

3.0 Initial Site and Massing Development

3.0 Proposed Site & Building Developments

3.1 Opportunities and Constraints

Zone C - Gateway

Zone C is intended to become the 'Gateway Building' to the site, being the first building seen as you enter the site, via the Primary Vehicle Access route.

Overall development zone size is 5200sqm.

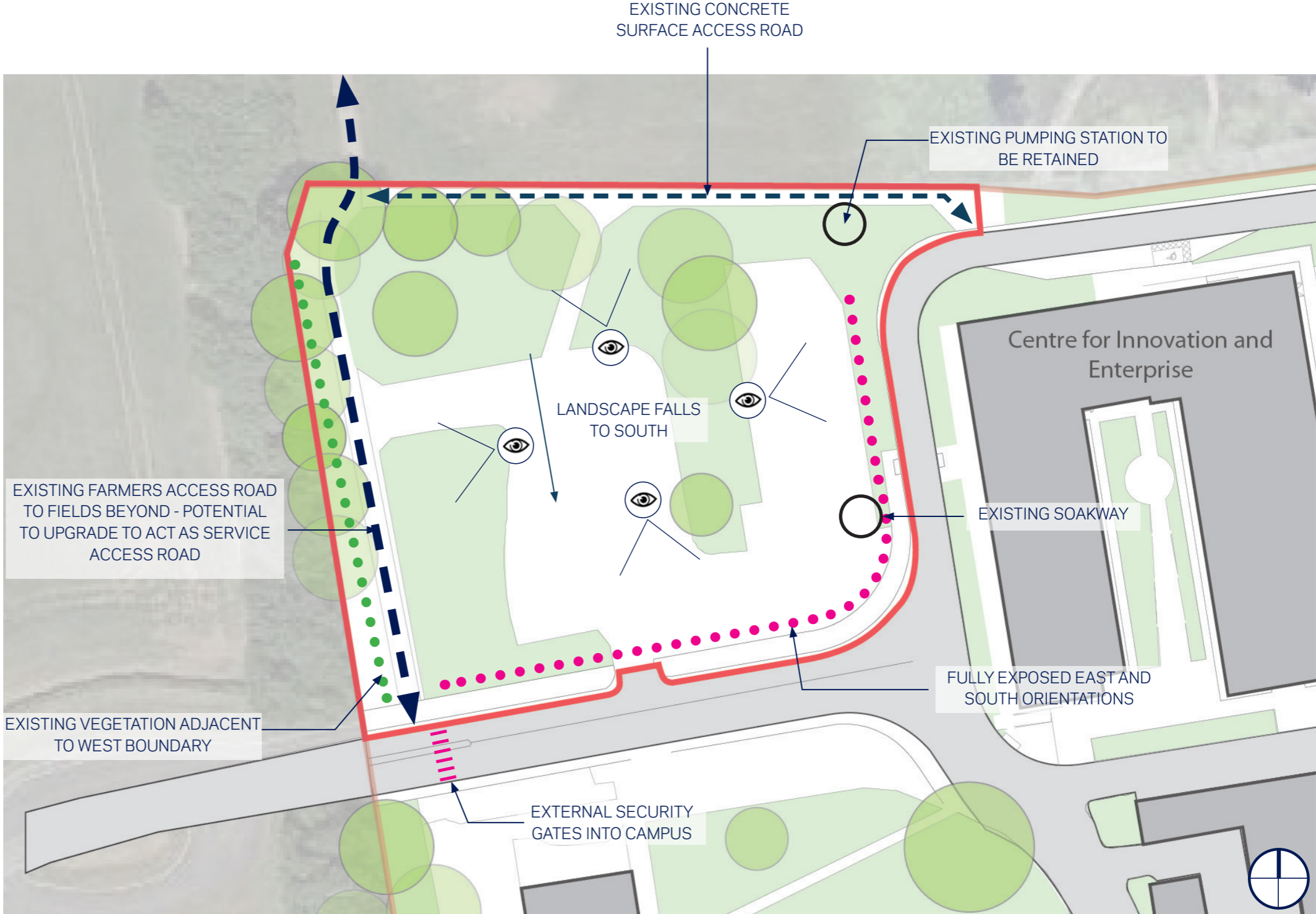
Zone C has a number of constraints and opportunities which have informed the building mass and location of the proposed development.

There is an existing pumping station which serves the rest of the campus towards the NE of the site, which restricts the area to be built on.

To the western boundary of the site, there is an existing farmers access road which albeit used infrequently, is required to be retained for future access.

Fully exposed South and East facades will require the design to consider solar shading to limit solar gain, but do provide the opportunity to open the building up to create a more welcoming and transparent feel to the campus.

Views from the site are varied - The East view is restricted by adjacent buildings and as such considered secondary. To South, West and North the views are mostly unobstructed and as such considered primary.



3.0 Proposed Site & Building Developments

3.2 Opportunities and Constraints

Zone B - Academic

Zone B is located on the North East corner of the site. The site was previously used as a reservoir, however was filled in 2004.

The overall development zone size is 4700sqm.

