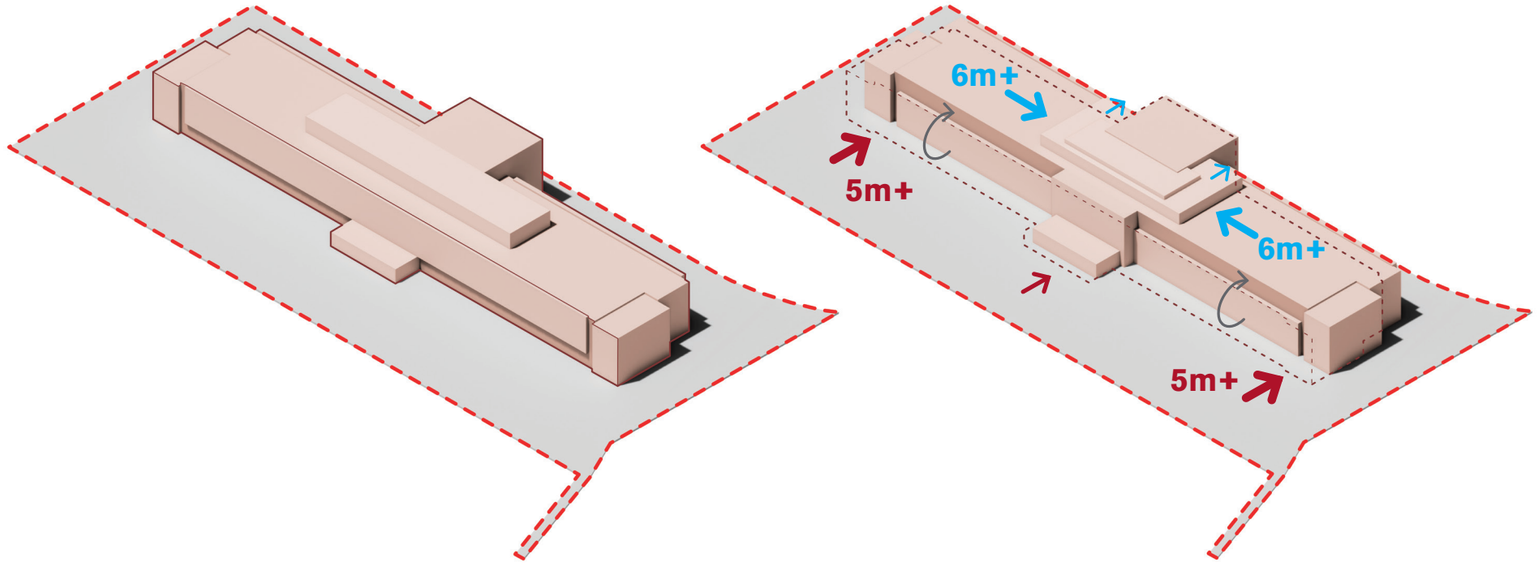
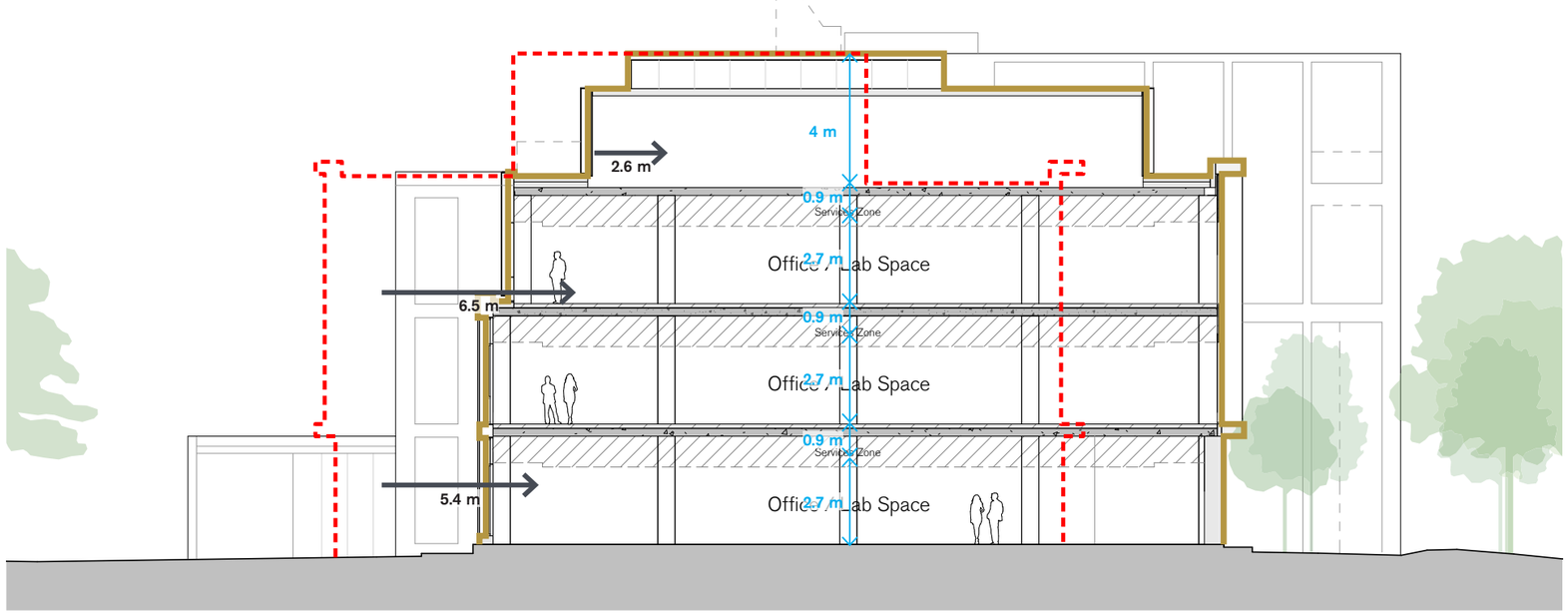
11.1

