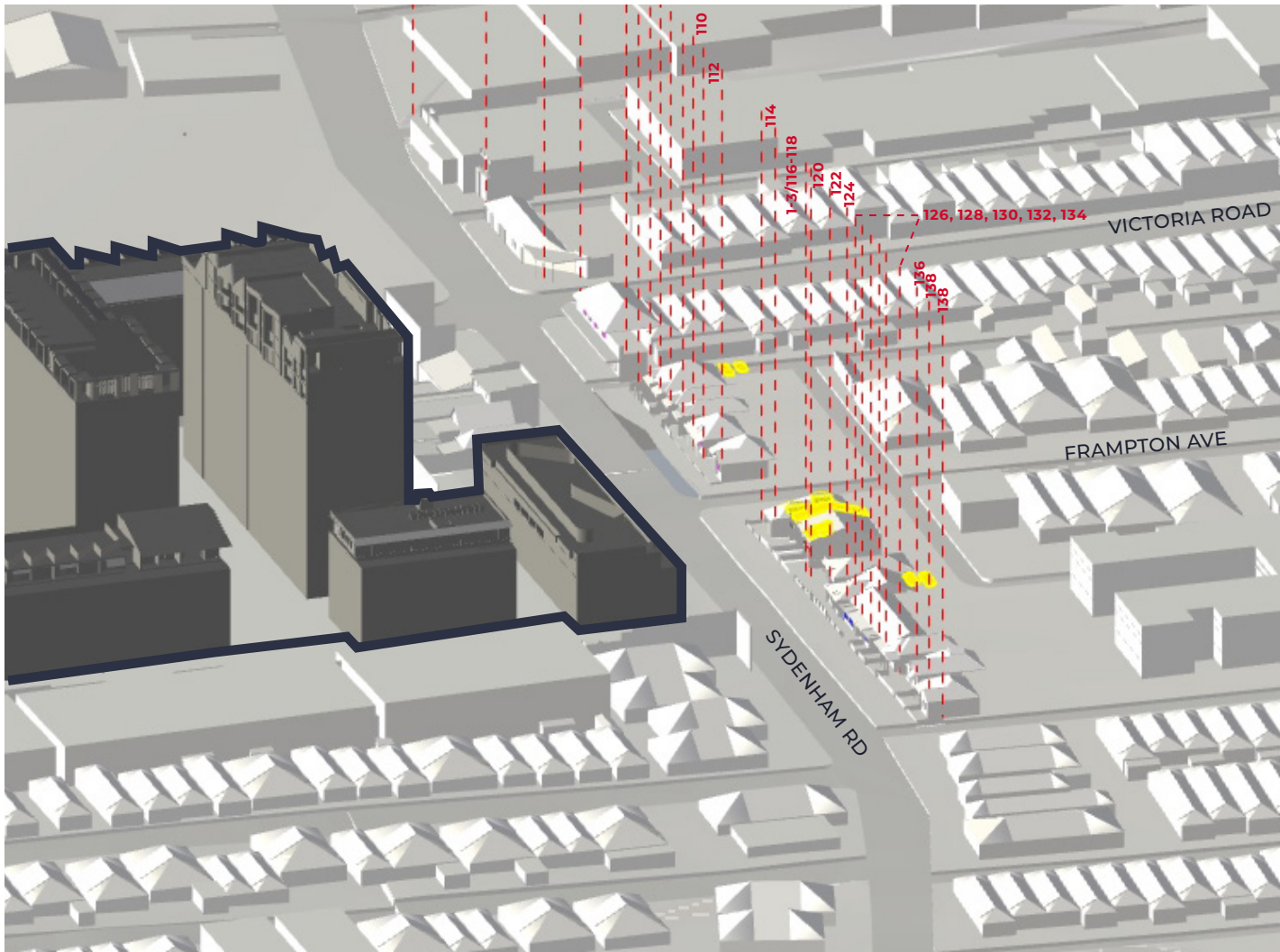
- LEGEND**
- Solar Panels
 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
2.30pm