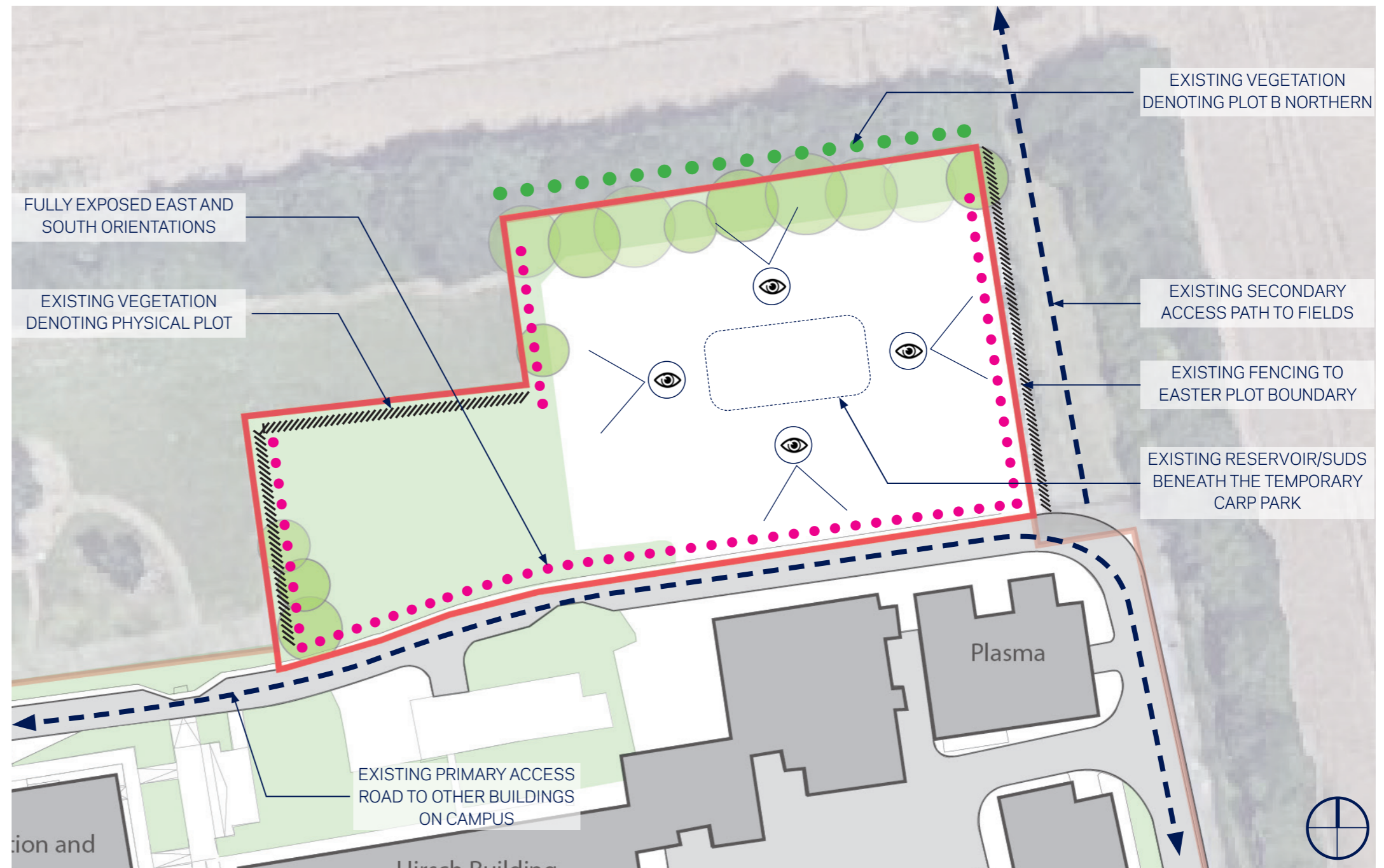
Zone B has a number of constraints and opportunities which have informed the building mass and location of the proposed development.

The northern edge of the development zone is defined by existing vegetation that creates a hard boundary. Similarly to the East, there is an existing fence line which creates a hard boundary. To western edge, there is currently a high hedge line, which creates a physical and visual boundary to the plot however is not considered high-value vegetation and can be removed to open up the site.

The development zone is highly exposed to solar gain on three sides - East, South and West - this will play a role in overall facade design and treatment, to ensure the building can limit solar gain internally.

The exposed southern side does provide an opportunity to create high quality landscaped public realm that benefits from direct sunlight.

Views from the site are generally good, with North, East and West providing primary views and South providing a slightly restricted/secondary view due to existing building fabric being in close proximity.



