

Makeka Design Lab

V&A Waterfront_ Precinct Plan 2017
East Pier Road, Waterfront, Cape Town

Precinct plan

1st Quarter 2017

PURPOSE

Consolidation of explorations for the Quay 7 site - unlocking development opportunity for the V&A Waterfront.

STATUS

This report is a precinct plan.

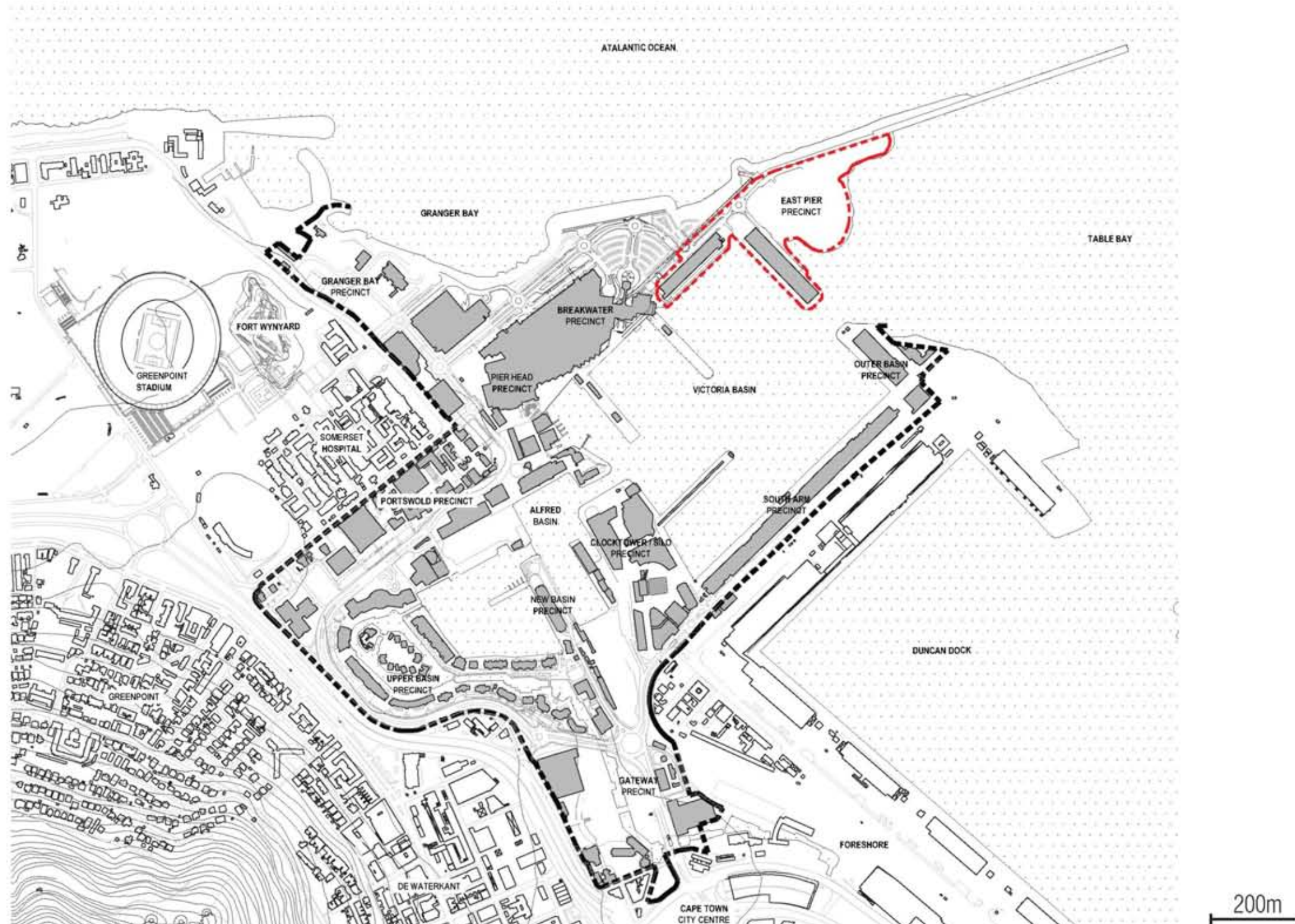
Development Manager: Mark Noble , V&A Waterfront
– Report submitted by: Mokena Makeka, MDL

PURPOSE OF DOCUMENT



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V&A VISION 2040





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Precinct Components

- Helistop
- DEA Extension
- Waste Handling Facility
- Events Venue
- Mixed Use Development – Quay 7
- Vision for Breakwater Wall Revitalization



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Helicopter Pads and Helicopter Tour Offices



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Department of Environmental Affairs



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Quay 7



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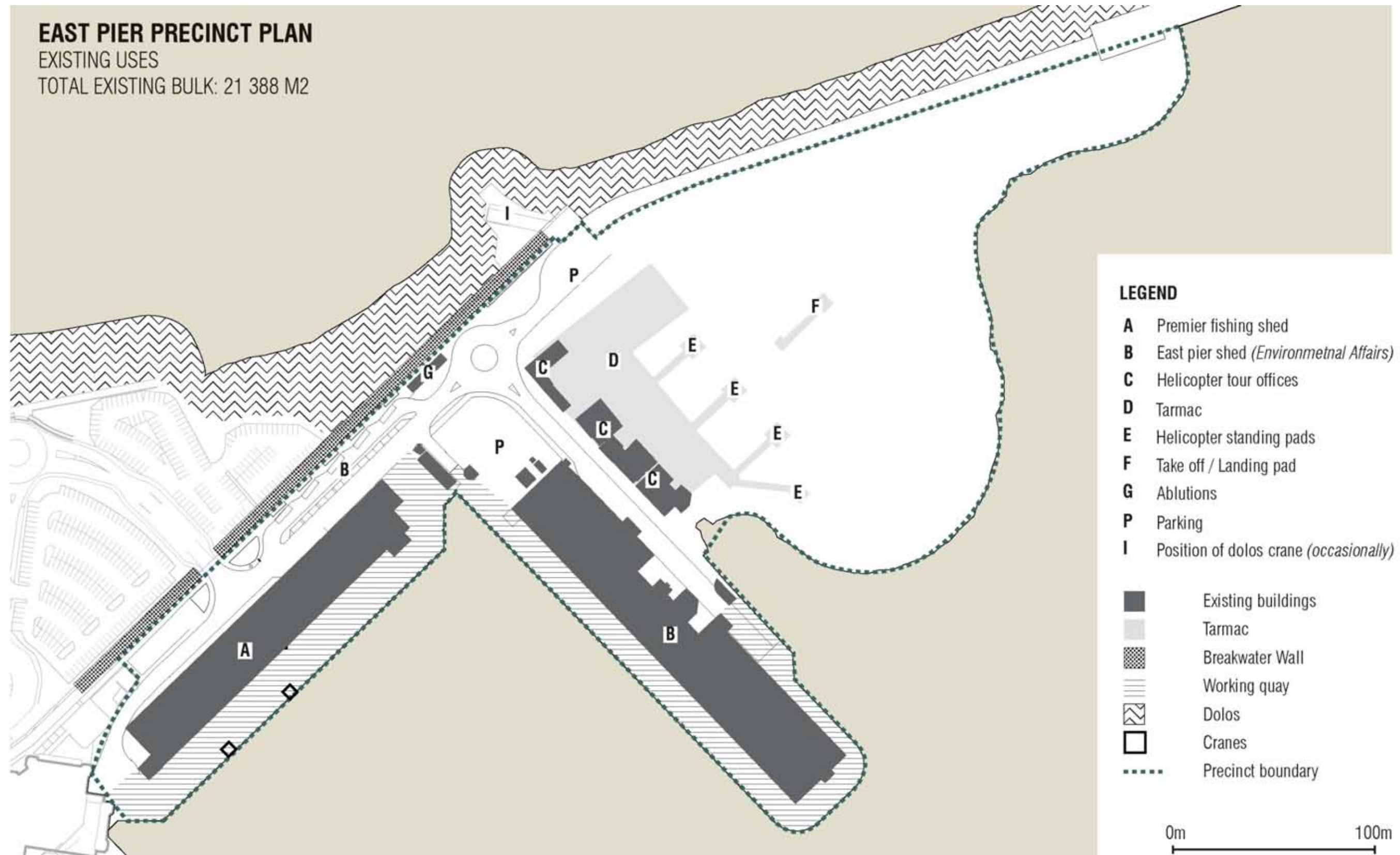
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Breakwater Wall



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Current Situation / Challenges

- Pedestrian connectivity **Poor**
- Helicopter facilities **Upgrade to Code**
- Quay 7 **Dilapidated and decaying fabric**

Maritime activities **Migration due to changes in industry**

- DEA **Extent of Expansion Identified**



Opportunities / Strategy

- **Improve** existing and establish new **Pedestrian** links
 - Revitalized **Public** realm
- **Formalize** and improve helistop facilities
 - Improve and **Expand** DEA facilities
 - **New** events venue (attraction)
- Quay 7 as **Link** between V&A, events venue, and helistop