Proposed Design



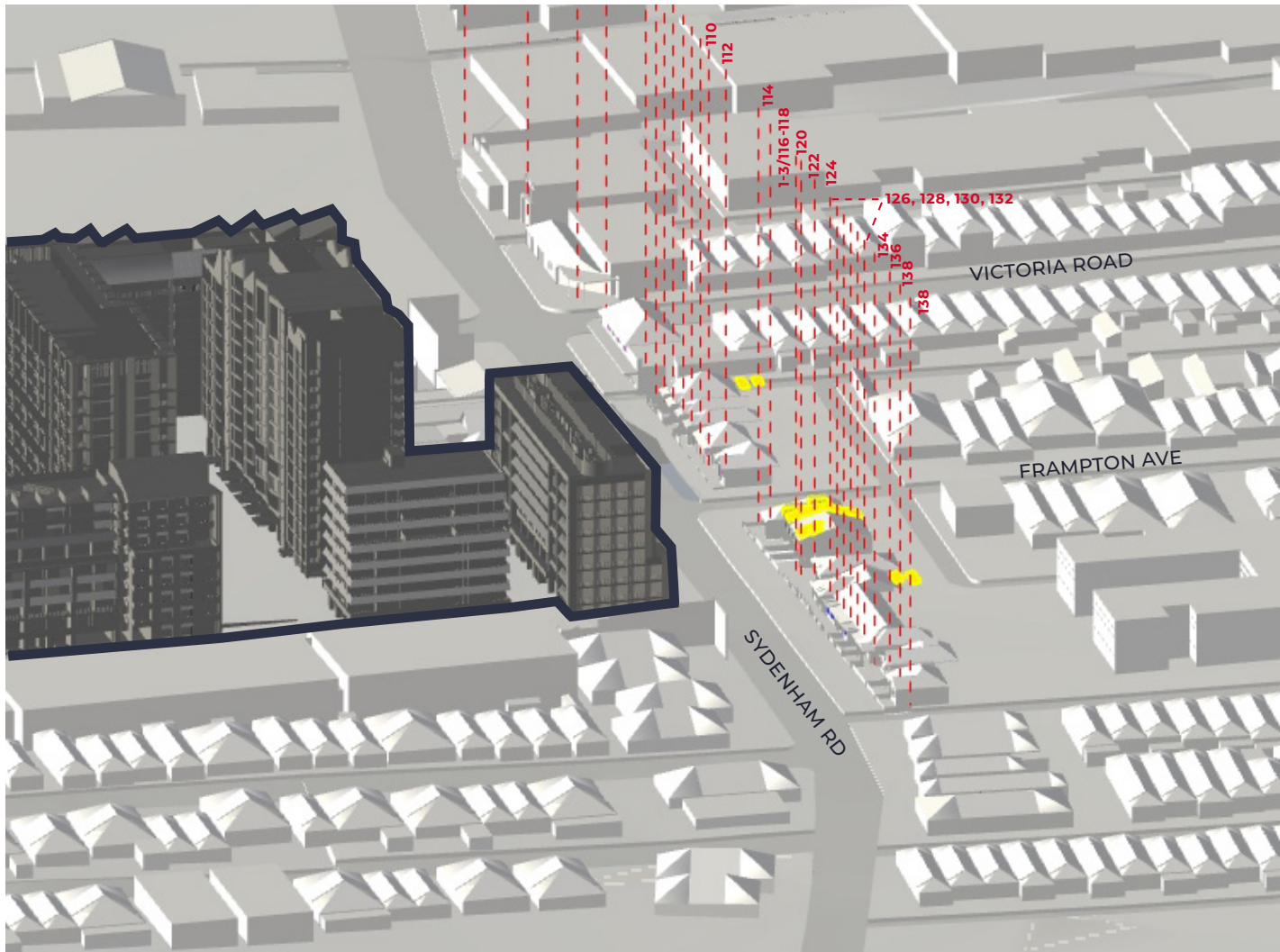
Compliant Height Scheme



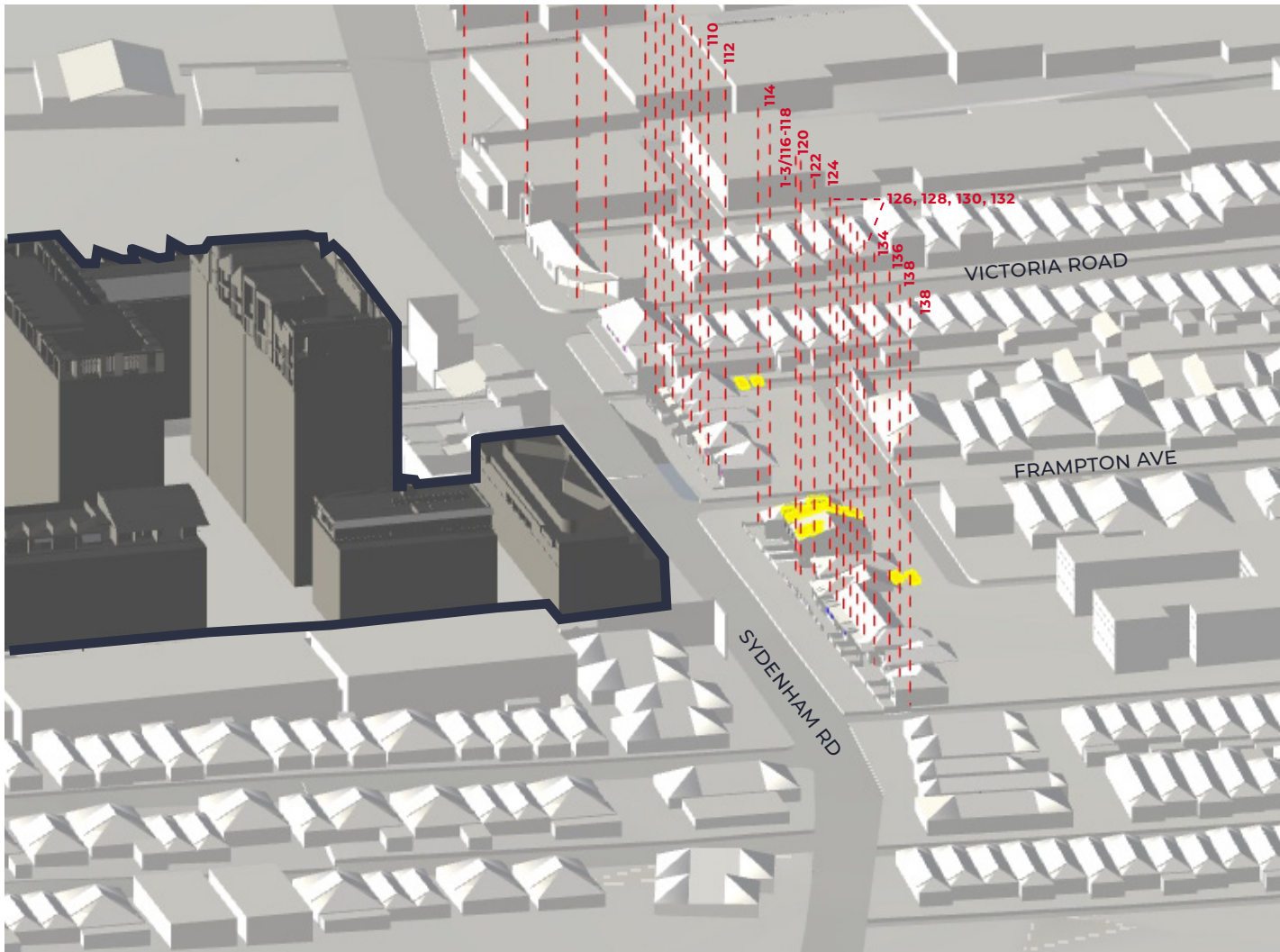
- LEGEND**
- Solar Panels
 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
2.45pm