3.0 Proposed Site & Building Developments

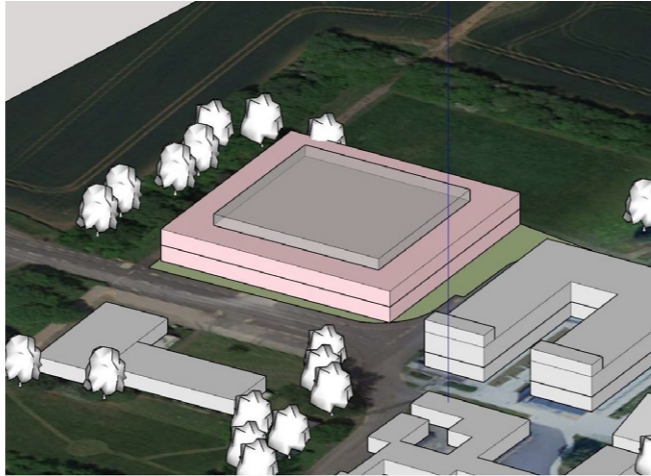
3.3 Massing Studies

Building B - Commercial Building

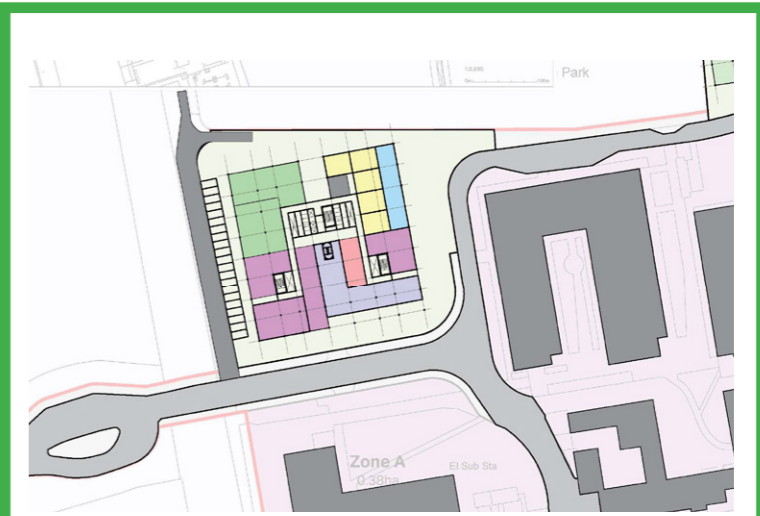
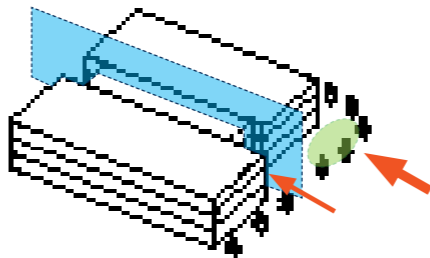
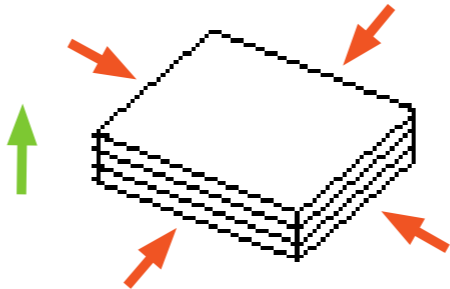
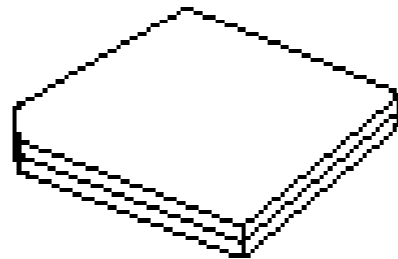
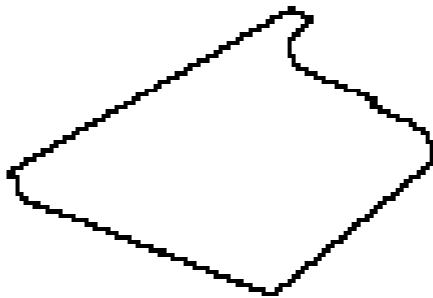
Being located on the Gateway Site, Building B is the first building that visitors and tenants will see when approaching the campus.

Building B aspires to create a new and welcoming 'arrival' into the Begbroke Science Park and therefore has a great importance and impact on the overall look & feel for the Campus.

As such, the building mass, form and orientation needs to take into consideration a number of different factors which have been studied, with pros and cons for each option identified.



- Approach 1
- Two Storey massing
 - Overly large mass occupying majority of site
 - Very deep plan, limited daylighting, unpleasant work spaces
 - Soakaway required to be relocated off site
 - Limited/no breathing space around the building
 - No opportunity for public realm
 - Limited/No space for logistics, deliveries, refuse, service yard
 - No opportunity for on-grade parking



- Approach 2
- Three Storey massing
 - Two blocks, central atrium, equal plan depths
 - 4.2m floor to floor
 - Overall building height 13 200mm above Ground
 - Compact massing,
 - Opens up corner/arrival of site for public realm
 - Increased daylighting to tenancies
 - Equal plan depths create better future flexibility
 - Retains area to the rear for service yard, and some on-grade parking
 - Opportunities around the building for public realm



3.0 Proposed Site & Building Developments

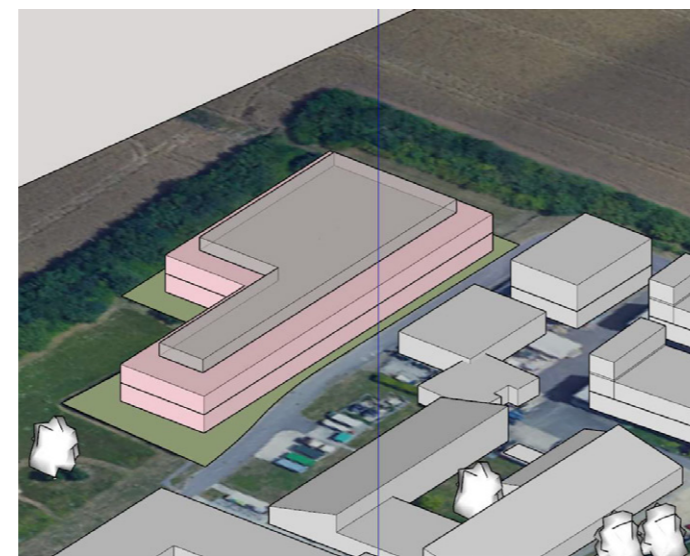
3.4 Massing Studies

Building A - Academic

Zone B boundary creates an L-shaped area which begins to inform the overall massing approach for the building.

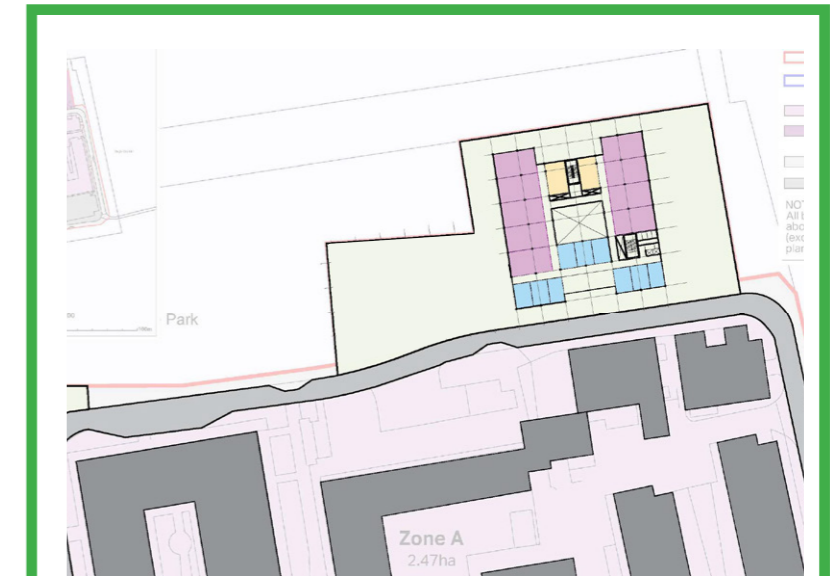
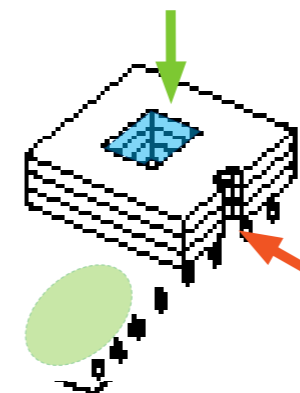
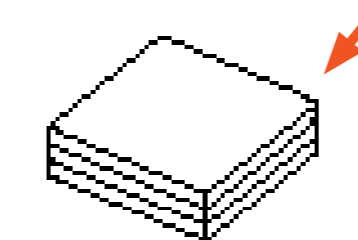
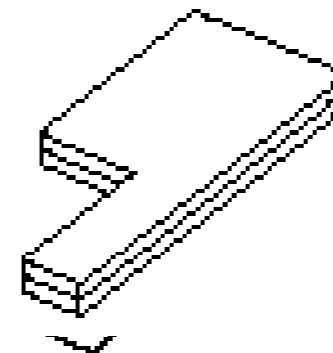
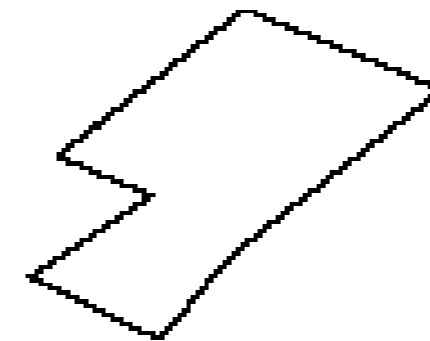
At the early design stages, a 2 storey massing scheme was explored however the result would have meant the majority of the plot being developed on leaving limited to no opportunities for servicing, parking and public realm/soft landscaping.