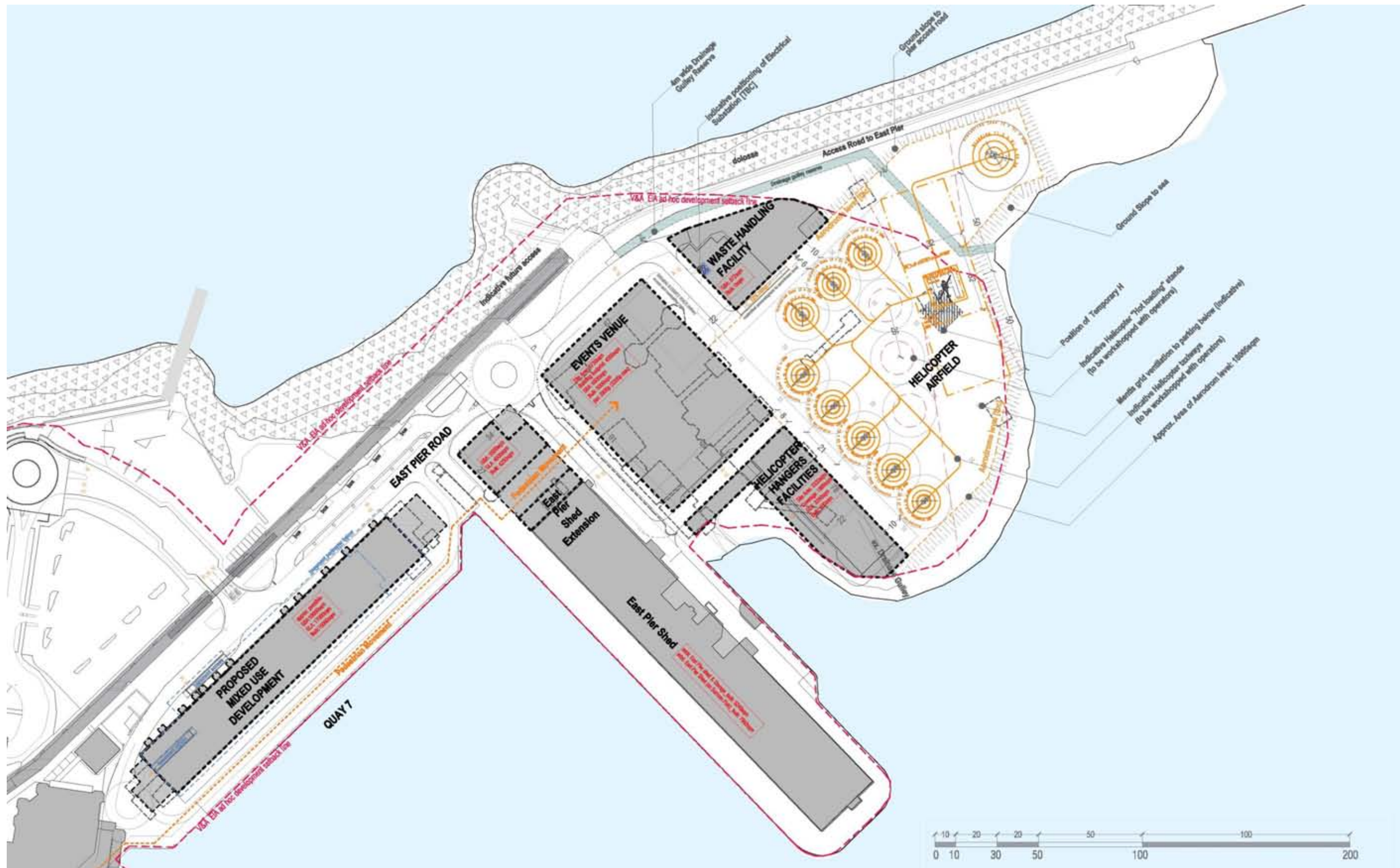
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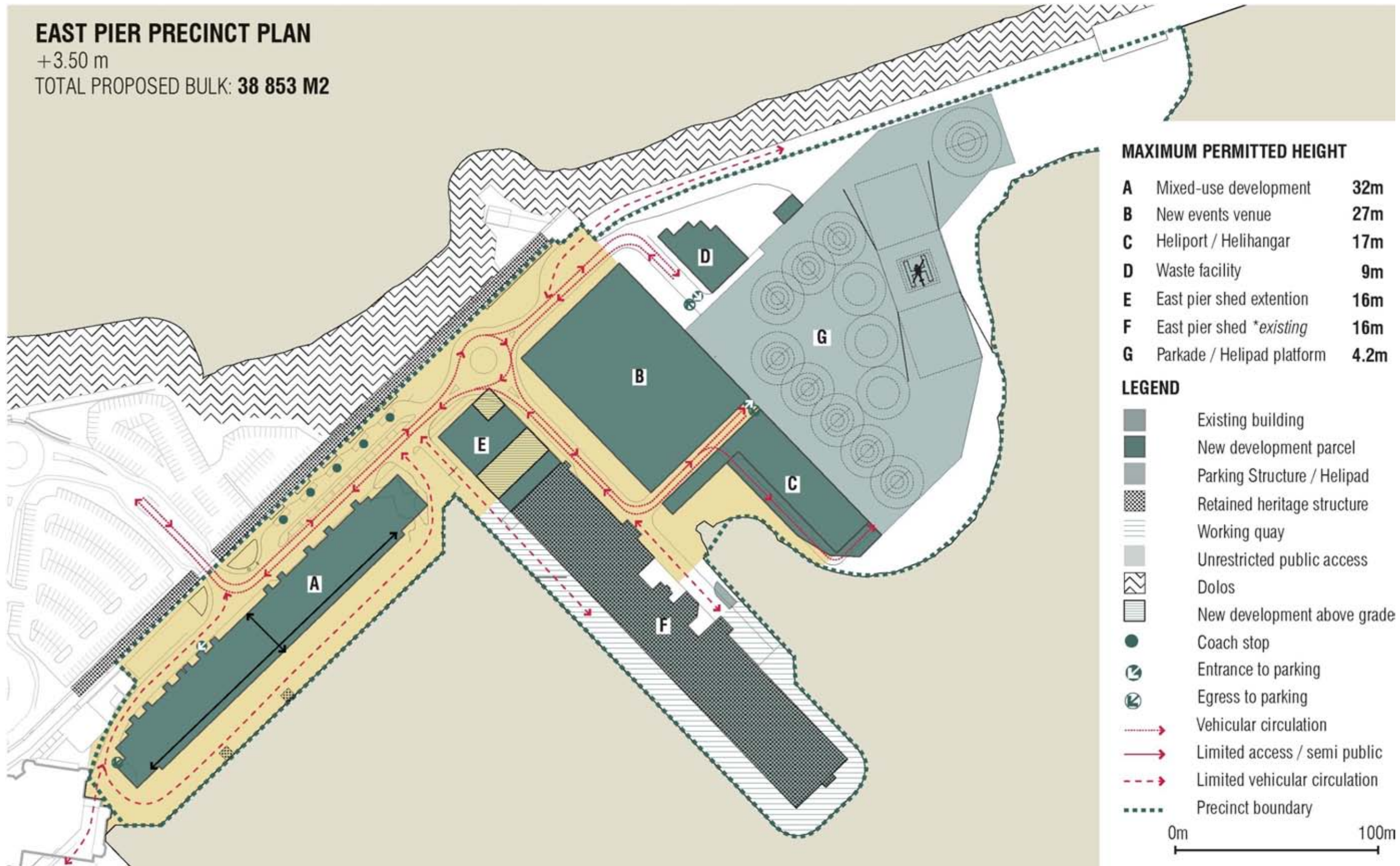
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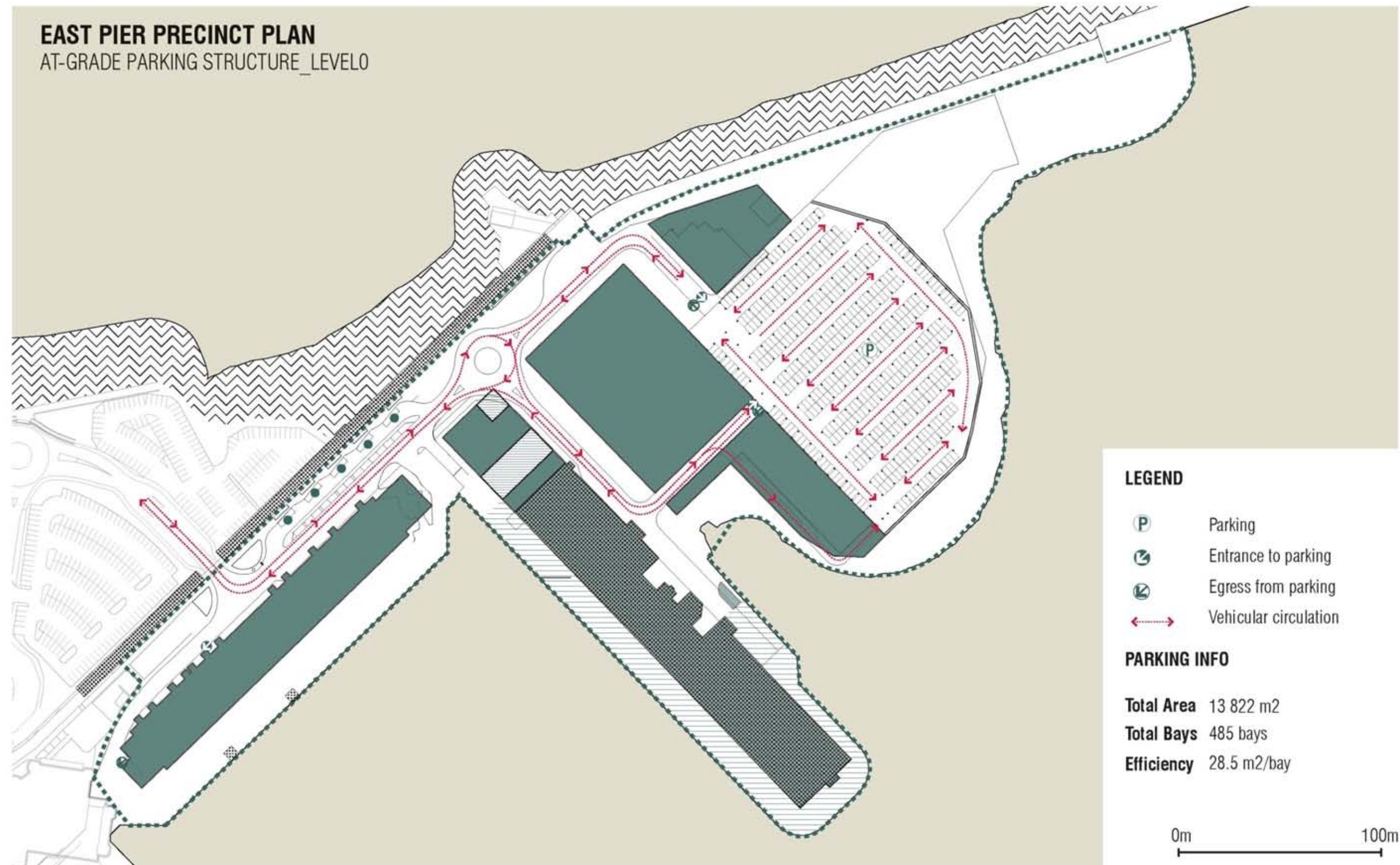
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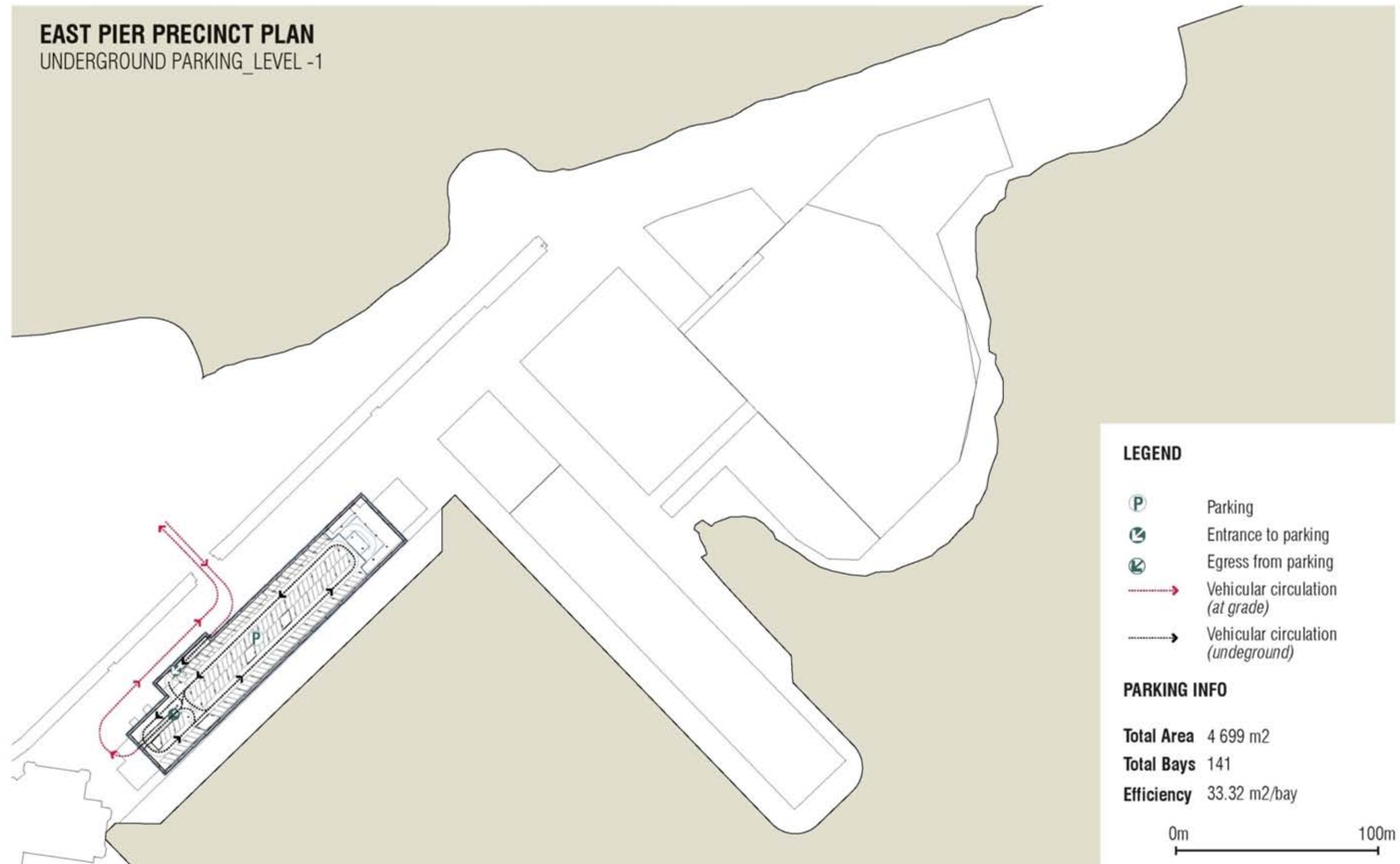
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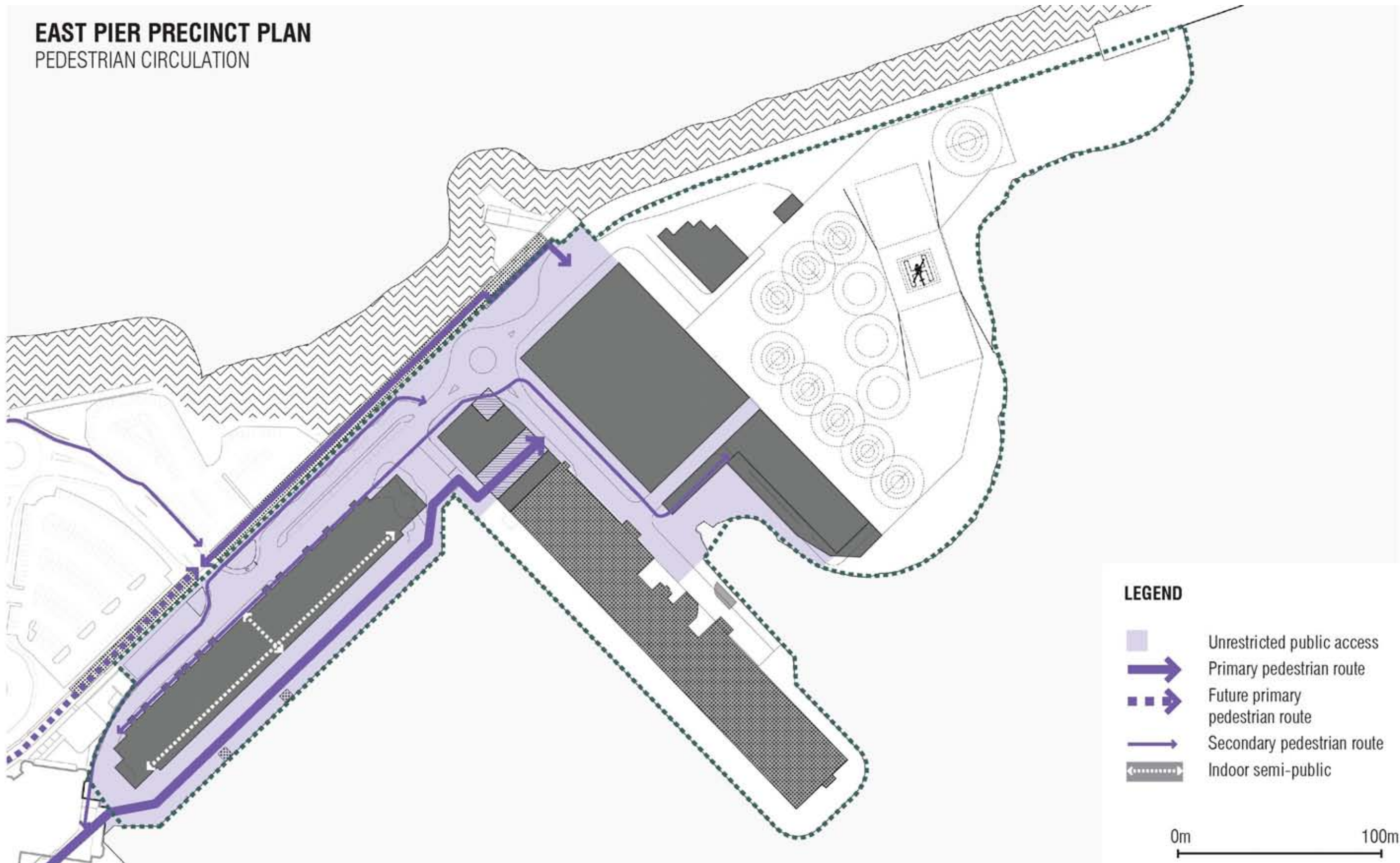
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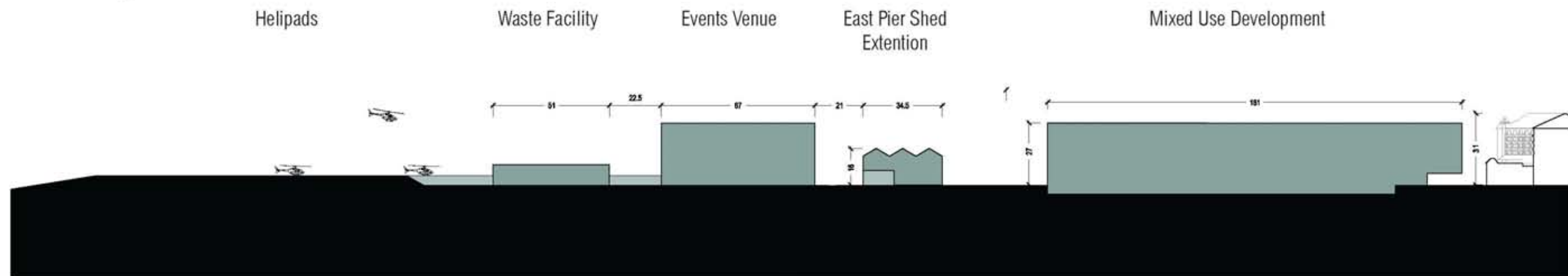


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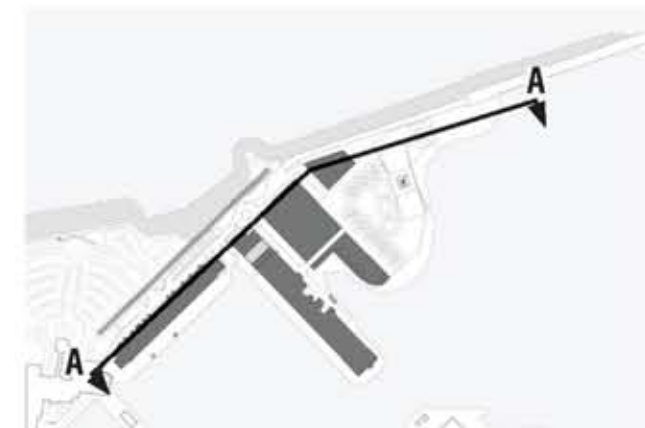
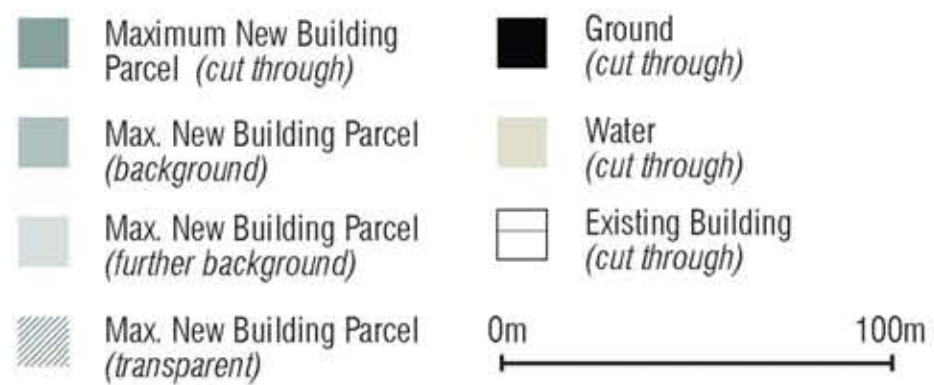
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SECTION AA_EXISTING