Proposed Design



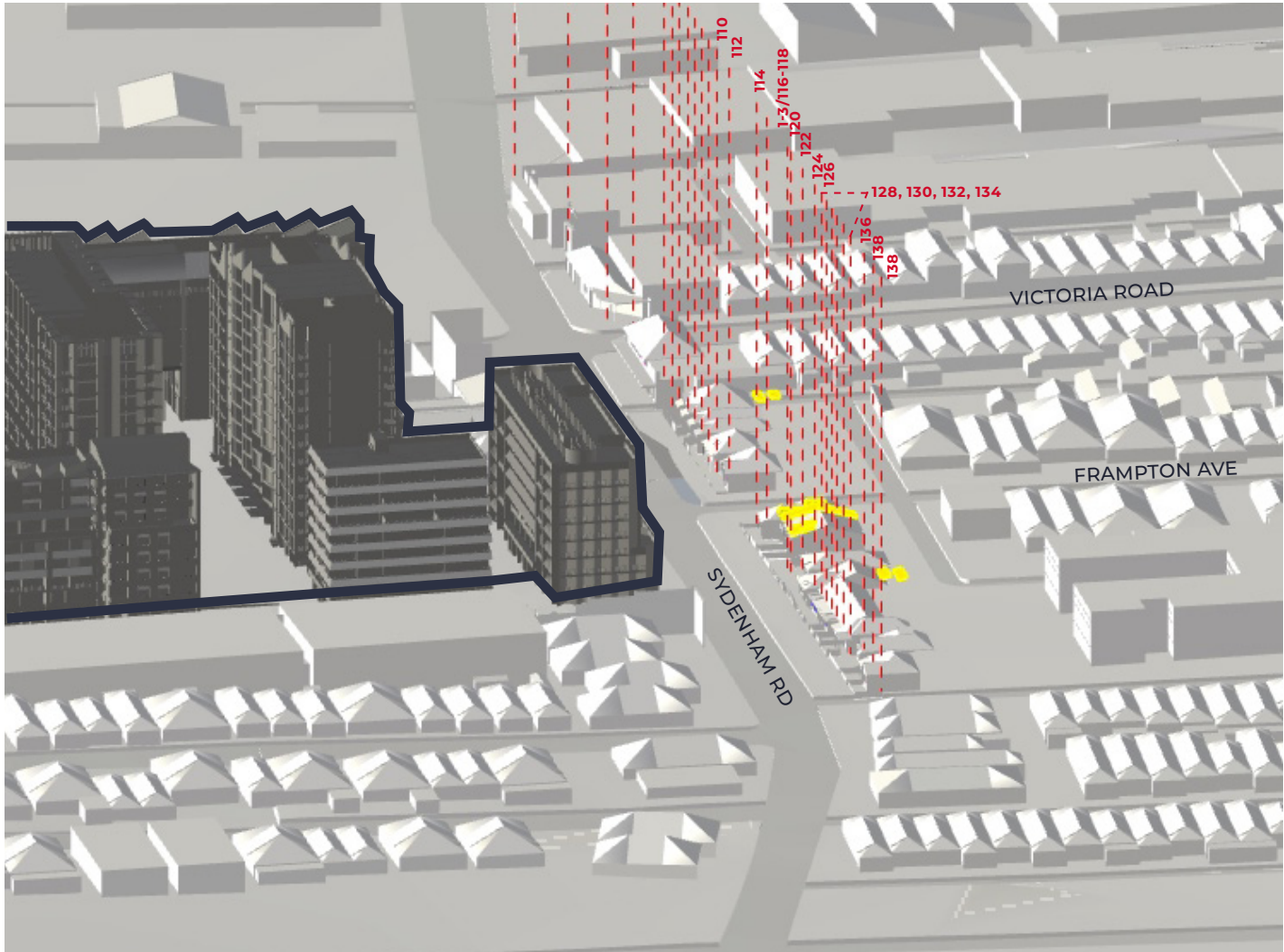
Compliant Height Scheme



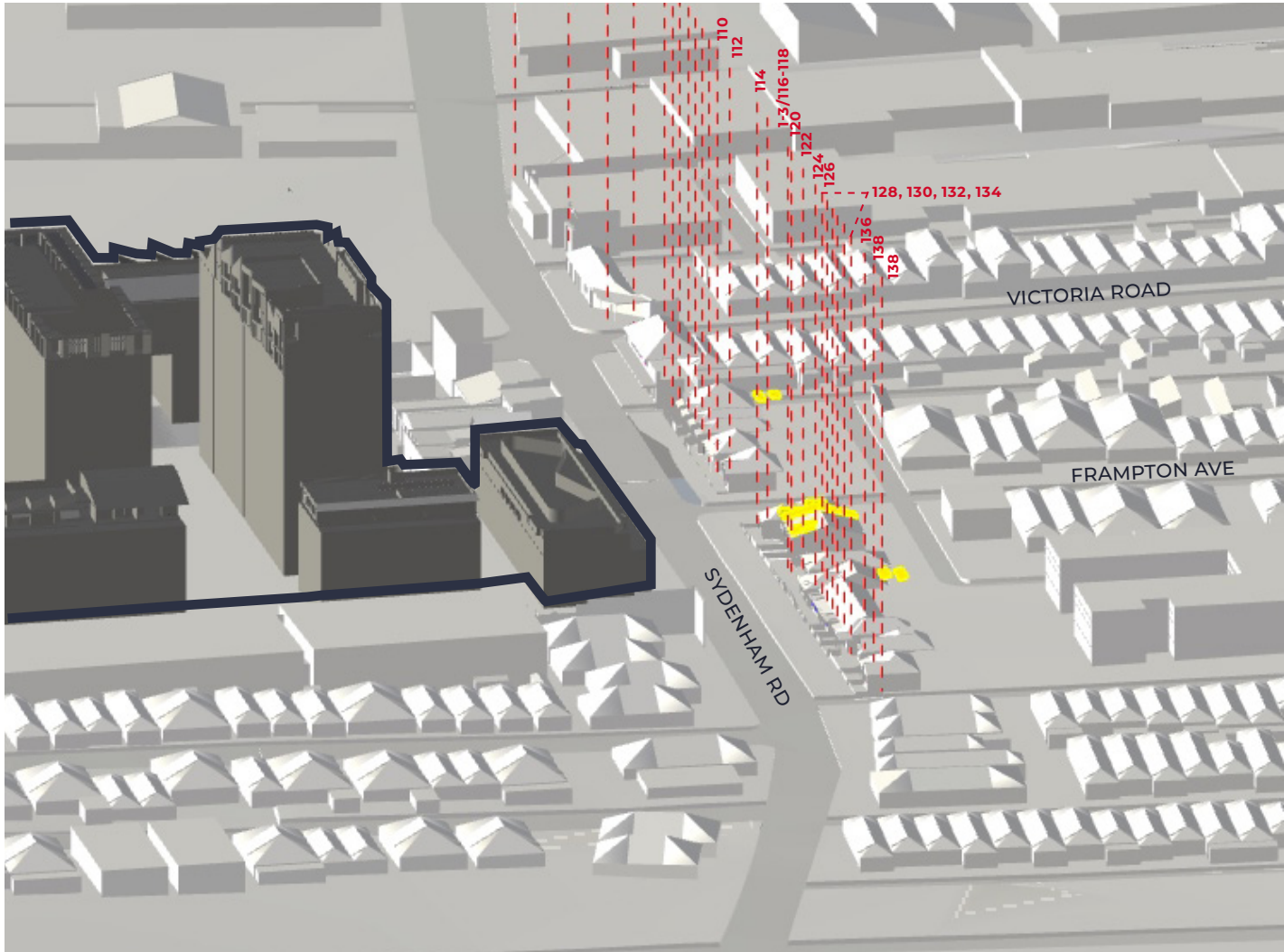
- LEGEND**
- Solar Panels
 - Cadastre Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