As such, the 2 storey option was deemed not appropriate for this plot.



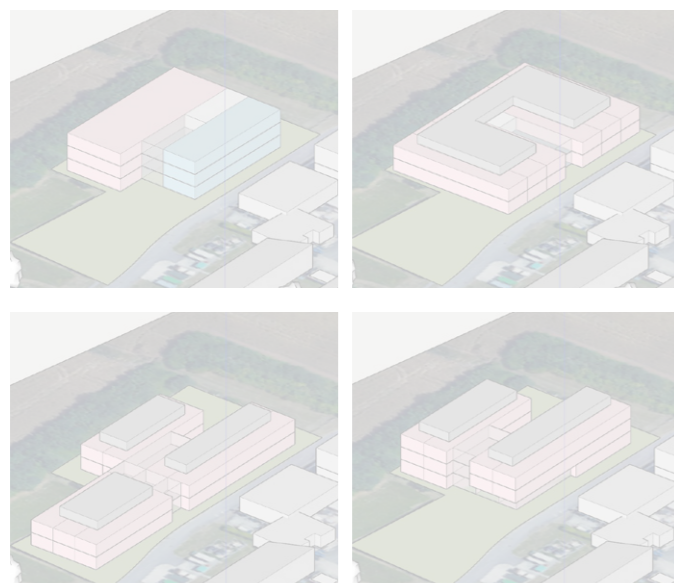
Approach 1

- Two Storey massing
- Meeting planning height restriction
- Overly large mass occupying majority of site
- Majority deep plan, limited daylighting, unpleasant work spaces
- Soakaway required to be relocated off site
- Limited breathing space around the building
- No opportunity for public realm
- Limited/No space for logistics, deliveries, refuse, service yard
- Limited/No opportunity for on-grade parking



Approach 2

- One block with central courtyard
- 4.2m floor to floor height, 13 200mm overall building height to top of parapet
- Meets planning height restriction
- Compact massing,
- Increased daylighting to tenancies
- Equal plan depths create better future flexibility
- Retains area to the rear for service yard, on-grade parking to East
- Soakaway position retained
- Opportunities around the building for public realm



4.0 Proposed Site & Building Developments

3.0 Proposed Site & Building Developments

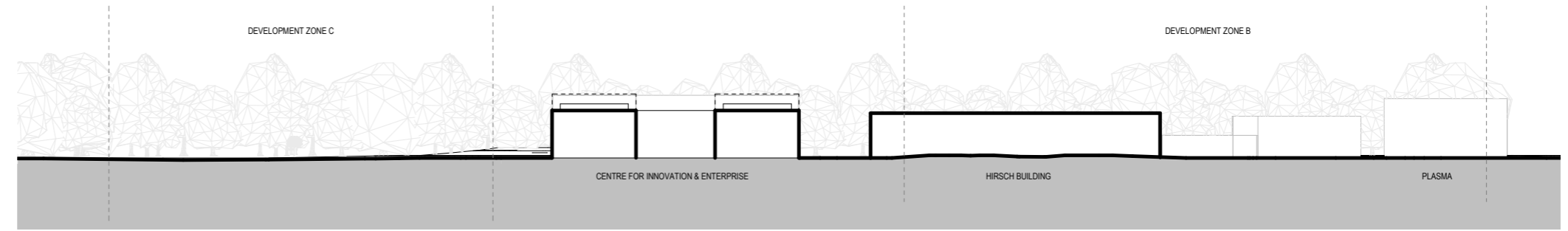
3.6 Site Sections

Existing & Proposed

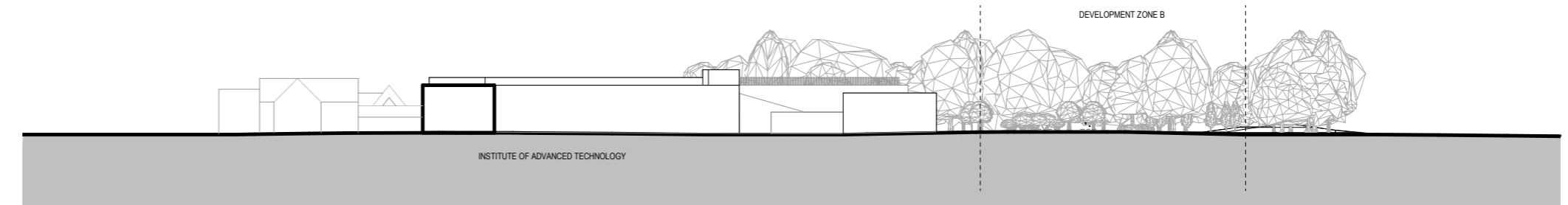
The topography of the campus is primarily flat throughout on both North/South and East/West axis allowing for new developments to sit level with the existing buildings on the science park.