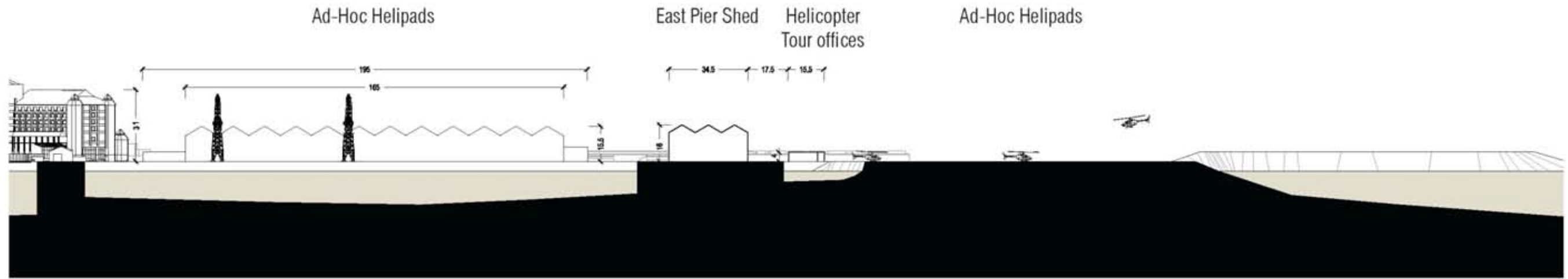


SECTION AA_PROPOSED

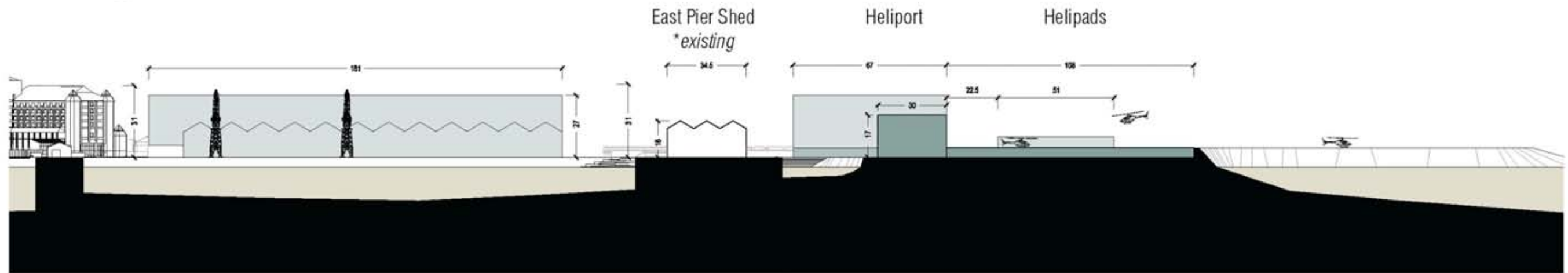


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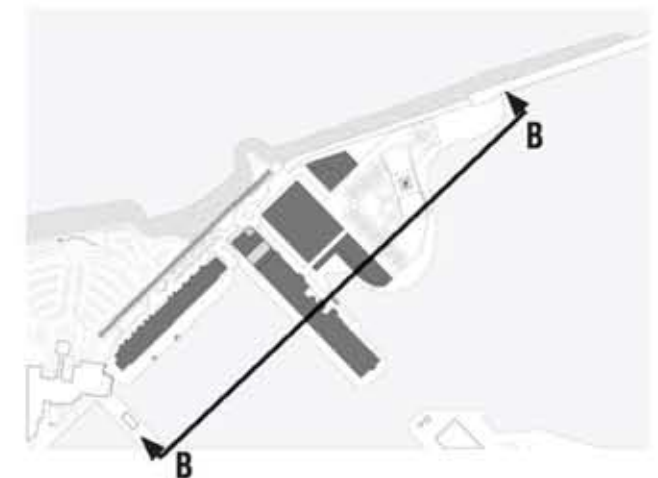
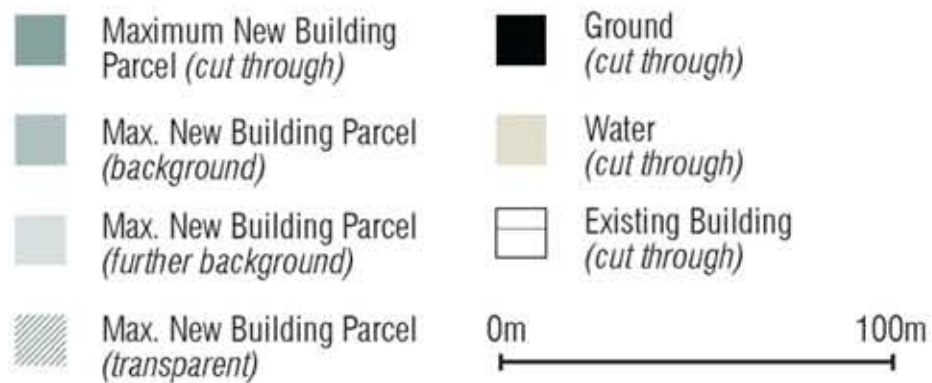
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SECTION BB_EXISTING



SECTION BB_PROPOSED



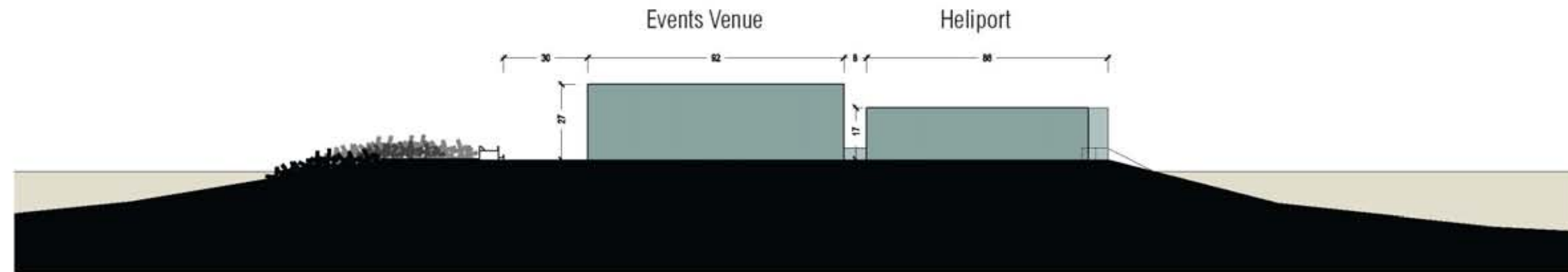
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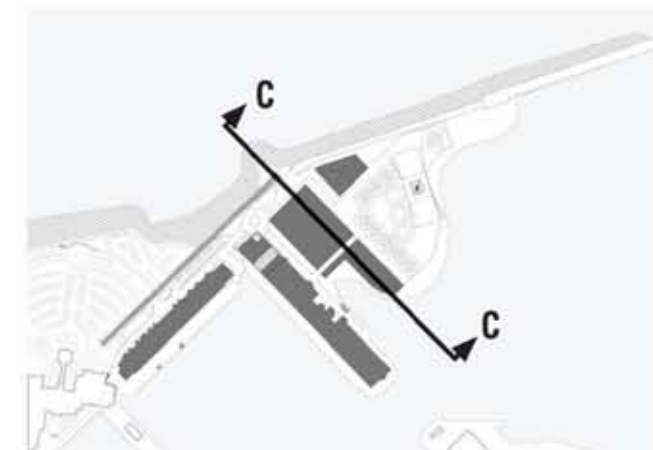
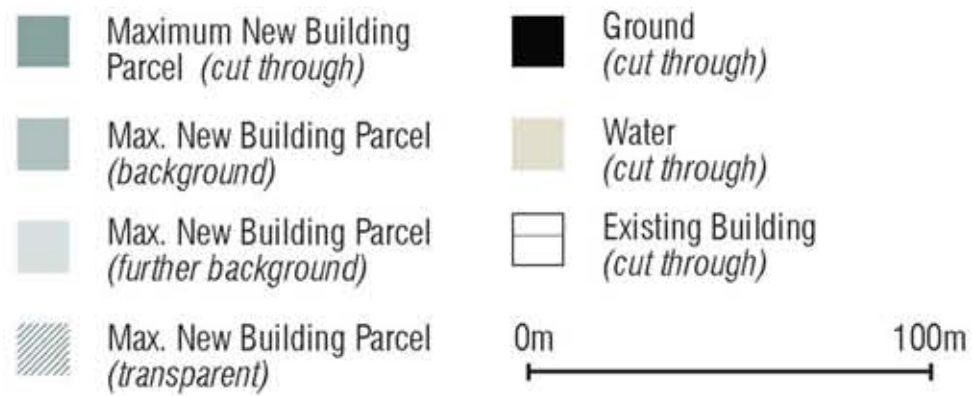
Ad-Hoc Helipads



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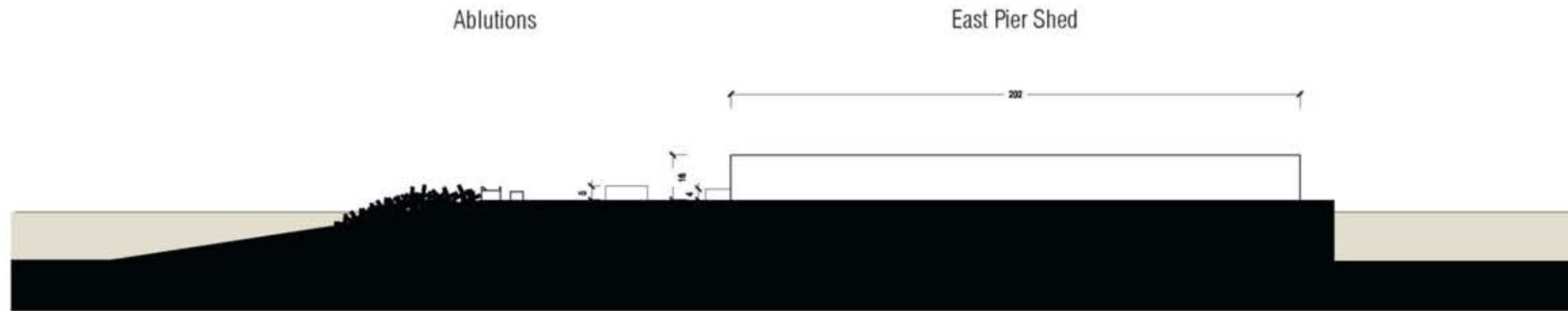


SECTION CC_PROPOSED

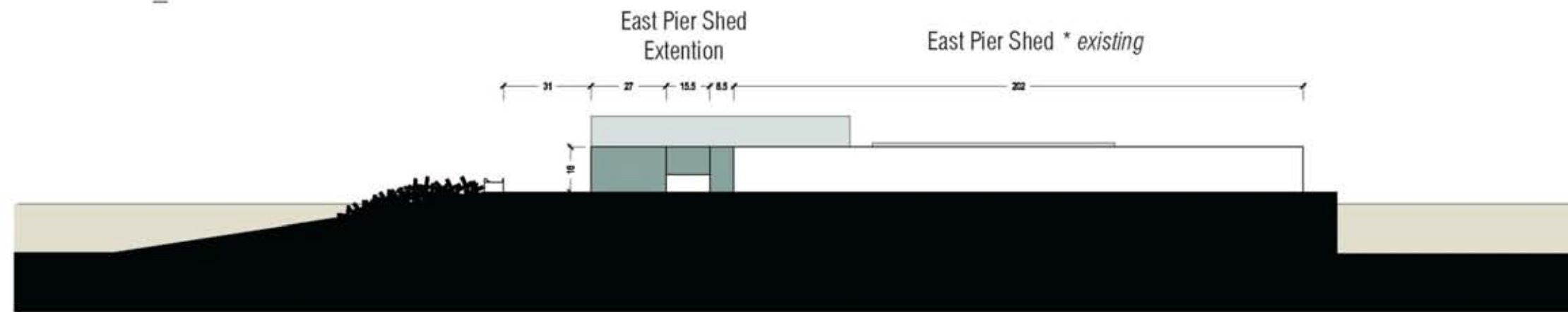


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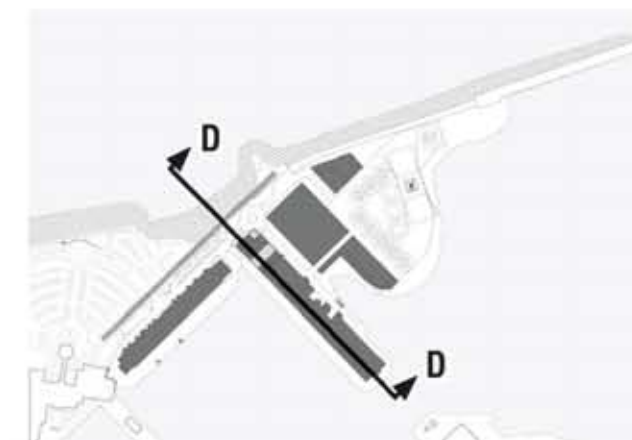


SECTION DD_EXISTING



SECTION DD_PROPOSED

- | | |
|--|--|
|  Maximum New Building Parcel (<i>cut through</i>) |  Ground (<i>cut through</i>) |
|  Max. New Building Parcel (<i>background</i>) |  Water (<i>cut through</i>) |
|  Max. New Building Parcel (<i>further background</i>) |  Existing Building (<i>cut through</i>) |
|  Max. New Building Parcel (<i>transparent</i>) | |
- 0m 100m
- 