MASSING REFINEMENTS

Floor-to-ceiling heights and servicing zones have been reduced provide an acceptable internal environment whilst reducing the external massing.

The proposed building has also been sculpted at second floor and roof level to mitigate any perceived overbearing effect on neighbouring properties.



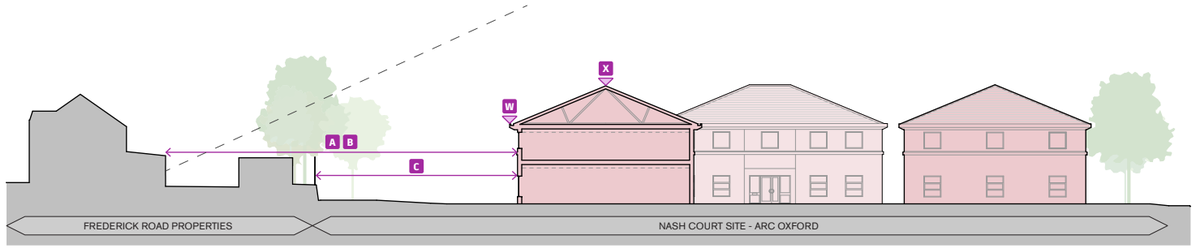


CROSS SECTIONAL DEVELOPMENT

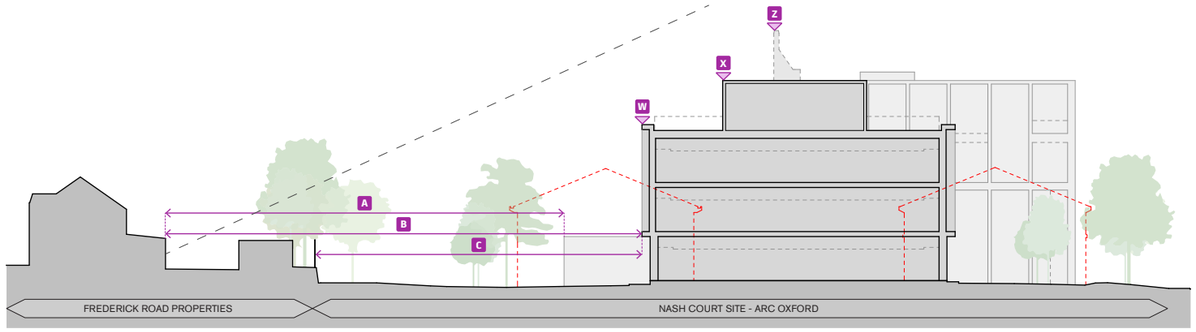
Engagement with Oxford City Council aided the development of the site section. In particular, the relationship between the proposed massing and the western site boundary.