The existing buildings are a mix of primarily one and two storey volumes with the tallest points reaching approximately 12.4m above ground.

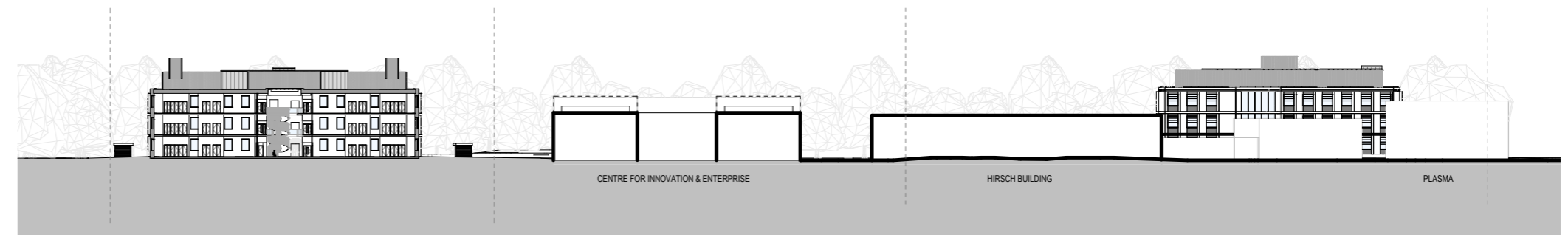
The new developments on Zones B & C will be capped at 13.2m (as approved in the Non-Material Amendment submission which increased the maximum building height from 12.6m to 13.2m when measured from ground level, excluding point features and plant) from ground to top of parapets. Topping of the buildings will be new rooftop plant rooms wrapped in continuous plant



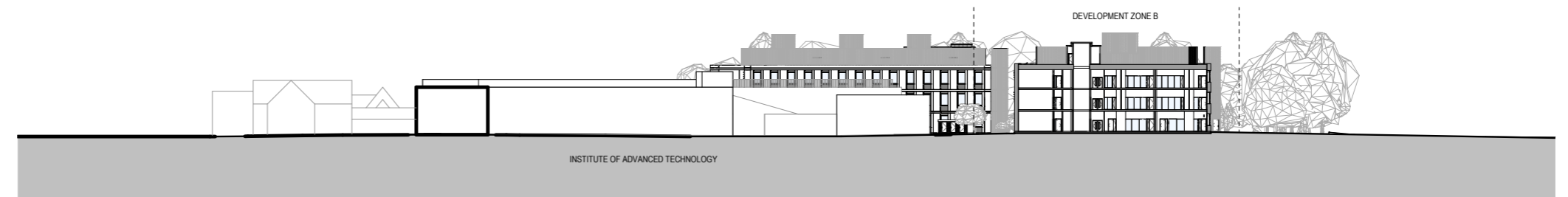
1 PLANNING SITE SECTION AA - EXISTING
1:500



2 PLANNING SITE SECTION BB - EXISTING
1:500



1 PLANNING SITE SECTION AA - PROPOSED
1:500



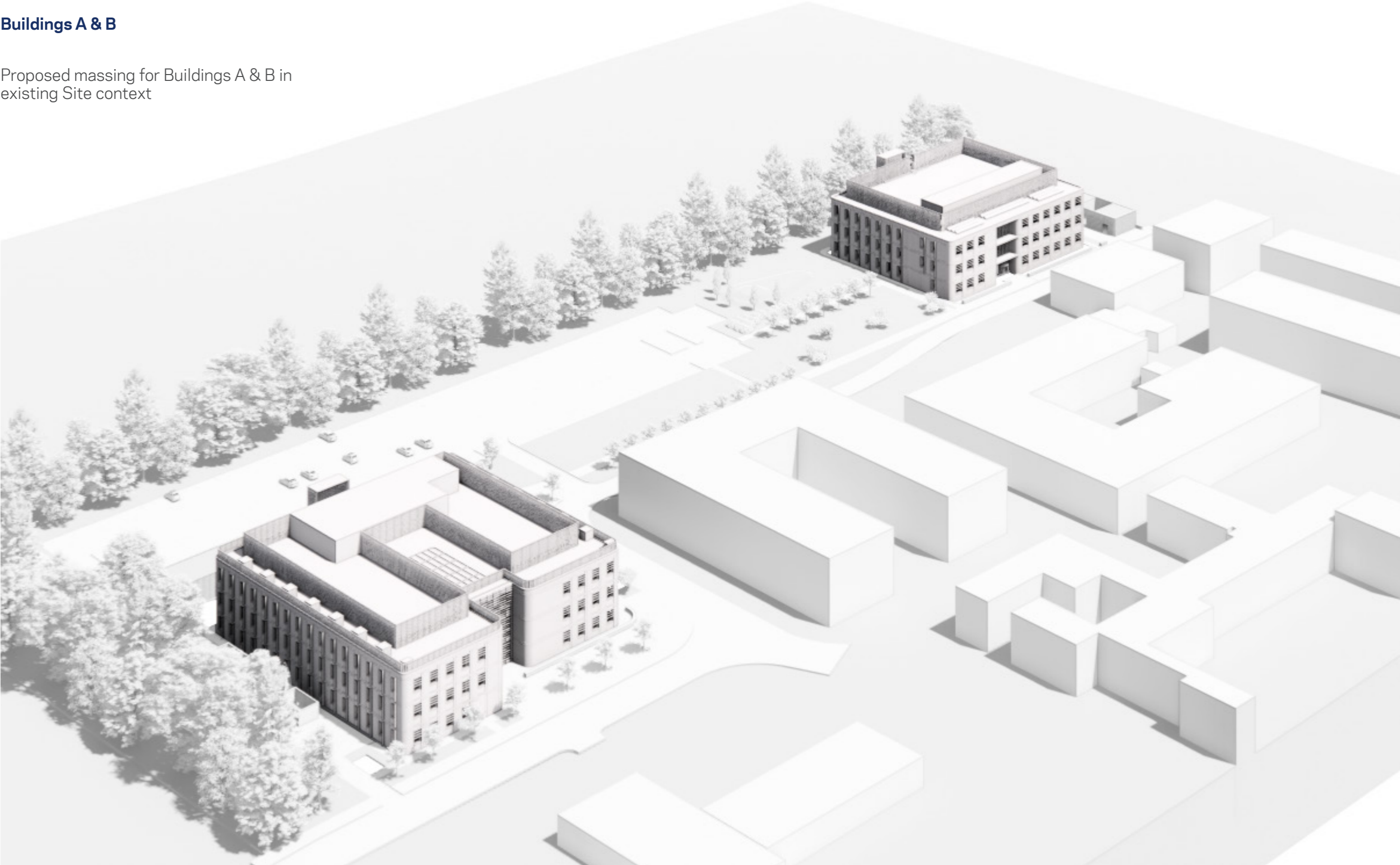
2 PLANNING SITE SECTION BB - PROPOSED
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3.0 Proposed Site & Building Developments