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EXISTING



PROPOSED

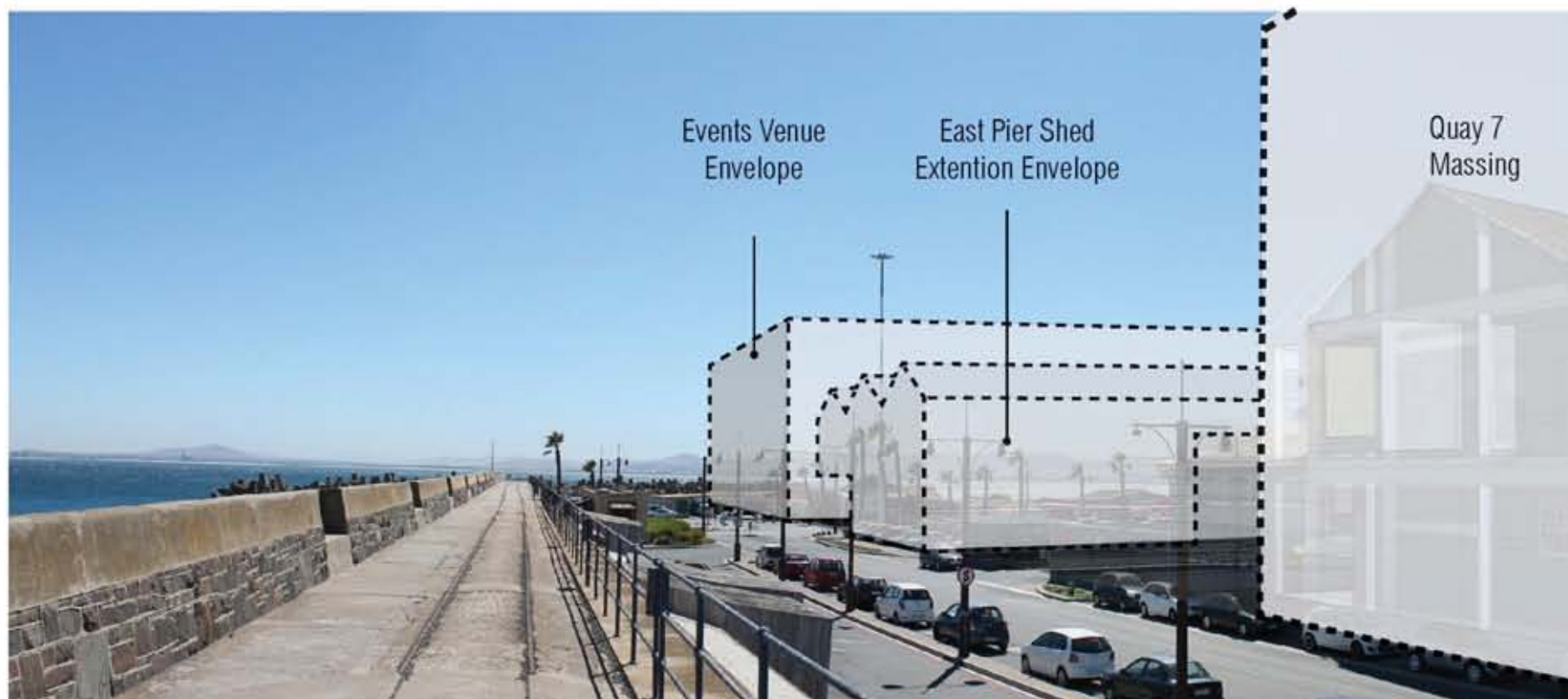


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EXISTING



PROPOSED

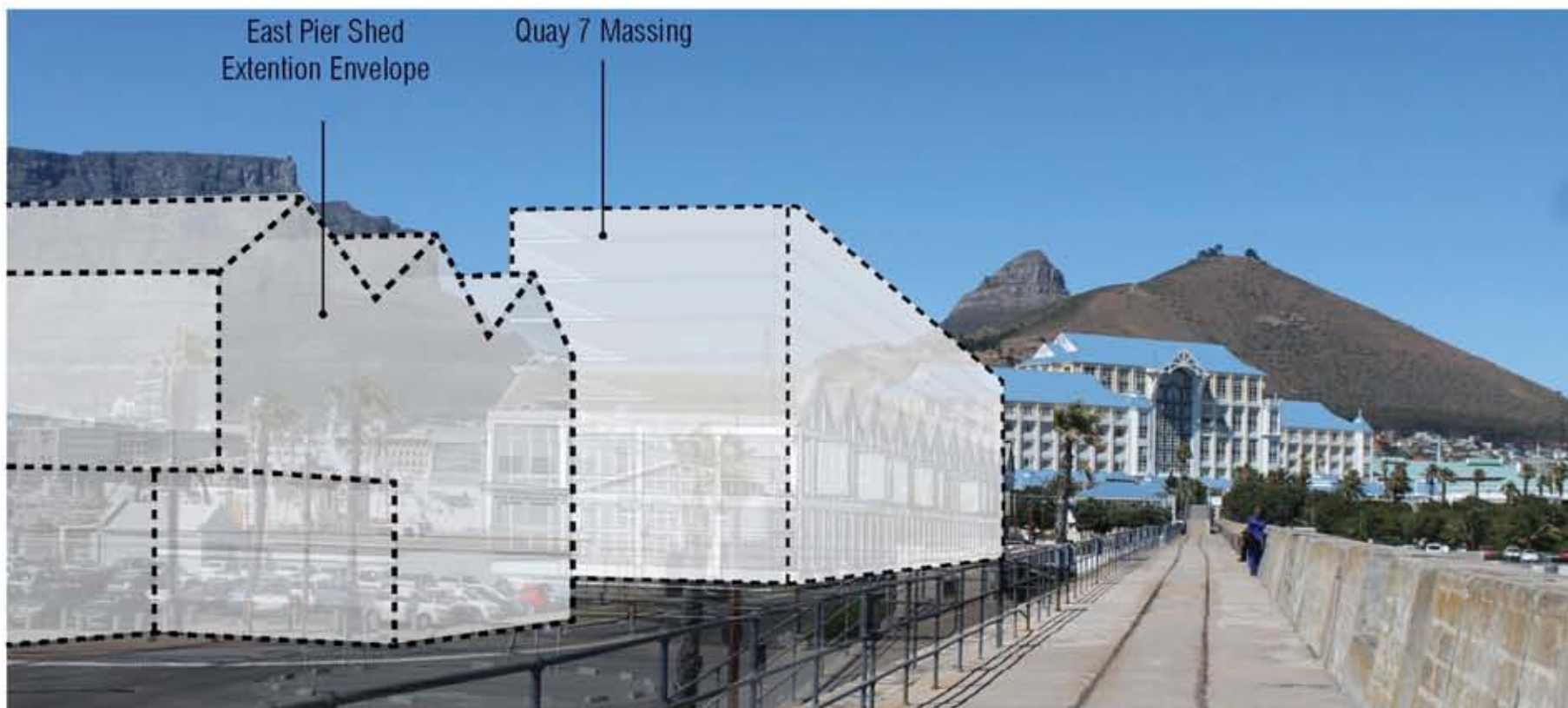


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EXISTING



PROPOSED



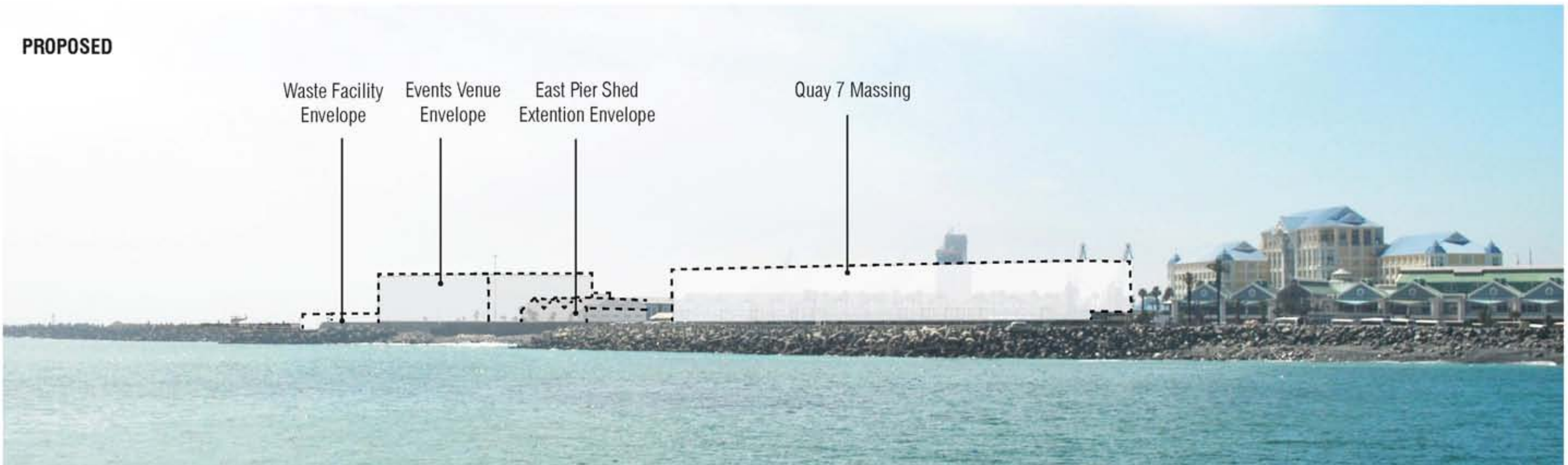
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EXISTING



PROPOSED



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EXISTING



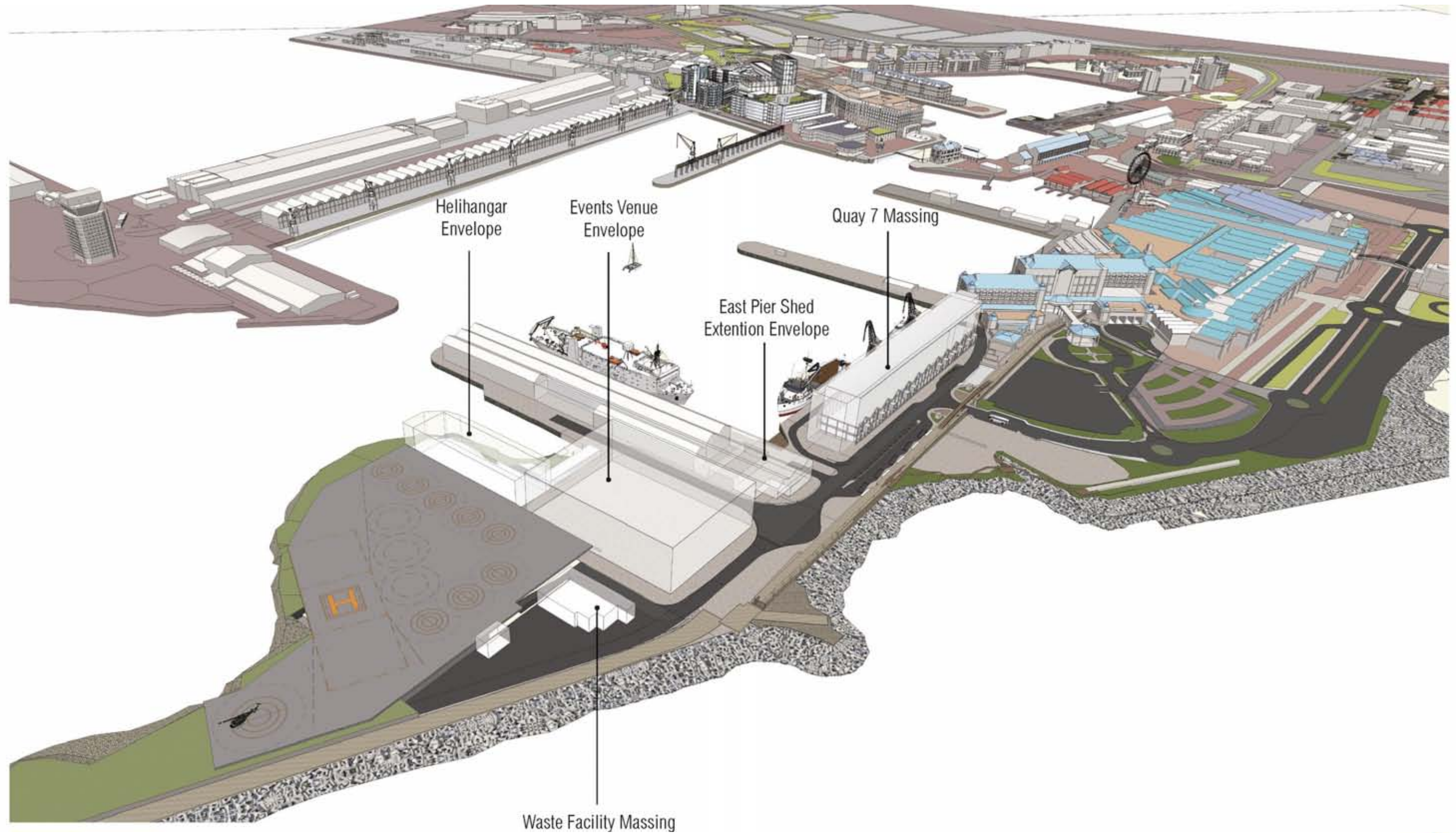
PROPOSED

Quay 7 Massing East Pier Shed Events Venue Heliport Envelope
Extension Envelope Envelope



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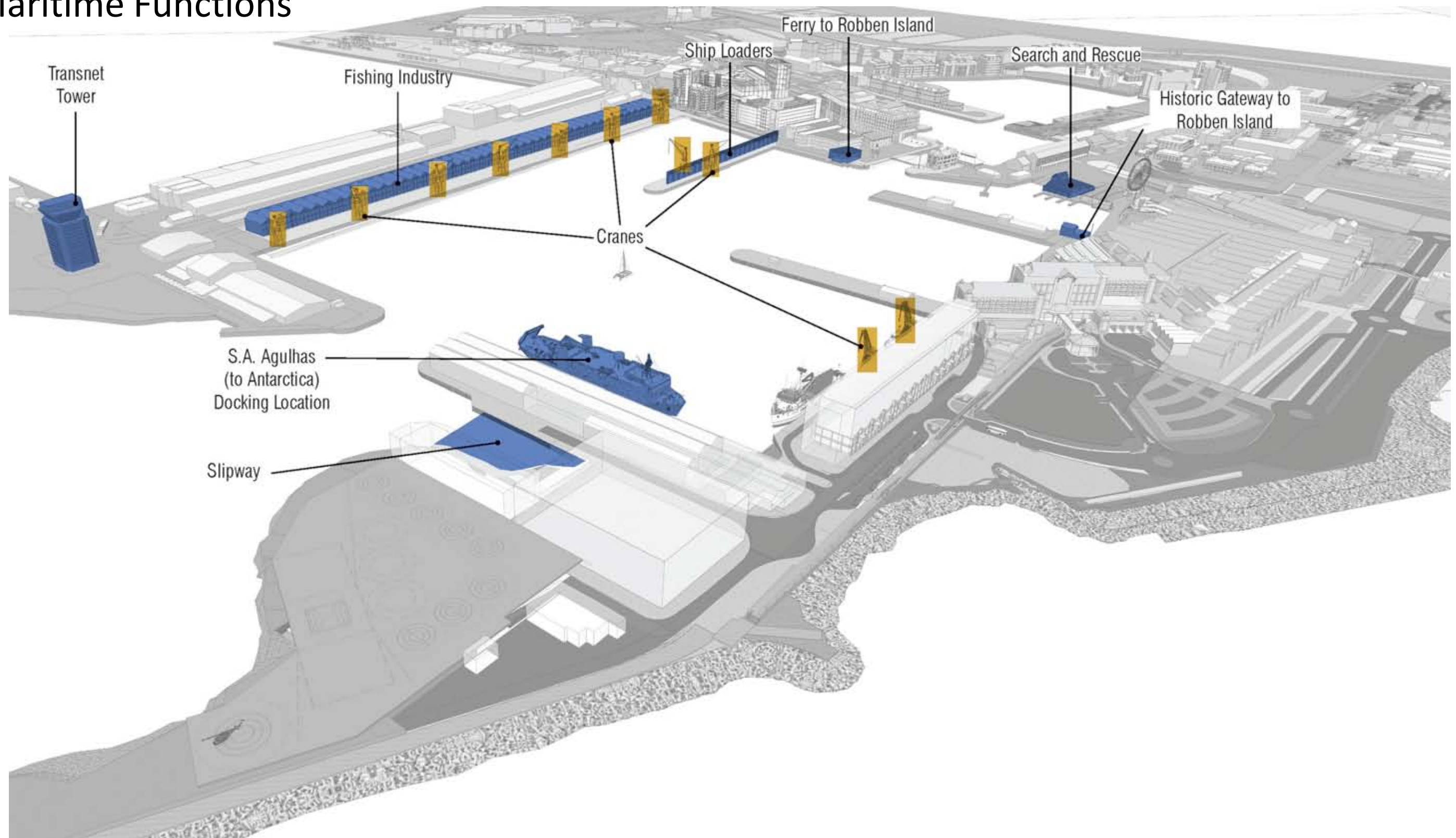
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Maritime Functions



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Contents

1. Precinct plan

2. Heritage

3. Proportion response



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HERITAGE APPROACH

FORM
MIMICRY
REINTERPRETATION.
JUXTAPOSITION



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Form

noun

1.

external appearance of a clearly defined area, as distinguished from color or material; configuration:
a triangular form.

2.

the shape of a thing or person.

4.

something that gives or determines shape; a mold.

6.

a particular condition, character, or mode in which something appears:
water in the form of ice.

7.

the manner or style of arranging and coordinating parts for a pleasing or effective result, as in literary or musical composition:
a unique form for the novel.



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Mimicry

[mim-ik-ree]

noun, plural mimicries.

1.

the act, practice, or art of mimicking.

2.

Biology. the close external resemblance of an organism, the mimic, to some different organism, the model, such that the mimic benefits from the mistaken identity, as seeming to be unpalatable or harmful.

3.

an instance, performance, or result of mimicking.



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Interpretation

[in-tur-pri-tey-shuh n]

noun

1.

the act of interpreting; elucidation; explication:

This writer's work demands interpretation.

2.

an explanation of the meaning of another's artistic or creative work; an elucidation:

an interpretation of a poem.

3.

a conception of another's behavior:

a charitable interpretation of his tactlessness.

4.

a way of interpreting.

5.

the rendering of a dramatic part, music, etc., so as to bring out the meaning, or to indicate one's particular conception of it.

6.

oral translation.