Proposals sit far below the notional 25° reference line which is generally used to assess impact on neighbouring properties. The scheme has been further improved between pre-application consultations 1 and 3, where wings of the building have been moved an additional 5m further away from residents.

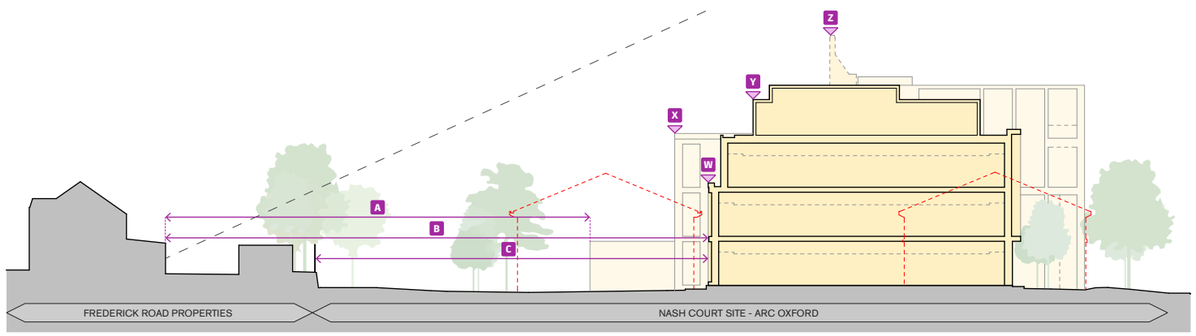
The current scheme is generally over 16m further away from residents when compared with the current condition. The distance from the rear of the closest house to the wings of the building is over 46m. A report by GIA Surveyors, which focused on analysing the potential impact of the scheme on nearby neighbourhood properties, concluded the following - ***'all assessed residential properties and open spaces meet the BRE guidance ... it is considered that the daylight, sunlight and overshadowing impacts will not be noticeable for all of the pertinent neighbours surrounding the site and no further detailed testing is considered necessary'.***



EXISTING



PRE-APP 01



PRE-APP 03

		EXISTING	PRE-APP 01 (OCT 23)	PRE-APP 03 (JAN 24)
	DISTANCE FROM REAR OF CLOSEST FREDERICK ROAD PROPERTY			
A	MINIMUM DISTANCE	30.1 m	34.1 m	36.3 m
B	TYPICAL DISTANCE	30.1 m	40.7 m	46.4 m
	DISTANCE FROM REAR (WEST) FENCE			
C	TYPICAL DISTANCE	17.3 m	28 m	33.6 m
	HEIGHT ABOVE GROUND FINISH FLOOR LEVEL			
W	EAVES / FACADE EDGE	7 m	13.4 m	8.8 m
X	RIDGE / FACADE EDGE	10.3 m	17.2 m	13.4 m
Y	LOWER EDGE OF PLANT SCREEN	-	-	15.9 m
Z	INDICATIVE TENANT FLUE	-	21.4 m	21.4 m

PROPOSED GROUND FINISH FLOOR LEVEL = +72 025 AOD.

HEIGHT OF TENANT FLUES AS DEFINED BY BS EN 14175

11.2

WEST ELEVATION DEVELOPMENT - GLAZING

Throughout design development, S&P have worked to reduce the perceived overlooking from the western elevation. This has been achieved through the reduction of both clear glazing and glazed spandrel panels. Further, the strategic use of vertical fins obscure views between occupants and residents at oblique angles. In all design options, windows are grouped in bays of 4 along the wings, separated by solid panels, to visually break down the building length.

At Pre-App 01, the combined effect of clear glazing and glazed spandrels gave the perception of a glassy building. Vertical louvres and perforated metal panels also provided additional screening. Layering of materials within the depth of the facade provided the appearance of solidity when not viewed face-on.

At Pre-App 02, the glazing ratio remained comparable to the previous design, but glass spandrel panels were largely omitted to be more honest about where windows were located. This was generally well received by OCC, but it was suggested that louvres were re-introduced to help provide screening as previously intended.