3.6 Proposed Massing

Buildings A & B

Proposed massing for Buildings A & B in existing Site context



3.0 Proposed Site & Building Developments

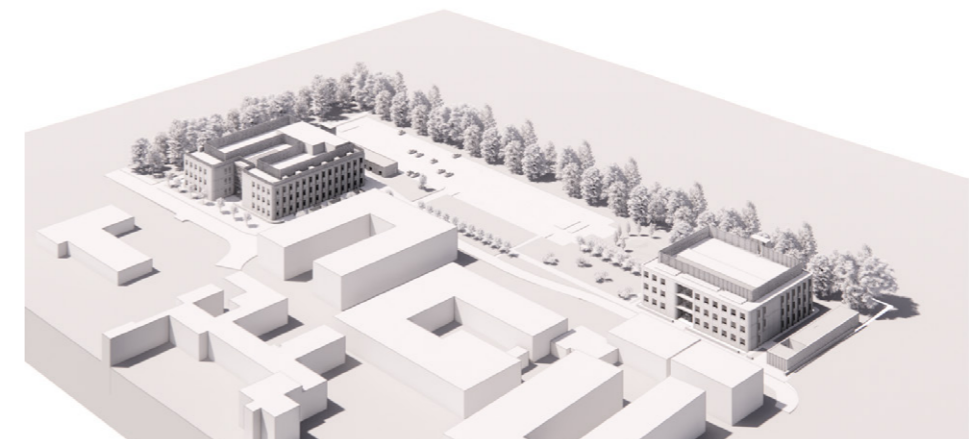
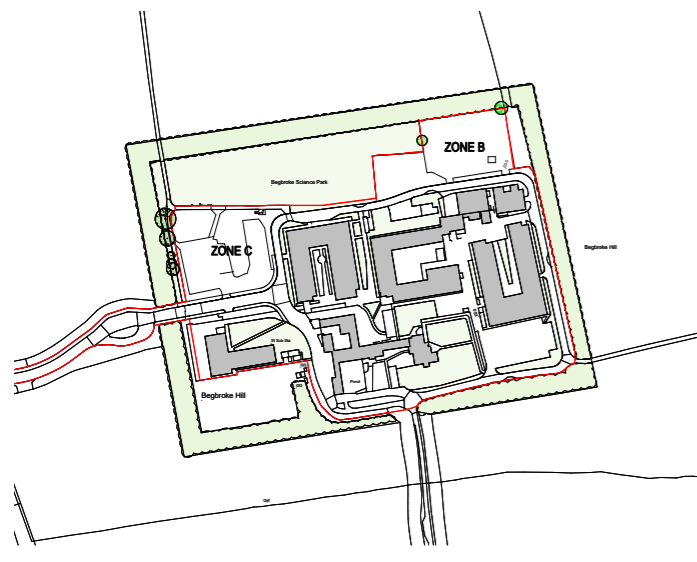
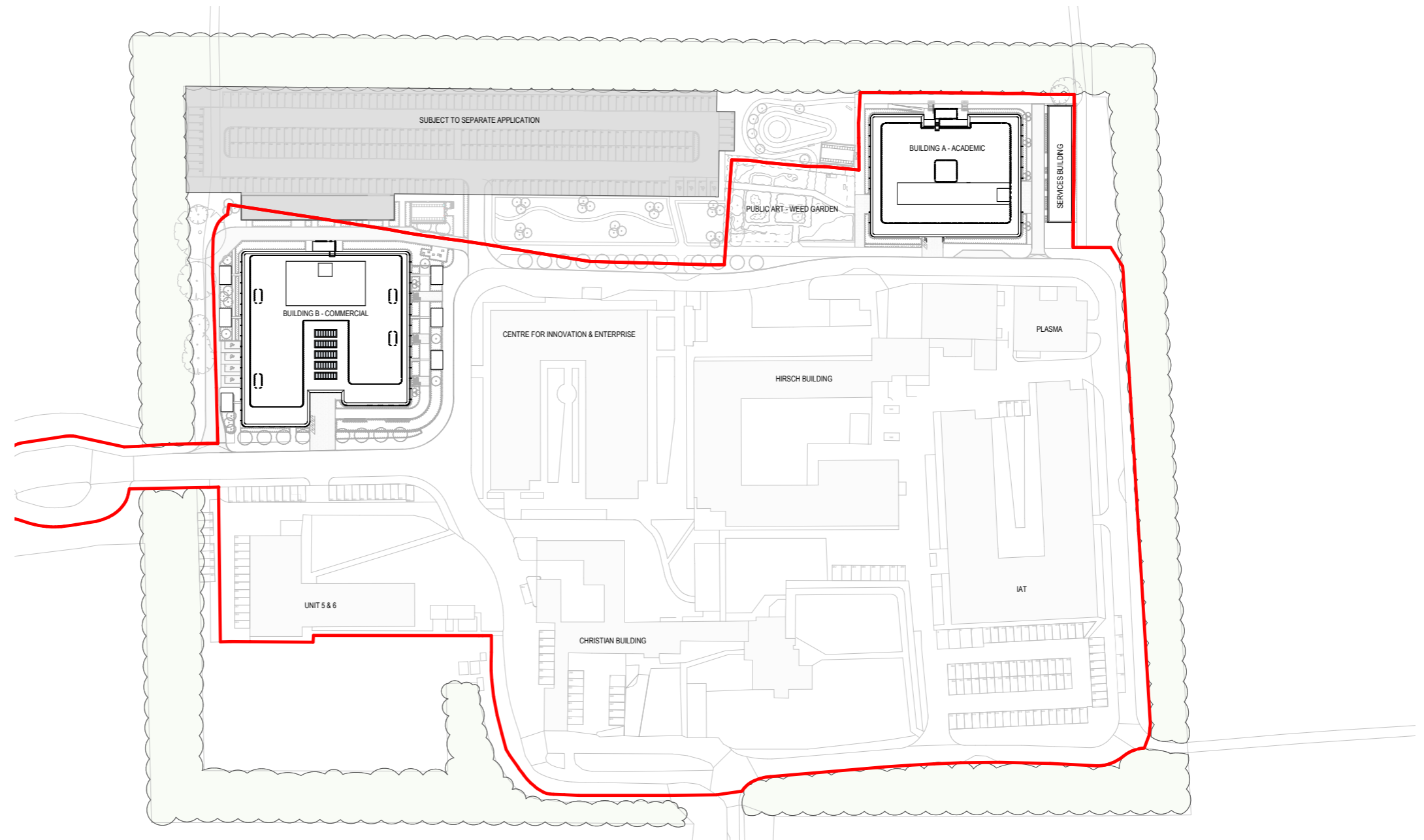
3.5 Proposed Campus Plan