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Juxtaposition

,dʒʌkstəpə'zɪʃ(ə)n/

noun

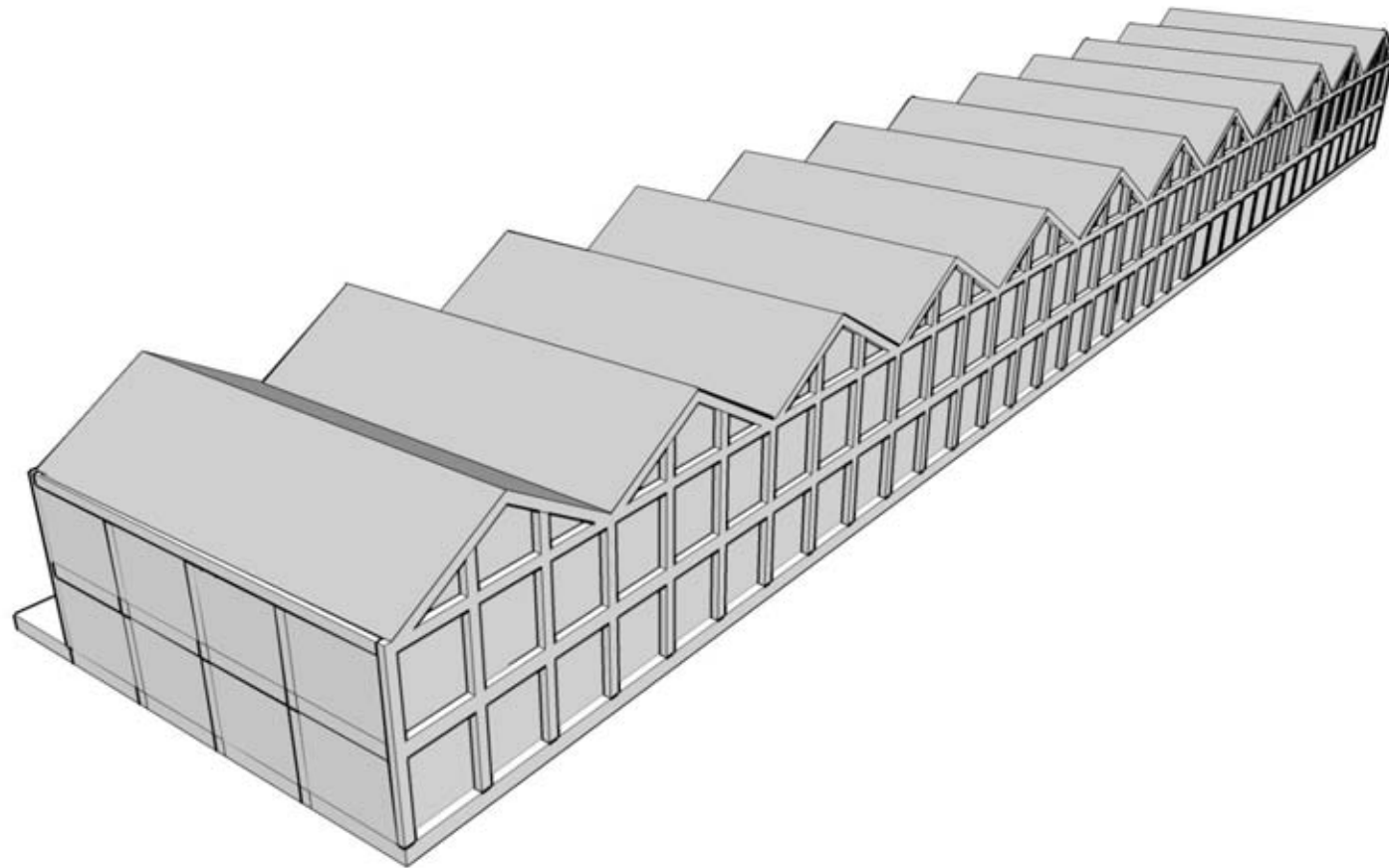
the fact of two things being seen or placed close together with contrasting effect.

"the juxtaposition of these two images"



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DESCRIPTION

Retain existing structure and refurbish.

IMPLICATIONS FOR EXISTING STRUCTURE

- Replace asbestos cement roof sheeting with new aluminium roof sheeting.
- Repair spalling concrete on façade and coat with specialist corrosion inhibitor.
- Remove brickwork cladding to perimeter columns, install new plastic ties fixed to existing steelwork and re-build brickwork to match existing cladding.
- Repair spalling concrete to internal slabs.
- Wire-brush clean and re-prime and paint existing steelwork where required.

BASEMENT PARKING

Not applicable

FOUNDATION SOLUTION

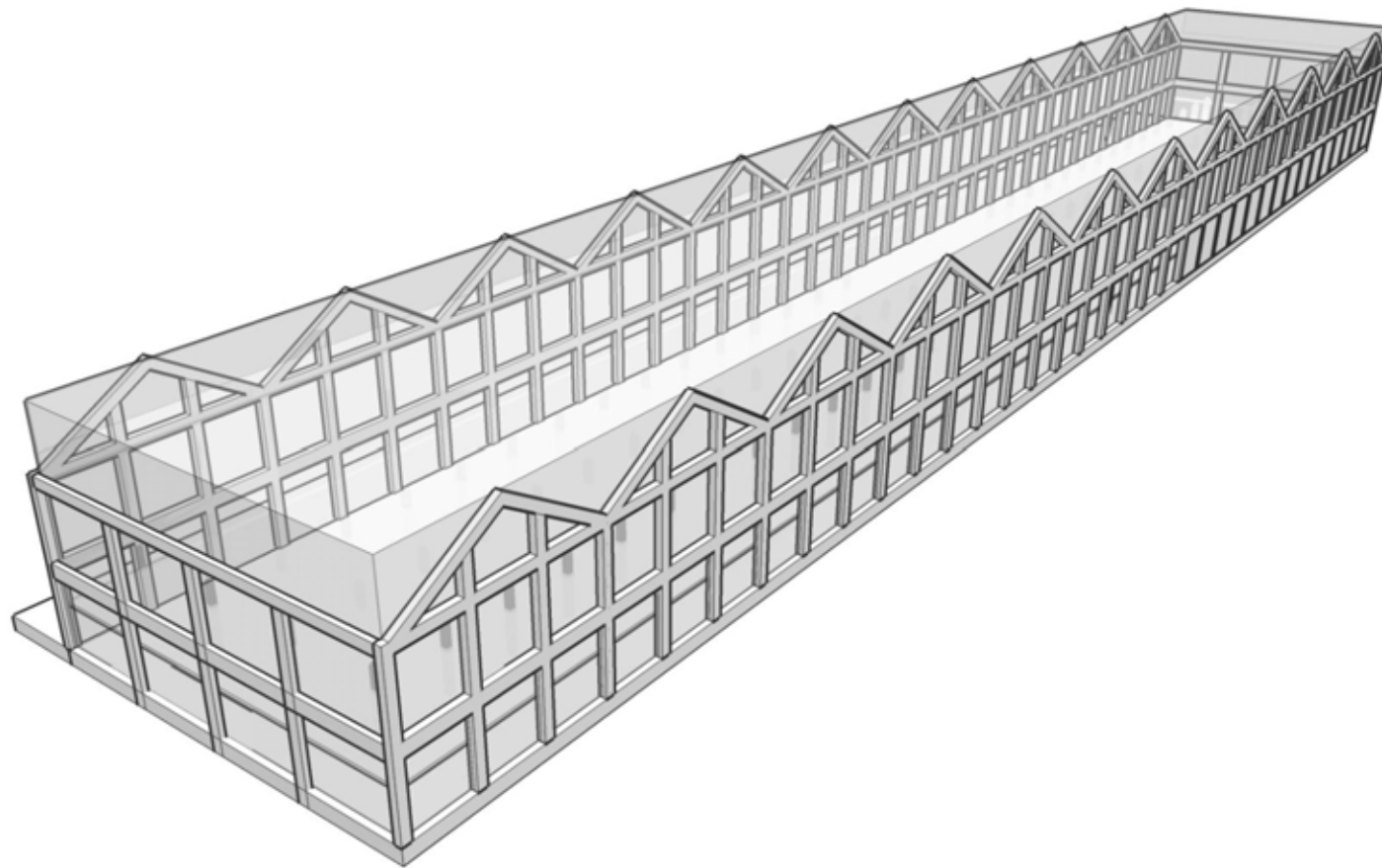
Not applicable

DEVELOPMENT SCENARIOS | SCENARIO 1



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DESCRIPTION

Retain existing structure and add on one additional floor above the First Floor and localised areas of Mezzanine floors above Ground Level

IMPLICATIONS FOR EXISTING STRUCTURE

- Replace asbestos cement roof sheeting with new aluminium roof sheeting.
- Repair spalling concrete on façade and coat with specialist corrosion inhibitor.
- Remove brickwork cladding to perimeter columns, install new plastic ties fixed to existing steelwork and re-build brickwork to match existing cladding.
- Repair spalling concrete to internal slabs.
- Wire-brush clean and re-prime and paint existing steelwork where required.
- Remove roof structure and install new lightweight floor above First Floor, and replace roof structure at a raised level (approximately 1.5m to 2m higher than existing)
- Install localised areas of lightweight floor between Ground and First Floor on independent column and footings.

BASEMENT PARKING

Not applicable

FOUNDATION SOLUTION

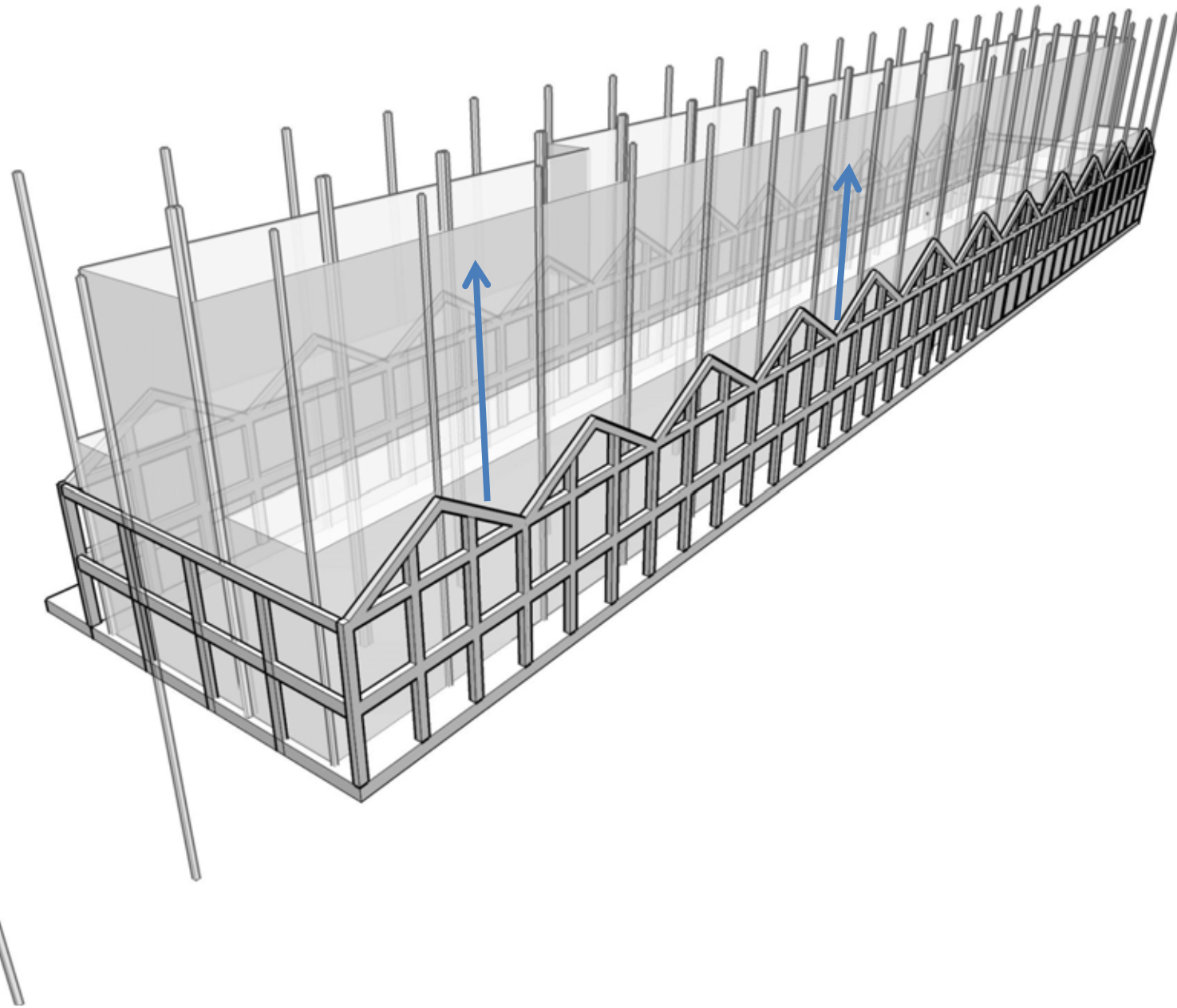
New column bases to localised areas of Mezzanine floors

DEVELOPMENT SCENARIOS | SCENARIO 2



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DESCRIPTION

Retain existing façade and build new six storey high structure within.

IMPLICATIONS FOR EXISTING STRUCTURE

- Temporarily brace perimeter structure and demolish internal structure.
- Repair spalling concrete on façade and coat with specialist corrosion inhibitor.
- Remove brickwork cladding to perimeter columns, install new plastic ties fixed to existing steelwork and re-build brickwork to match existing cladding.
- Wire-brush clean and re-prime and paint existing steelwork where required on façade.

BASEMENT PARKING

Not applicable

FOUNDATION SOLUTION

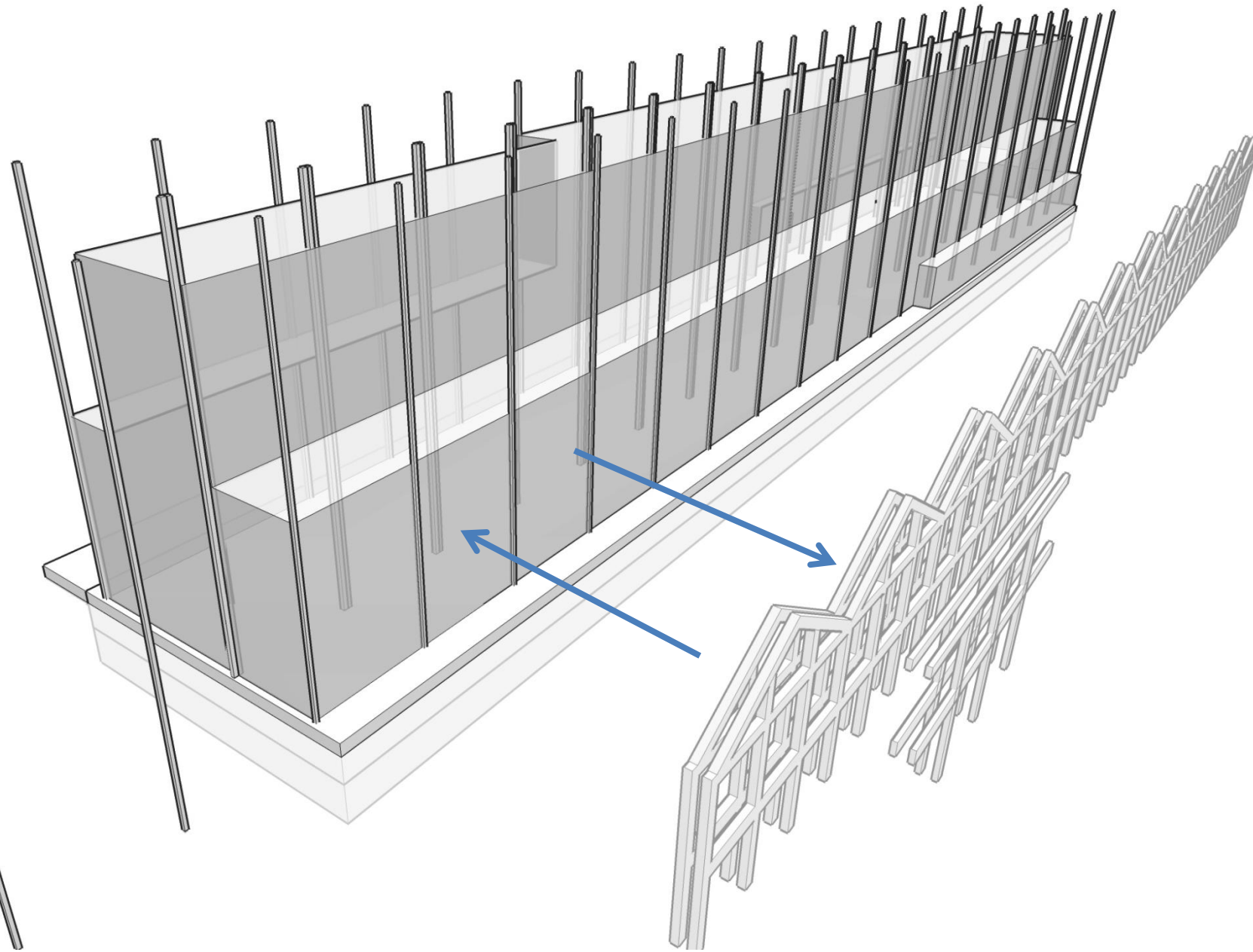
Bored piles with castings to all new columns.