21 June
3.00pm

Proposed Design



Compliant Height Scheme



- LEGEND**
- Solar Panels
 - Cadastral Lot
- WINDOW LEGEND**
- Unknown Internal Space
 - Bedroom
 - Living Room

Solar Compliance - Principal Living Area of Neighbouring Houses

Proposed Design

Address	Internal Space	Window No.	900	915	930	945	1000	1015	1030	1045	1100	1115	1130	1145	1200	1215	1230	1245	100	115	130	145	200	215	230	245	300	2 hour Compliance	Internal Space	Address	
205 Victoria Road																														205 Victoria Road	
Window 1	Unknown	1	✓	✓	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 1	
Window 2	Unknown	2	✓	✓	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 2	
Window 3	Unknown	3	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 3	
Window 4	Unknown	4	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 4	
102 Sydenham Road	Bedroom	5	✓	✓	✓	×	×	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	×	×	×	×	×	×	×	×	✓	Bedroom	102 Sydenham Road	
104 Sydenham Road	Bedroom	6,7	✓	✓	×	×	×	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	×	×	×	×	×	×	×	✓	Bedroom	104 Sydenham Road	
106 Sydenham Road	Bedroom	8,9	×	×	×	×	×	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	×	×	×	×	×	×	×	✓	Bedroom	106 Sydenham Road	
108 Sydenham Road																														108 Sydenham Road	
Window 1	Unknown	10	×	×	×	×	×	×	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	×	×	×	×	×	×	×	✓	Unknown	Window 1	
110 Sydenham Road																														110 Sydenham Road	
Window 1	Unknown	11	×	×	×	×	×	×	×	×	×	×	✓	✓	×	×	×	×	×	×	×	×	×	×	×	×	×	×	×	Unknown	Window 1
Window 2	Unknown	12	×	×	×	×	×	×	×	×	×	×	×	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 2
112 Sydenham Road																														112 Sydenham Road	
Window 1	Unknown	13	×	×	×	×	×	×	×	×	×	×	×	×	×	✓	✓	✓	✓	×	×	×	×	×	×	×	×	×	×	Unknown	Window 1
Window 2	Unknown	14	×	×	×	×	×	×	×	×	×	×	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 2
114 Sydenham Road																														114 Sydenham Road	
Window 1	Unknown	15	×	×	×	×	×	×	×	×	×	×	×	×	×	×	×	✓	✓	✓	×	×	×	×	×	×	×	×	×	Unknown	Window 1
Unit 1 / 116-118 Sydenham Rd																														Unit 1 / 116-118 Sydenham Rd	
Window 1 & 2	(G) Living Room	16,17	×	×	×	×	×	×	×	×	×	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	×	×	×	✓	(G) Living Room	Window 1 & 2
Window 3	(L) Dining Room	18	×	×	×	×	×	×	×	×	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	×	×	×	×	✓	(L) Dining Room	Window 3	
Unit 2 / 116-118 Sydenham Rd																														Unit 2 / 116-118 Sydenham Rd	
Window 1 & 2	(G) Living Room	19,20	×	×	×	×	×	×	×	×	×	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	×	×	×	×	✓	(G) Living Room	Window 1 & 2	
Window 3	Bedroom	21	×	×	×	×	×	×	×	×	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	×	×	×	×	✓	Bedroom	Window 3	
Unit 3 / 116-118 Sydenham Rd																														Unit 3 / 116-118 Sydenham Rd	
Window 1 & 2	Unknown (G)	22,23	×	×	×	×	×	×	×	×	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	×	×	×	×	✓	Unknown (G)	Window 1 & 2	
Window 3	Unknown (L)	24	×	×	×	×	×	×	×	×	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	×	×	×	×	✓	Unknown (L)	Window 3	
120 Sydenham Road																														120 Sydenham Road	
Window 1	Unknown	25	×	×	×	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	×	×	×	✓	Unknown	Window 1	
Window 2	Unknown	26	×	×	×	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 2	
122 Sydenham Road																														122 Sydenham Road	
Window 1 & 2	Bedroom	27,28	×	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Bedroom	Window 1 & 2	
Window 2 & 4	Bedroom	29,30	×	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Bedroom	Window 2 & 4	
124 Sydenham Road	Bedroom	31	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Bedroom	124 Sydenham Road	
126 Sydenham Road	Bedroom	32	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Bedroom	126 Sydenham Road	
128 Sydenham Road																														128 Sydenham Road	
Window 1	Unknown	33	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 1	
Window 2	Unknown	34	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 2	
130 Sydenham Road	Bedroom	35	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Bedroom	130 Sydenham Road	
132 Sydenham Road	Unknown	36	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	×	×	×	×	×	×	×	×	×	×	×	×	×	✓	Unknown	132 Sydenham Road	
134 Sydenham Road	Unknown	37	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	×	×	×	×	×	×	×	×	✓	Unknown	134 Sydenham Road	