At Pre-App 03, alongside massing changes to reduce the perceived overbearing, vertical fins were introduced to each window unit to obscure views between the building and adjacent residents. Please note, that the wings are over 46m away from the nearest residential property.

S&P have undertaken Daylight Factor Analysis based on the Pre-App 03 proposals. See bottom right of page. This expresses the amount of daylight available inside a room (on a work plane) compared to the amount of unobstructed daylight available outside under overcast sky conditions. Rooms with an average DF of 2% or more can be considered daylit.

As can be seen, there is a significant reduction in penetrating daylight to the rear elevation based on the changes described above. Any further reduction in natural daylight would make the office / lab space un-lettable.

PRE-APP 01

CLEAR GLAZING = 21 %

GLAZING (incl. spandrels) = 57 %

PRE-APP 02

CLEAR GLAZING = 20 %

PRE-APP 03

CLEAR GLAZING = 17 %

KEY

Clear glazing

Glazed spandrels

A typical first floor window as viewed internally head-on and then from an oblique angle.

11.3 WEST ELEVATION DEVELOPMENT

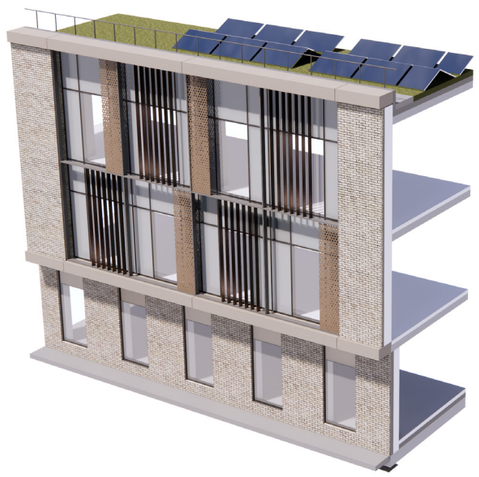
Proposed materials for the western elevation include buff brick, reconstituted stone and bronze-coloured metal panelling. These materials complement the classically - inspired front elevation and are consistent with the ambition to create architecture of lasting quality.

The 3.3m facade grid contains windows at 1.5m wide. These are sized to allow natural daylight into the building whilst providing maximum flexibility for future tenant fit-out.

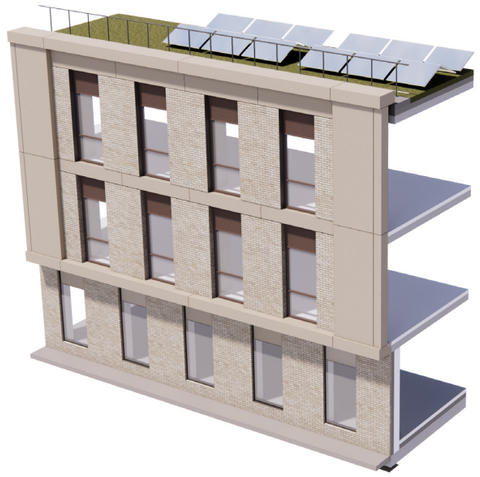
It was commented by OCC that a large amount of glazing would increase the perceived overlooking to neighbouring properties. Glazed spandrel panels, which formed part of the scheme as presented in October 2023, have been omitted in favour of profiled metal panels.

The scheme presented at pre-app 03 in January 2024 omitted the cantilever to the western elevation. This enabled the second floor to be set-back for reduced massing. Further, the materiality at second floor was changed to contrast more strongly, which reduces perceived overbearing of the building.

PRE-APP 01



PRE-APP 02



PRE-APP 03

Precedent: Rosemoor Studios by Haptic Architects.

Reconstituted stone band wrapping around first and second floors. Glazed spandrel panels at ground, first and second floors. Cantilever at first / second floor. Large buff brick panels used to break the building into 4 window bays. Perforated metal panels and vertical louvres to provide visual screening from oblique angles.