DEVELOPMENT SCENARIOS | SCENARIO 3



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DESCRIPTION

Demolish entire structure. Construct new six-storey building with basement parking and two storey perimeter façade to match existing.

IMPLICATIONS FOR EXISTING STRUCTURE

- Demolish entire building.

BASEMENT PARKING

Single level of basement parking from historical quay edge to far side of East Pier Road. 1200mm deep transfer beams at high level basement to accommodate grid, which will match the grid of the existing building.

FOUNDATION SOLUTION

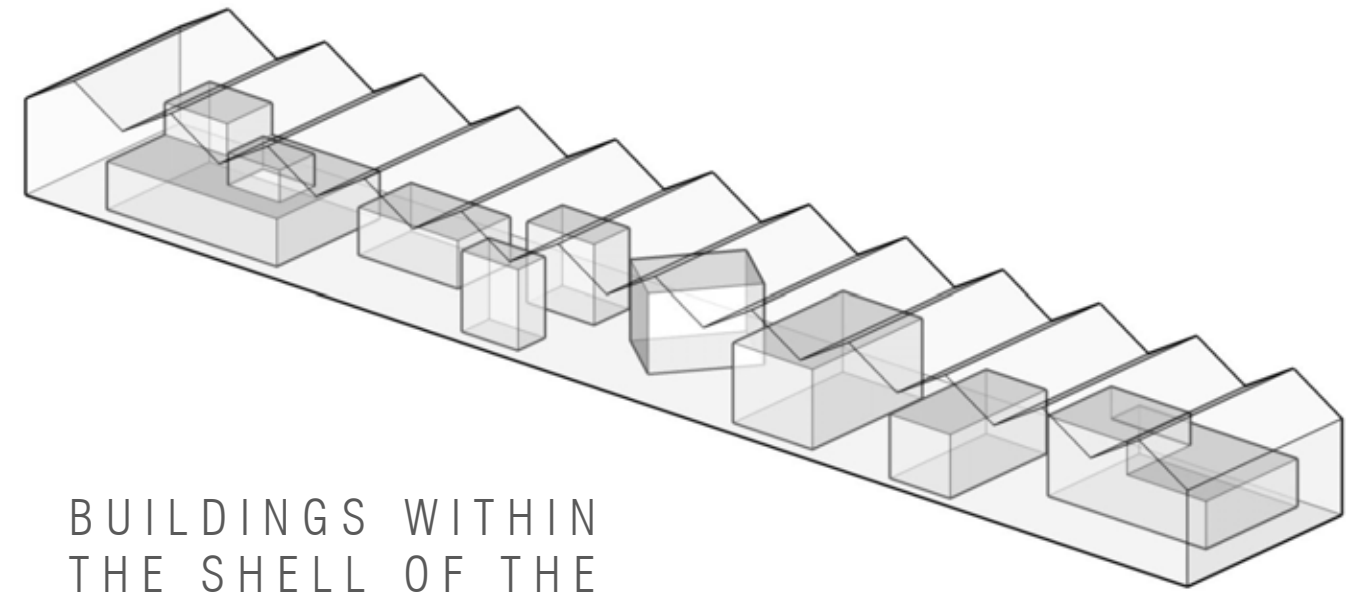
1500mm deep Raft foundation

DEVELOPMENT SCENARIOS | SCENARIO 4



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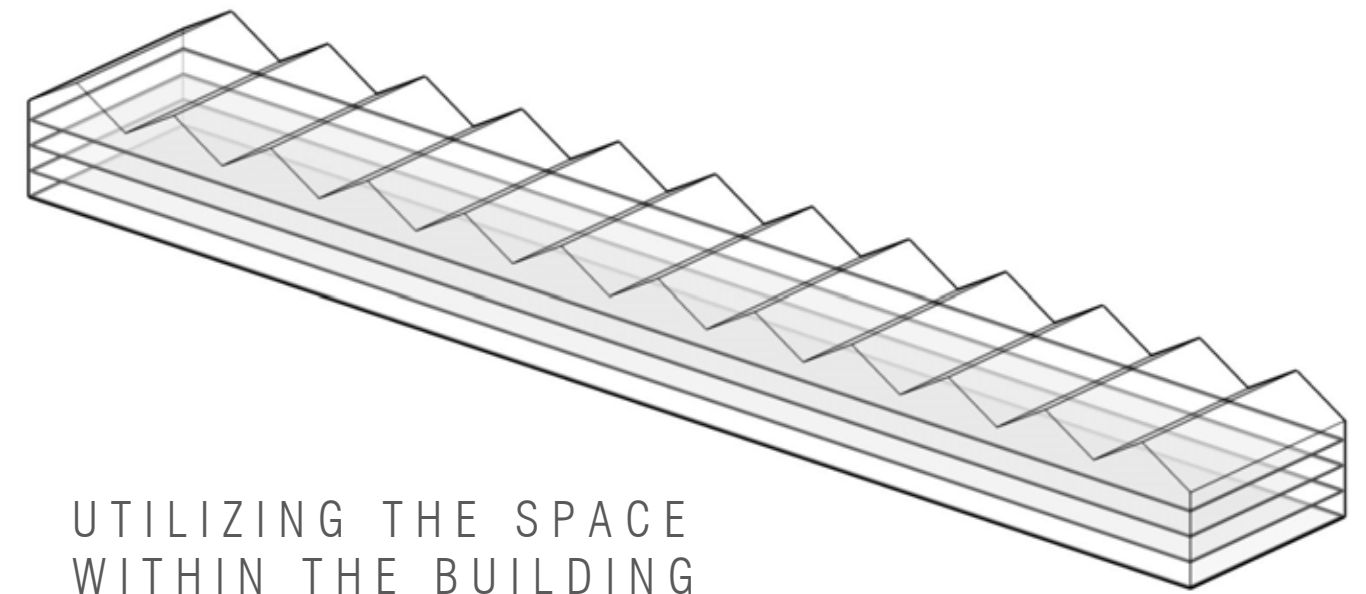
BUILDINGS WITHIN
THE SHELL OF THE
SHED

ARCHITECTURAL PRECEDENT | BUILDINGS WITHIN BUILDINGS CONCEPT



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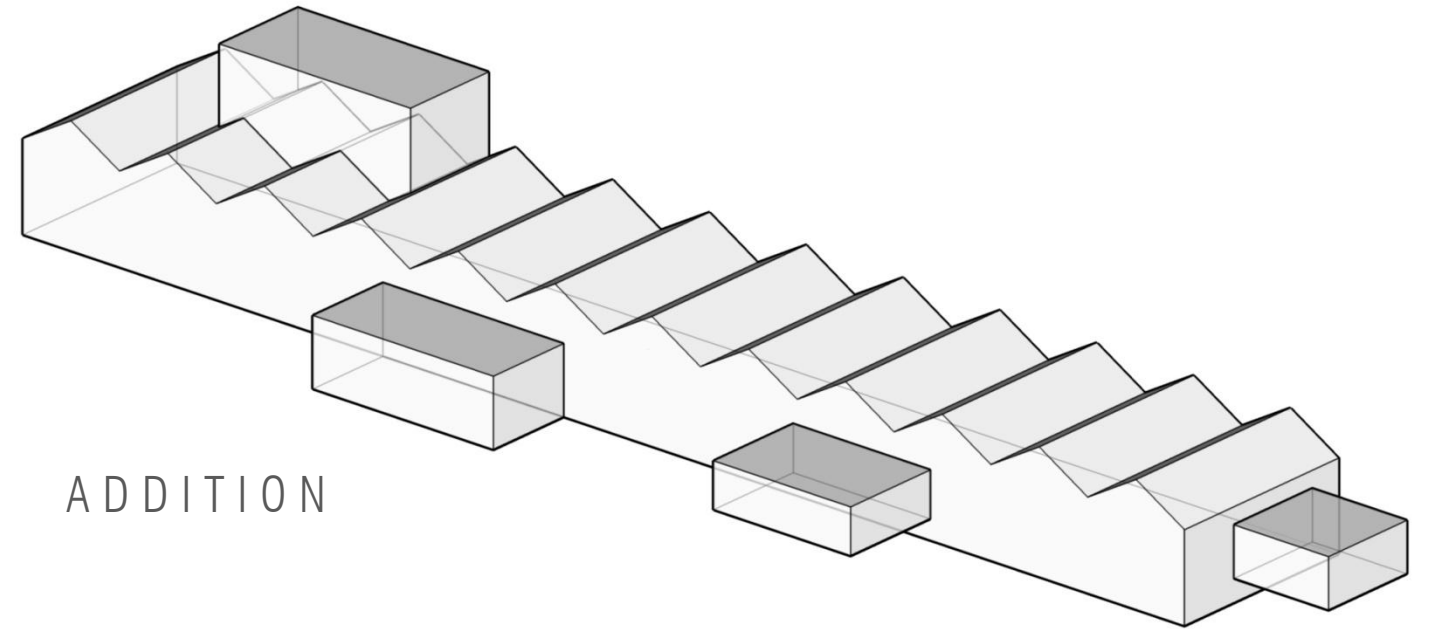
UTILIZING THE SPACE
WITHIN THE BUILDING

ARCHITECTURAL PRECEDENT | SPACES WITHIN BUILDING CONCEPT

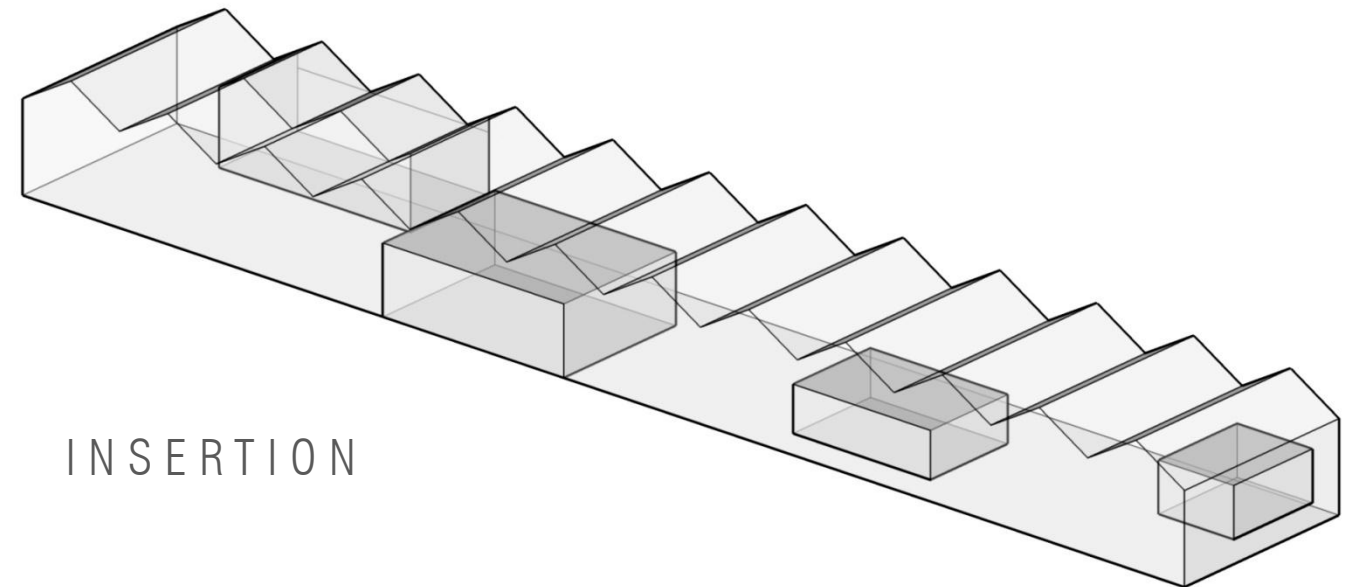


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ADDITION



INSERTION

ARCHITECTURAL PRECEDENT | INSERTION vs ADDITION



*“...the graduate School of Business extensions on either side of the historic Breakwater prison are an example of new building that responds to a dominant existing form by means of establishing an architectural language which, in its **proportions**, its use of **solid and void** elements- its window to wall relationships- shows respect and sensitivity for the older form **without striving to replicate it.**”*

Neville Dubow, VA Waterfront design guidelines 1997



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“Proportion is that agreeable harmony between the several parts of a building, which is the result of a just and regular agreement of them with each other; the height to the width, this to the length, and each of these to the whole.”

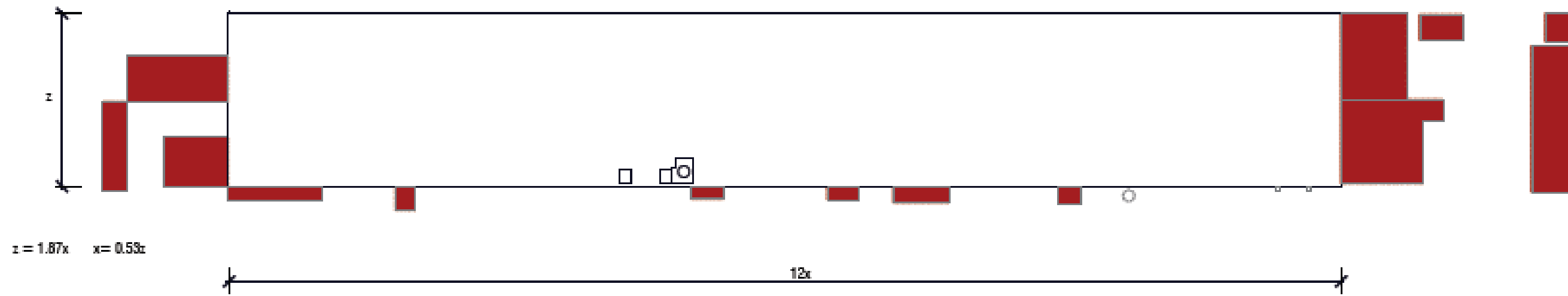
Vitruvius 15BC



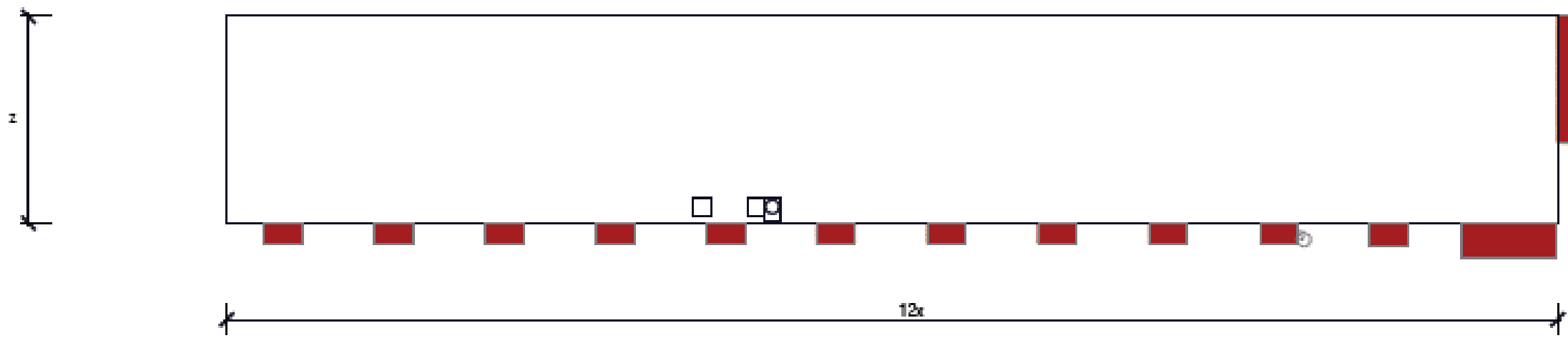
KEY

- Retaining
- Removing

This page shows the existing buildings on the Quay 7 site, in plan - outlining the main form deemed of architectural importance, and highlighting in red the elements that would be removed.