Buildings A & B

The proposed campus plan shows the proposed new developments on Zones B & C in a wider context.

The proposed buildings seek to relate to the current built context by following the existing building lines and orientations, whilst seeking to build a 'landscape corridor' between the two new development zones.

The plan also shows indicative area marked for new on-grade temporary car park zone alongside the northern edge of the campus.



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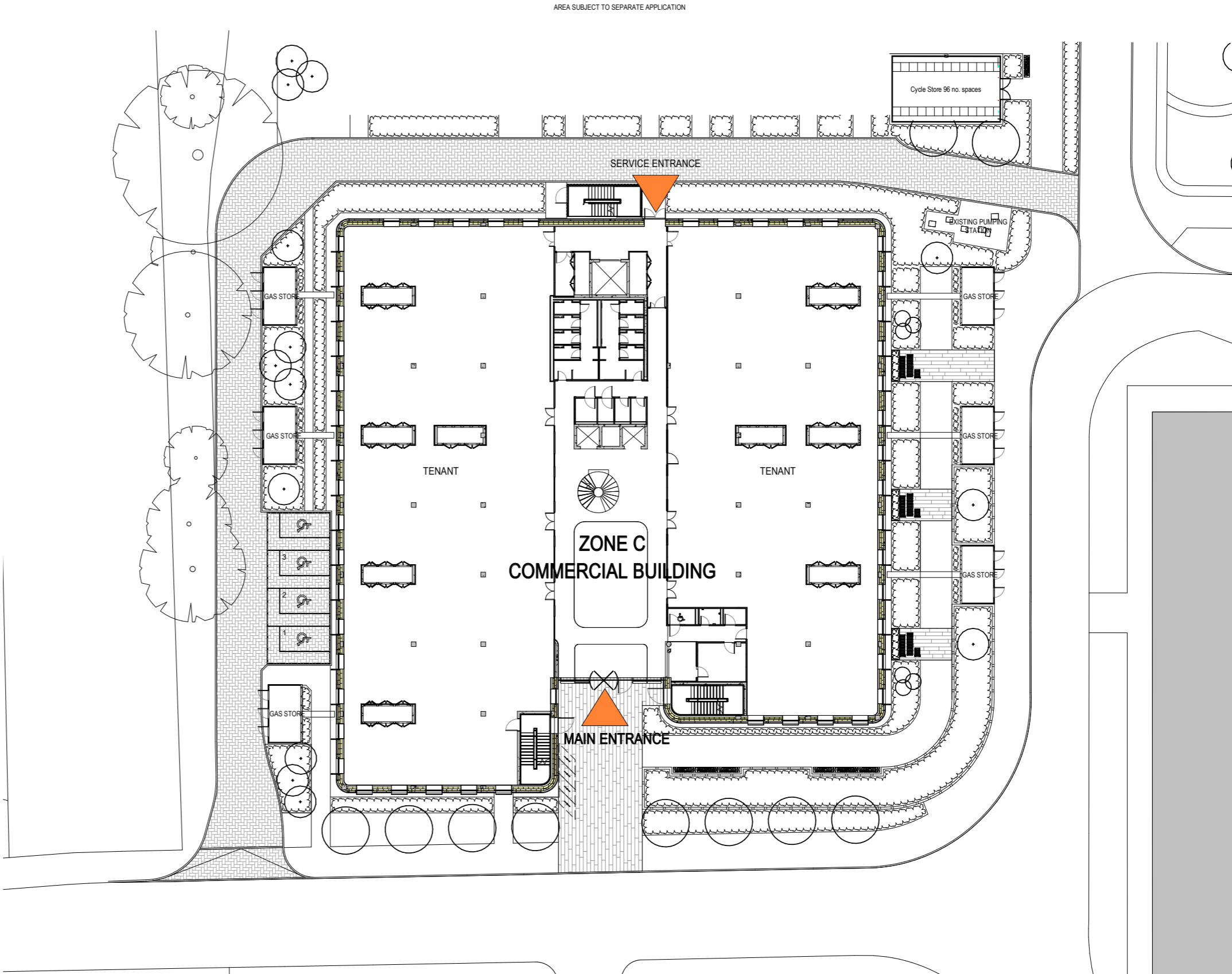
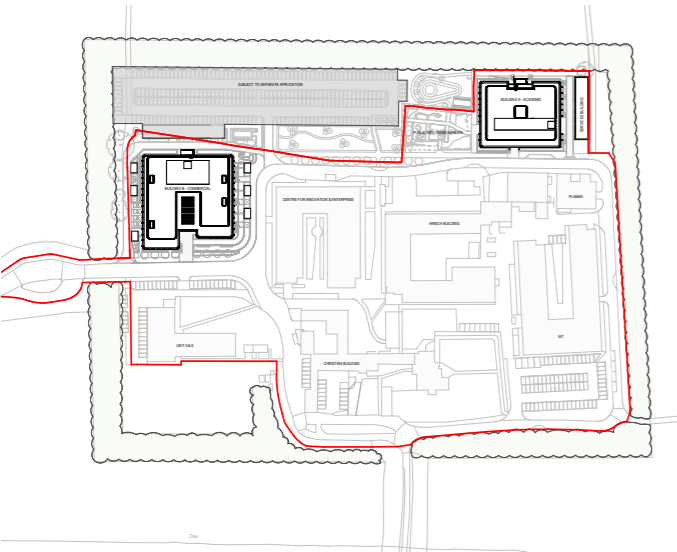
3.8 Proposed Site Plan