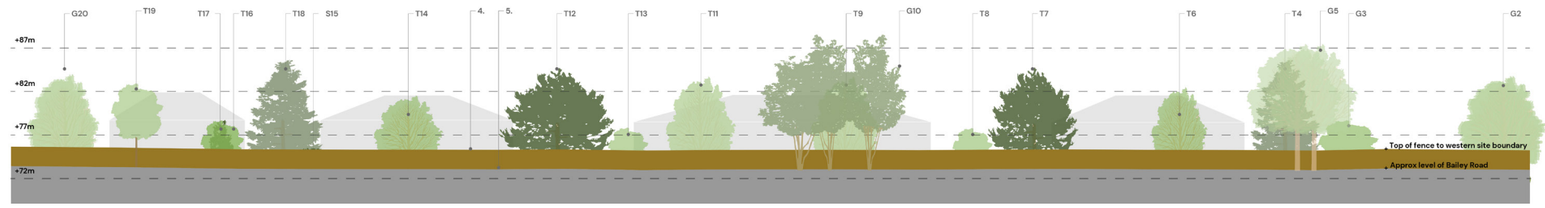
Reconstituted stone band wrapping around first and second floors. Glazed spandrel panels at ground floor only. Cantilever at first / second floor. Large reconstituted stone panels used to break the building into 4 window bays. Decorative metal (bronze coloured) spandrel panels above each window to conceal floor / ceiling build-up. Brick piers between windows at first and second floor.

Ground and first floors aligned, second floor set-back. Reconstituted stone zone to ground floor and between bays of 4 windows. Buff brick piers between first and second floors. Decorative metal (bronze coloured) spandrel panels above each window to conceal floor / ceiling build-up. Anodized aluminium panels to second floor. Reconstituted stone / aluminium fins to provide visual screening from oblique angles.

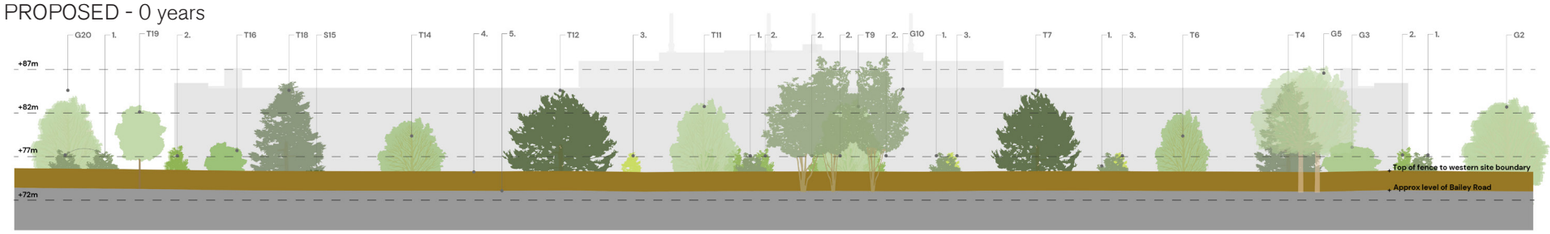
11.4 BOUNDARY TREATMENT - LANDSCAPE WEST ELEVATION

Landscaping was a significant design element in the proposed scheme where the surrounding buildings and sightlines were considered. Landscaping therefore has been thoughtfully designed to address its context, with the western residential boundary being a crucial aspect. This has partly been addressed by retaining the existing trees and planting on this boundary, an established and attractive element of the current plot. Additional planting has been proposed to bolster this boundary and provide a natural screen from the residential boundary and its neighbours. As demonstrated in the diagram adjacent, the new trees planted will mature over time and provide a soft, green and pleasant screening. After 25 years, much of the lab sciences building will be completely screened from local residents. The trees proposed are not all evergreen and the leaves will fall from some during the winter. During winter months therefore much of the built form will be visible. The design has therefore carefully considered this to ensure any impact on the surrounding context has been mitigated/minimised. The verified views from Bailey Road helped inform the impact on local residents and drive the proposed design.