PROPORTION STUDY OF EXISTING QUAY 7 BUILDING AT GROUND LEVEL



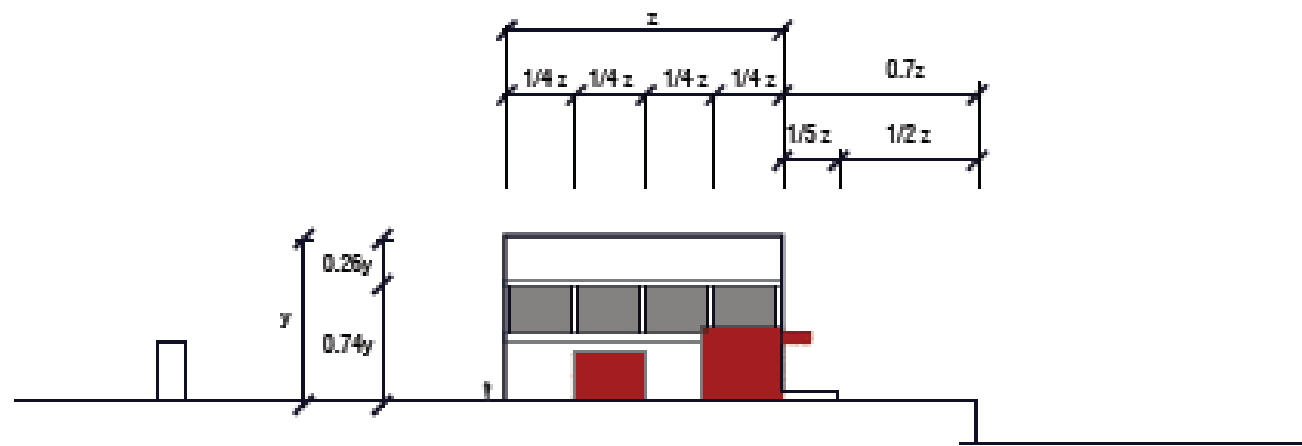
PROPORTION STUDY OF EXISTING QUAY 7 BUILDING AT 1ST FLOOR LEVEL



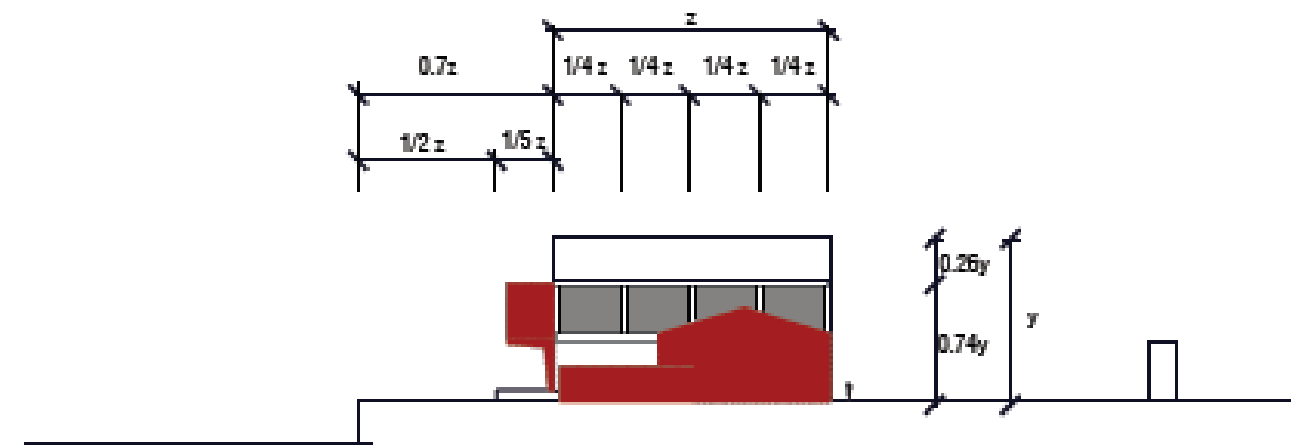
KEY	
—	Retaining_Primary Form
—	Retaining_Secondary Importance
—	Retaining_Tertiary Importance
■	Removing

This page shows the short elevations of the existing building on the Quay 7 site, outlining the main form deemed of architectural importance, and highlighting in red the elements that would be removed.

The articulated vertical and horizontal structure has also been emphasized, as these too express the character of the existing structure.



SOUTH SHORT ELEVATION OF EXISTING QUAY 7 BUILDING



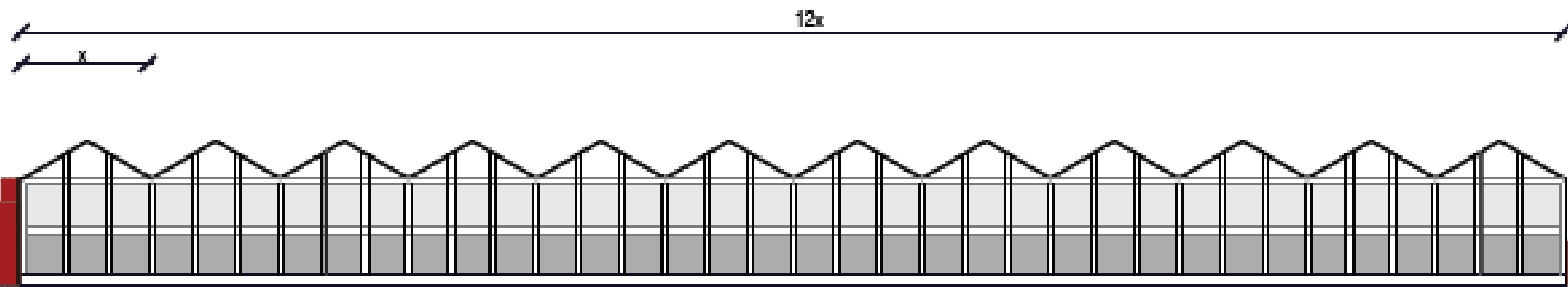
NORTH SHORT ELEVATION OF EXISTING QUAY 7 BUILDING



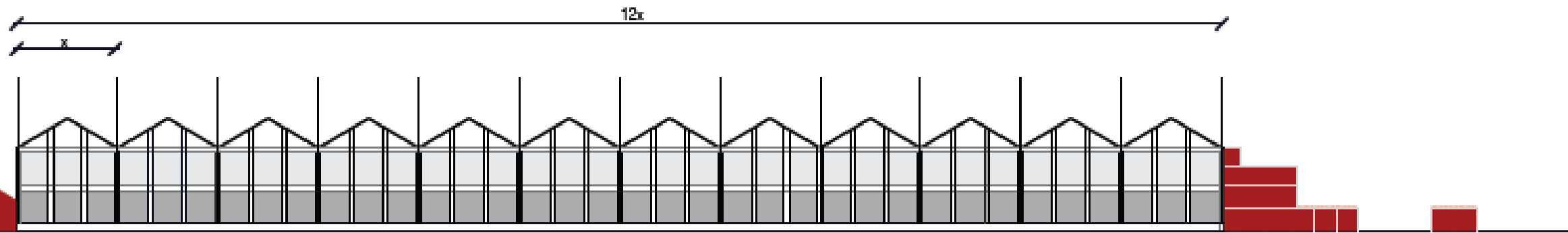
KEY	
—	Retaining_Primary Form
—	Retaining_Secondary Importance
—	Retaining_Tertiary Importance
■	Removing

This page shows the long elevations of the existing building on the Quay 7 site, outlining the main form deemed of architectural importance, and highlighting in red the elements that would be removed.

The articulated vertical and horizontal structure has also been emphasized, as these too express the character of the existing structure.



NORTH WESTERN LONG ELEVATION OF EXISTING QUAY 7 BUILDING (ROAD SIDE)



$y = 1.12x$ $x = 0.89y$

SOUTH EASTERN LONG ELEVATION OF EXISTING QUAY 7 BUILDING (HARBOUR SIDE)

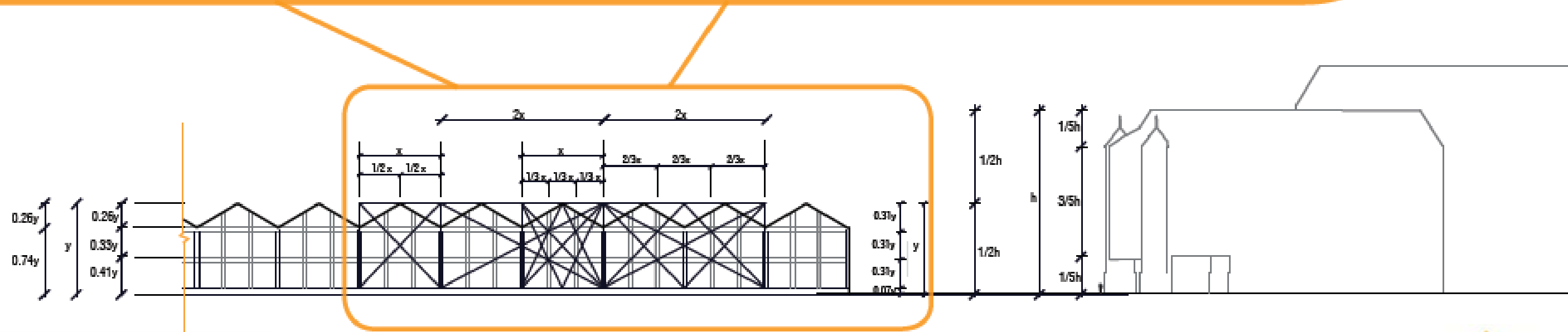
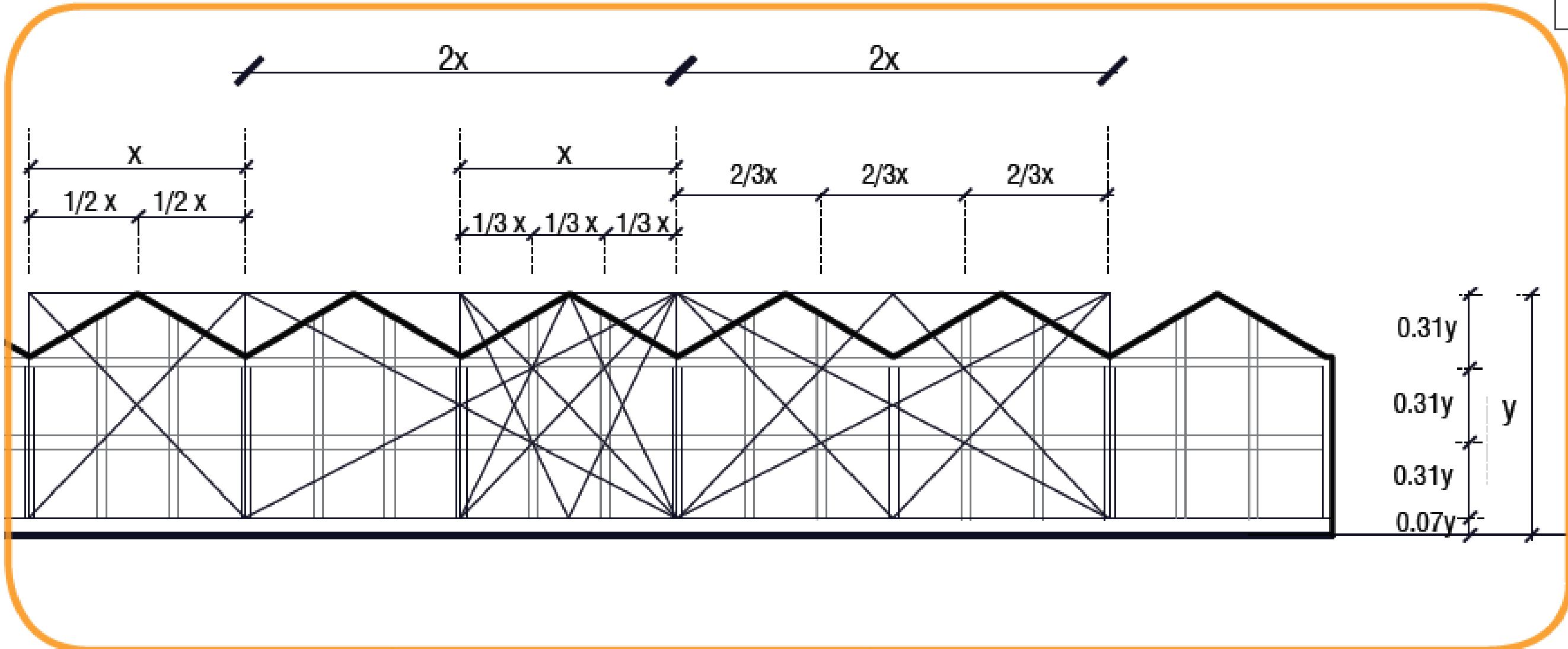


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KEY	
	Retaining_Primary Form
	Retaining_Secondary Importance
	Retaining_Tertiary Importance
	Existing Form_Context

On this page, the proportions of the existing form are analysed, with emphasis on the column order, and in relation to the near by Table Bay Hotel.



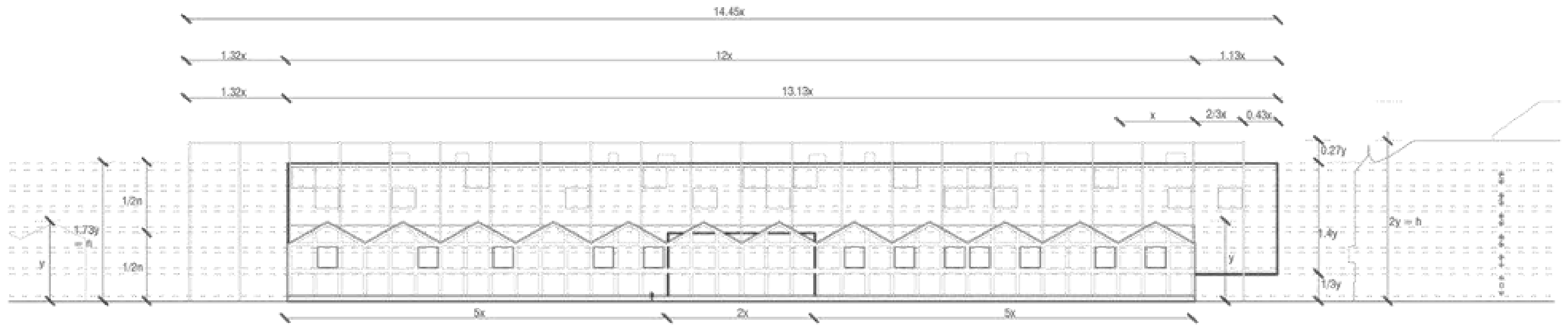
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KEY

- Proposed_Primary Form
- Proposed_Secondary Importance
- Existing_Form_Retained

On this page, the proportions of Road side elevation of the proposed building is analysed in relationship to the existing shed's form, and compared to the near by Table Bay Hotel.