Building B - Commerical Building

The placement of the new building on Zone C aims to open up the East and South boundaries of the plot for pedestrian uses, through means of carefully planned soft and hard landscaped areas.

To the West, the design proposes to refurbish and widen the existing farmers road to allow the road to be utilised as primary service and parking access road for the building.

Alongside the northern boundary of the plot, the development proposes a separate service building housing ancillary uses such as enclosed refuse storage, sprinkler tank, transformers and temporary loading/unloading space. The services building is located outside the red line area and is subject to a separate planning application.



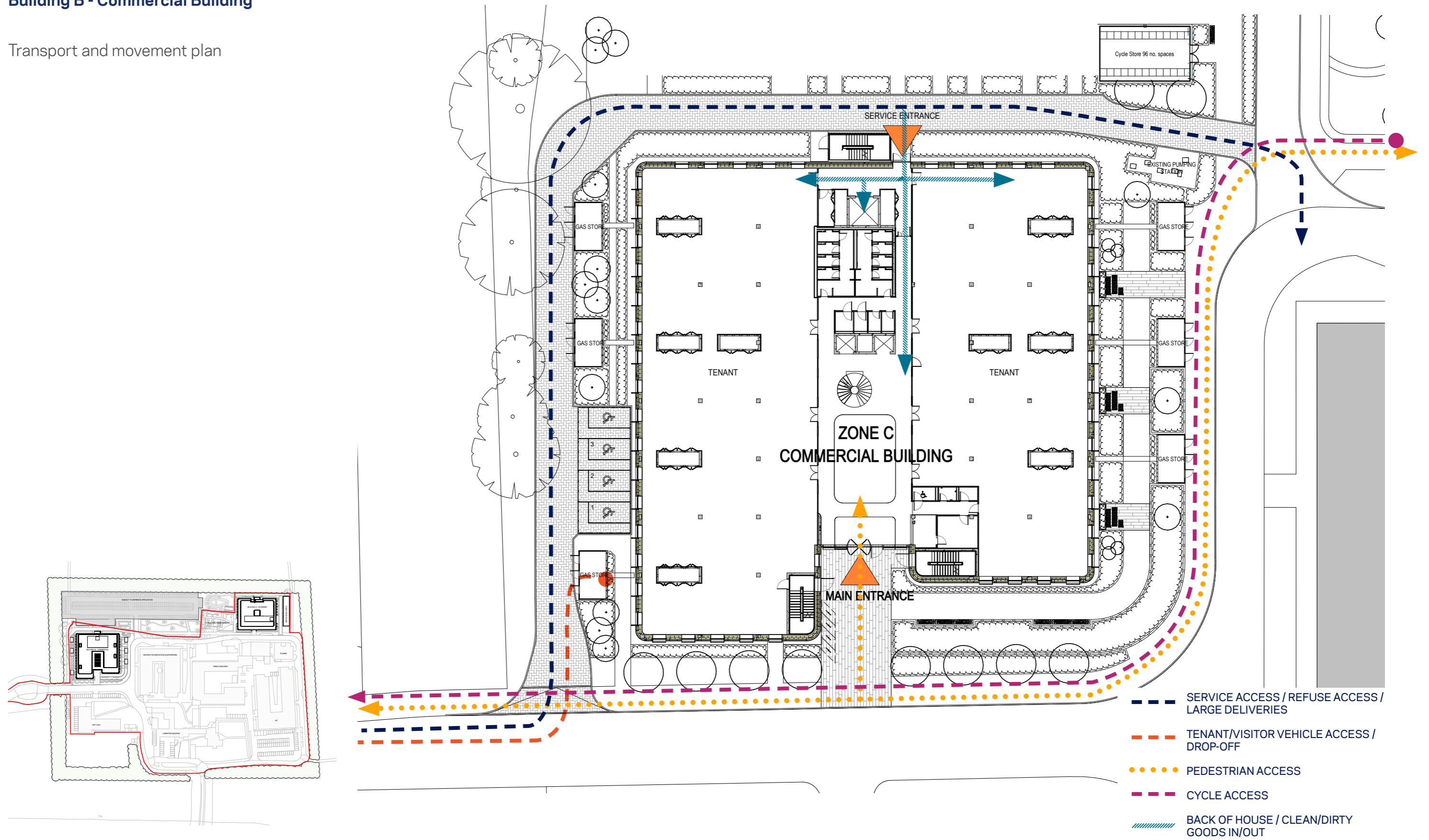
3.0 Proposed Site & Building Developments

3.9 Proposed Site Plan

Building B - Commercial Building

Transport and movement plan

AREA SUBJECT TO SEPARATE APPLICATION



- SERVICE ACCESS / REFUSE ACCESS / LARGE DELIVERIES
- TENANT/VISITOR VEHICLE ACCESS / DROP-OFF
- PEDESTRIAN ACCESS
- CYCLE ACCESS
- //// BACK OF HOUSE / CLEAN/DIRTY GOODS IN/OUT