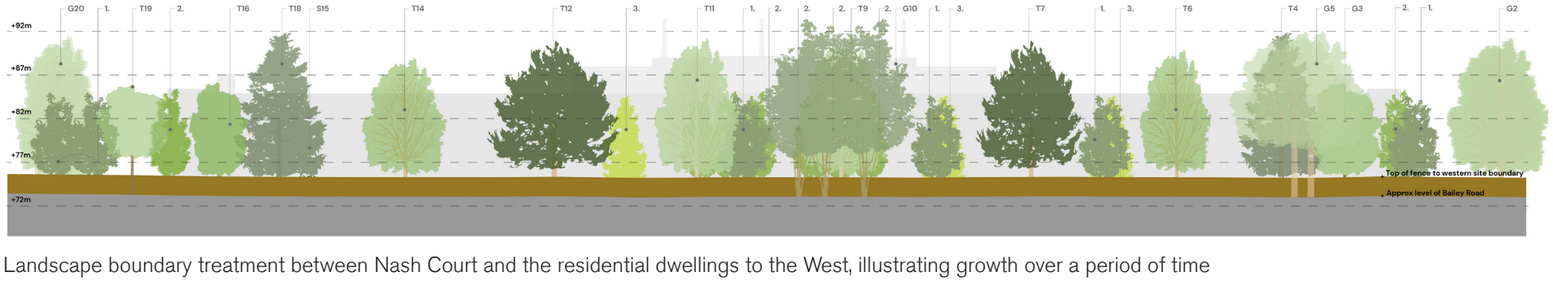
EXISTING



PROPOSED - 0 years



PROPOSED - 25 years



Landscape boundary treatment between Nash Court and the residential dwellings to the West, illustrating growth over a period of time

Existing verified view from Bailey Road in the winter

Proposed verified view from Bailey Road in the winter

PRE-APP 03 - PROPOSED REAR FACADE BAY

BAY MATERIAL PALLET

1 Reconstituted Stone/GRC stone band, wrapping the elevation and bays

2 Reconstituted Stone/GRC panels and piers to separate window bays

3 Panel of clear glazing (1.5m wide as per previous proposal) with central mullion / fin.

4 Light coloured brick walling in between window openings

5 First floor windows separated with reconstituted stone fin to obscure views from oblique angles

6 Bronze effect metal spandrel panels above window frames to mask services and structural zone.

7 Metal cladding with protruding fins to second floor facade, set back to reduce perceived massing.

8 Bio-diverse green roof system with PV cells

9 Metal safety balustrading for access and maintenance

12.0 FACILITIES

12.1

TENANT UNIT DESIGN STRATEGY

The floor plates of the proposed building will be left as shell, to be fitted out to suit the specific requirements of the future tenant when known. Having utilising the 3.3m laboratory module describe above it will be possible to fit out the laboratory floor plates to suit the vast majority of laboratory tenant layout requirements.

To test this we have produced notional laboratory layouts based on the clients preferred floor plate splits of whole floor plates, and half floor plates (divided front to back). With three popular laboratory layout typologies.

CLUSTER - Individual small laboratory spaces are interspersed with write-up area.

HORIZONTAL - Write-up areas and Laboratory space is laid out lengthways. Where windows are only present on one side, the write-up areas tend to be located adjacent to these, with internal glazing utilised to allow natural light into the laboratories space beyond

VERTICAL SPLIT - Write-up areas and Laboratory space is split vertically, with users initially entering and then passing thought the write up area, to the laboratories beyond, these laboratories are then often layout out with primary laboratory space surrounding centrally located shared secondary laboratory space which requires less natural light and often greater environmental controls normally split with primary labs located adjacent the perimeter windows and secondary labs more centrally on plan