NORTH WESTERN LONG ELEVATION OF PROPOSED QUAY 7 BUILDING (ROAD SIDE)



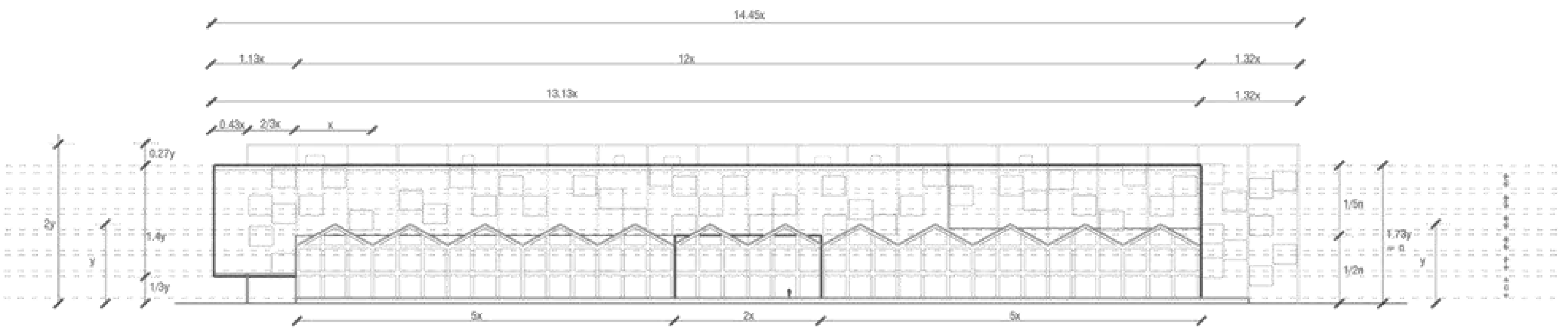
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KEY

- Proposed_Primary Form
- Proposed_Secondary Importance
- Existing_Form_Retained

On this page, the proportions of the Harbour side elevation of the proposed building is analysed in relationship to the existing shed's form.



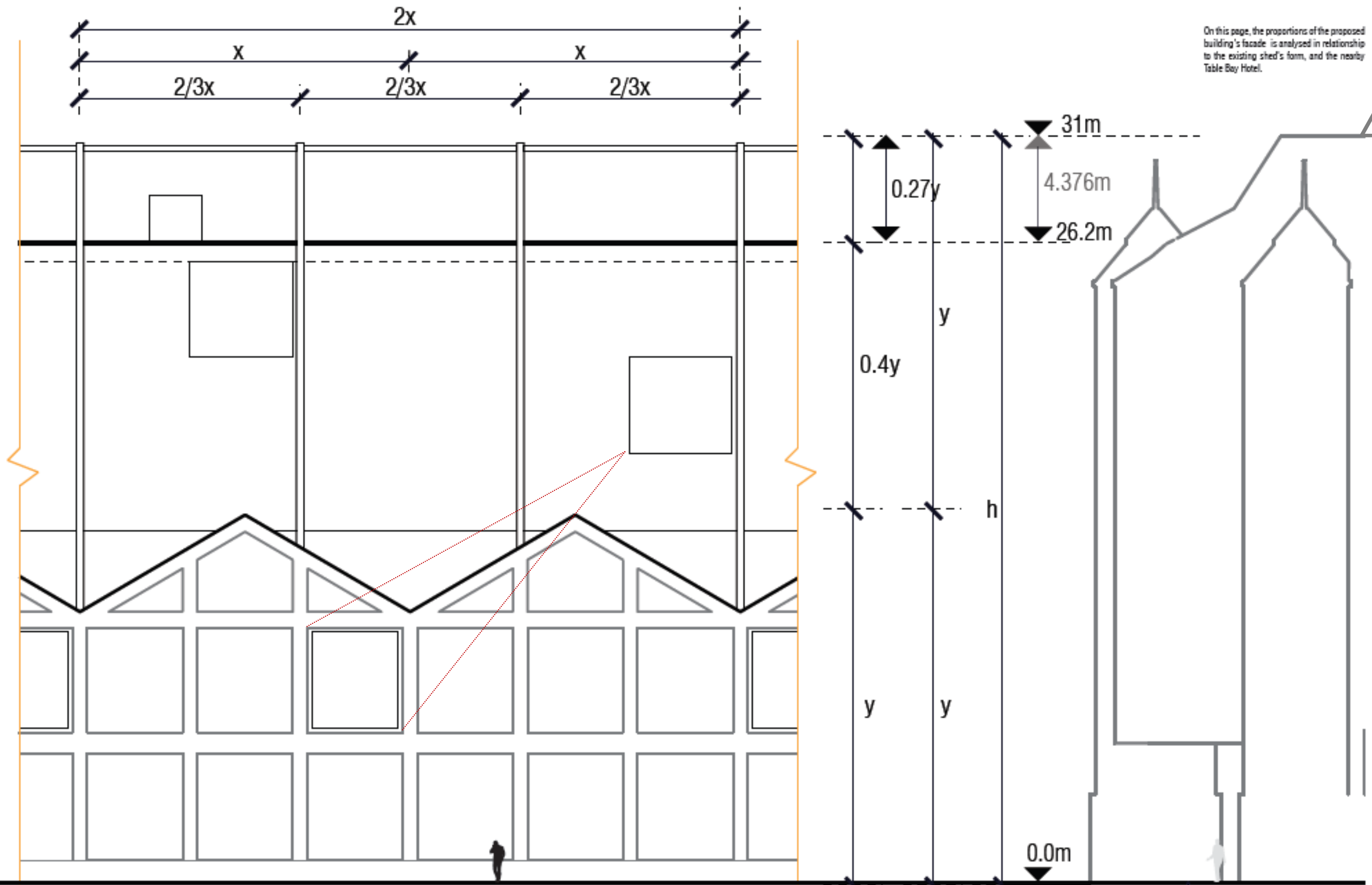
SOUTH EASTERN LONG ELEVATION OF PROPOSED QUAY 7 BUILDING (HARBOUR SIDE)



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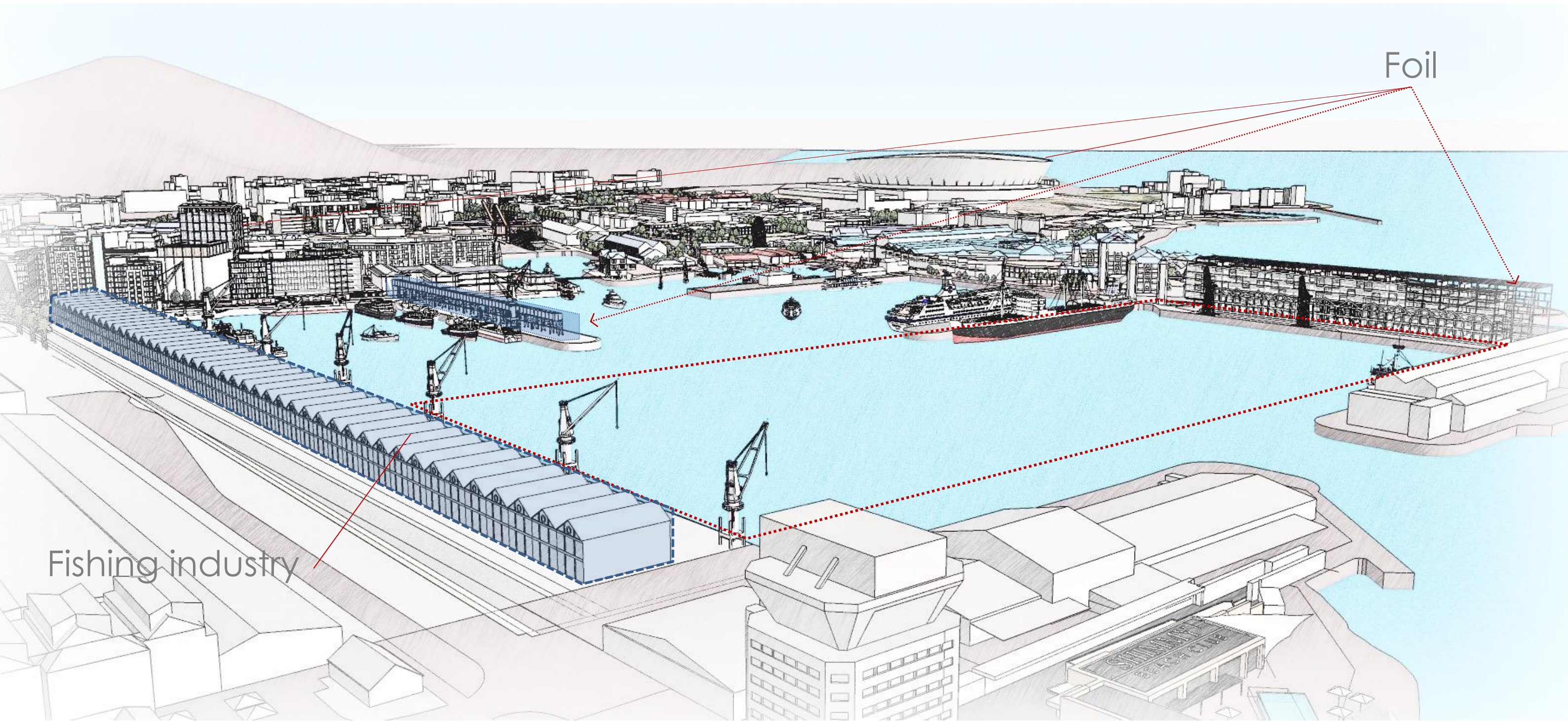
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Foil

Fishing industry



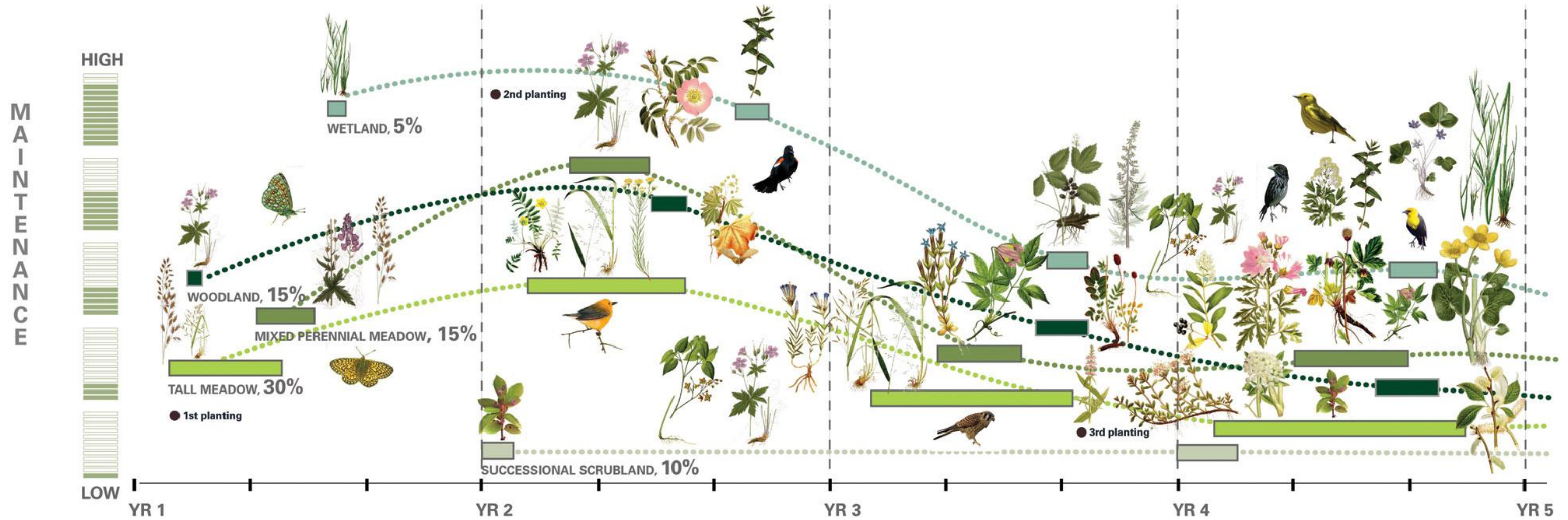
V&A NEW GREEN SPACES

Strolling through Green towards Blue - A new “Green Ribbon”



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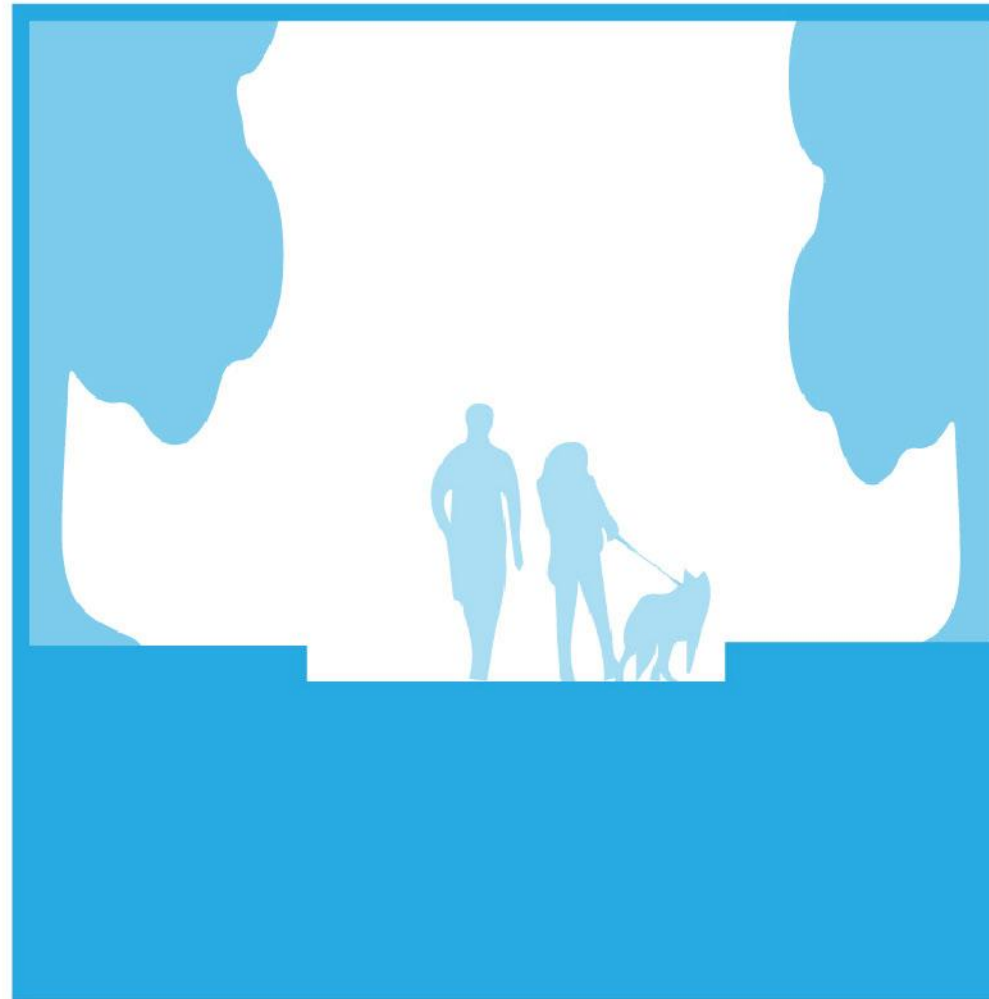
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DIVERSIFICATION IN TIME [STABILIZED MAINTENANCE / ENHANCED BIODIVERSITY]



2040



20%

OF THE V&A ARE PEDESTRIAN ZONES AND GREEN SPACES

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