A total of 3 dwellings are impacted by additional overshadowing from the proposed design.
3 out of 19 dwellings does not comply with the solar access requirements of the Marrickville DCP.

Compliant Height Scheme

Address	Internal Space	Window No.	900	915	930	945	1000	1015	1030	1045	1100	1115	1130	1145	1200	1215	1230	1245	100	115	130	145	200	215	230	245	300	2 hour Compliance	Internal Space	Address
205 Victoria Road																														205 Victoria Road
Window 1	Unknown	1	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 1
Window 2	Unknown	2	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 2
Window 3	Unknown	3	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 3
Window 4	Unknown	4	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 4
102 Sydenham Road	Bedroom	5	✓	✓	✓	x	x	x	x	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	x	x	x	x	x	x	✓	Bedroom	102 Sydenham Road	
104 Sydenham Road	Bedroom	6,7	✓	x	x	x	x	x	x	x	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	x	x	x	x	x	✓	Bedroom	104 Sydenham Road	
106 Sydenham Road	Bedroom	8,9	x	x	x	x	x	x	x	x	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	x	x	x	x	x	✓	Bedroom	106 Sydenham Road	
108 Sydenham Road																													108 Sydenham Road	
Window 1	Unknown	10	x	x	x	x	x	x	x	x	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	x	x	x	x	x	✓	Unknown	Window 1	
110 Sydenham Road																													110 Sydenham Road	
Window 1	Unknown	11	x	x	x	x	x	x	x	x	x	✓	✓	✓	✓	✓	✓	✓	x	x	x	x	x	x	x	x	x	x	Unknown	Window 1
Window 2	Unknown	12	x	x	x	x	x	x	x	x	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 2
112 Sydenham Road																													112 Sydenham Road	
Window 1	Unknown	13	x	x	x	x	x	x	x	x	✓	✓	✓	✓	✓	✓	✓	✓	x	x	x	x	x	x	x	x	✓	Unknown	Window 1	
Window 2	Unknown	14	x	x	x	x	x	x	x	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 2
114 Sydenham Road																													114 Sydenham Road	
Window 1	Unknown	15	x	x	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	x	x	x	x	x	x	✓	Unknown	Window 1	
Unit 1 / 116-118 Sydenham Rd																													Unit 1 / 116-118 Sydenham Rd	
Window 1 & 2	(G) Living Room	16,17	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	x	x	✓	(G) Living Room	Window 1 & 2
Window 3	(L) Dining Room	18	x	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	x	x	x	✓	(L) Dining Room	Window 3	
Unit 2 / 116-118 Sydenham Rd																													Unit 2 / 116-118 Sydenham Rd	
Window 1 & 2	(G) Living Room	19,20	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	x	x	x	✓	(G) Living Room	Window 1 & 2	
Window 3	Bedroom	21	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	x	x	x	✓	Bedroom	Window 3	
Unit 3 / 116-118 Sydenham Rd																													Unit 3 / 116-118 Sydenham Rd	
Window 1 & 2	Unknown (G)	22,23	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	x	x	x	✓	Unknown (G)	Window 1 & 2	
Window 3	Unknown LI)	24	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	x	x	x	✓	Unknown LI)	Window 3	
120 Sydenham Road																													120 Sydenham Road	
Window 1	Unknown	25	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	x	x	✓	Unknown	Window 1
Window 2	Unknown	26	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 2
122 Sydenham Road																													122 Sydenham Road	
Window 1 & 2	Bedroom	27,28	x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Bedroom	Window 1 & 2
Window 2 & 4	Bedroom	29,30	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Bedroom	Window 2 & 4
124 Sydenham Road	Bedroom	31	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Bedroom	124 Sydenham Road
126 Sydenham Road	Bedroom	32	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Bedroom	126 Sydenham Road
128 Sydenham Road																													128 Sydenham Road	
Window 1	Unknown	33	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 1
Window 2	Unknown	34	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unknown	Window 2
130 Sydenham Road	Bedroom	35	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Bedroom	130 Sydenham Road
132 Sydenham Road	Unknown	36	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	x	x	x	x	x	x	x	x	x	x	✓	Unknown	132 Sydenham Road	
134 Sydenham Road	Unknown	37	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓															

A total of 1 dwelling is impacted by additional overshadowing from the compliant height scheme.
1 out of 19 dwellings does not comply with the solar access requirements of the Marrickville DCP.

Solar Compliance - PV Panels of Neighbouring Houses

Proposed Design

Address	Total No. of Solar Panels	900	915	930	945	1000	1015	1030	1045	1100	1115	1130	1145	1200	1215	1230	1245	100	115	130	145	200	215	230	245	300	All Solar Panels Receiving 4 Hours	Address
102 Sydenham Road	18		-7	-7	-7	-6	-3	-2	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	102 Sydenham Road
114 Sydenham Road	20		x	x	x	x	x	x	-15	-11	-9	-6	-1	✓	✓	✓	✓	✓	-11	-11	-12	-13	-14	-15	-16	-18	x	114 Sydenham Road
Unit 1 / 116-118 Sydenham Rd	44		x	x	x	x	x	-22	-22	-12	-6	-1	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	Unit 1 / 116-118 Sydenham Rd
Unit 3 / 116-118 Sydenham Rd	10		x	x	x	x	x	x	-9	-8	-6	-4	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	x	Unit 3 / 116-118 Sydenham Rd
122 Sydenham Road	12		x	-11	-5	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	122 Sydenham Road

Compliant Height Scheme

Address	Total No. of Solar Panels	900	915	930	945	1000	1015	1030	1045	1100	1115	1130	1145	1200	1215	1230	1245	100	115	130	145	200	215	230	245	300	All Solar Panels Receiving 4 Hours	Address
102 Sydenham Road	18		-7	-7	-7	-6	-3	-2	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	102 Sydenham Road
114 Sydenham Road			x	x	x	-9	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	-11	-12	-13	-13	-14	-15	-16	x	114 Sydenham Road	
Unit 1 / 116-118 Sydenham Rd	20		x	x	x	-9	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓										Unit 1 / 116-118 Sydenham Rd
Unit 3 / 116-118 Sydenham Rd	44		x	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Unit 3 / 116-118 Sydenham Rd
122 Sydenham Road	10		-7	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	122 Sydenham Road
	12		-6	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	

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