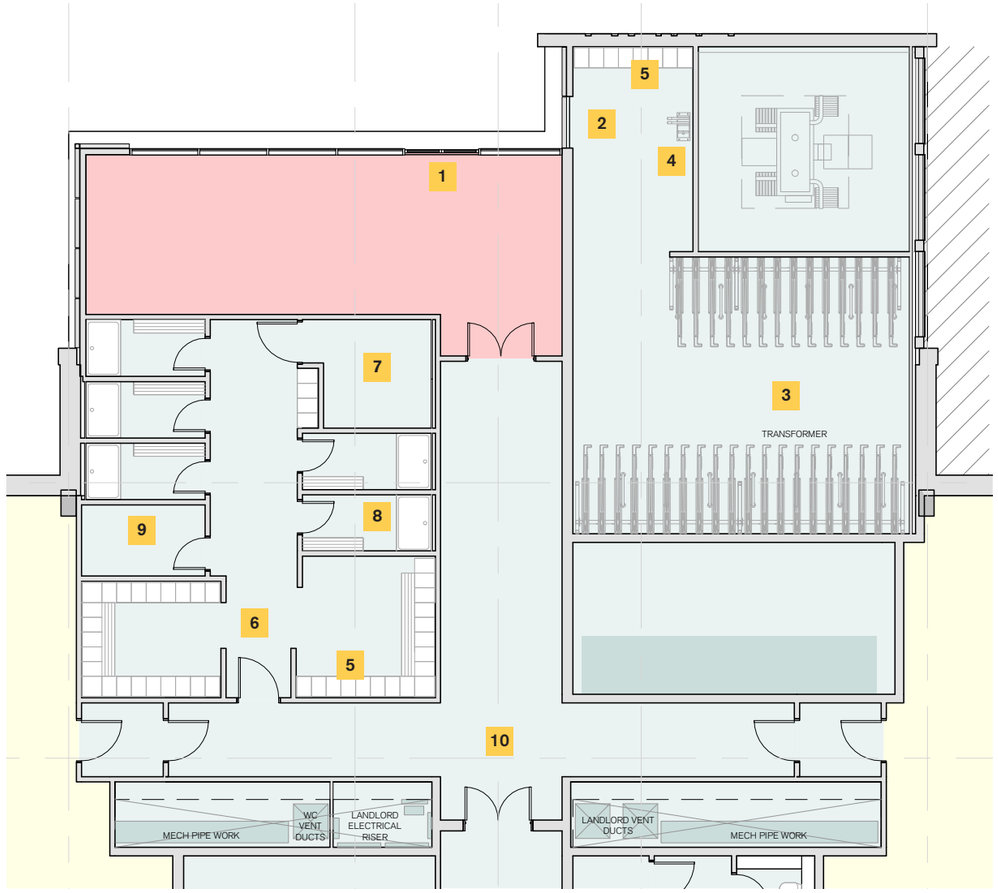
Royal Free University Hospital

Target Discovery Centre - Oxford University

END OF TRIP FACILITIES

Access to through the rear of the building leads into the rear reception area. Access with a bike is through a secondary secure door, leading directly into the cycle store. Lockers and a bike maintenance area can be found along side the secure bike racks.

The lobby off the rear reception leads to the uni-sex changing room. Inside lockers, individual shower rooms and an accessible shower room. The changing rooms also contain a drying room to be used throughout the day.



KEY

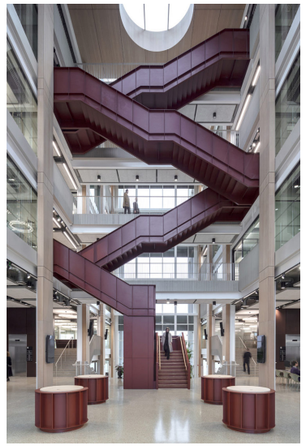
1. Rear Reception entrance
2. Bike store entrance
3. Bike racks
4. Bike maintenance
5. Lockers
6. Changing room
7. Accessible WC
8. Shower room
9. Drying room
10. Access to main reception

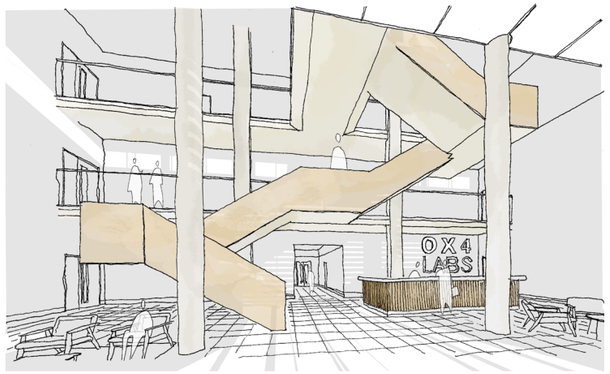
GROUND FLOOR FACILITIES

The front entrance and reception is accessed from a new landscaped communal courtyard which links the outside space to inside the building. The double height reception with two storeys of glass will establish a clearly defined and impactful entrance. Once inside the building a central staircase will rise through a central atrium linking all the building facilities up to the communal cafe. The staircase and lift shafts behind will also provide access to the opposing lab wings either side of the core.

The rear entrance at ground floor level, is single storey, so not to add unnecessary massing towards the residential units. Whilst providing a more dedicated entrance to building staff who may park behind and the cyclist which leads to the 'best in class' end of trip facilities including mixed bike storage, lockers, drying, changing and shower facilities.

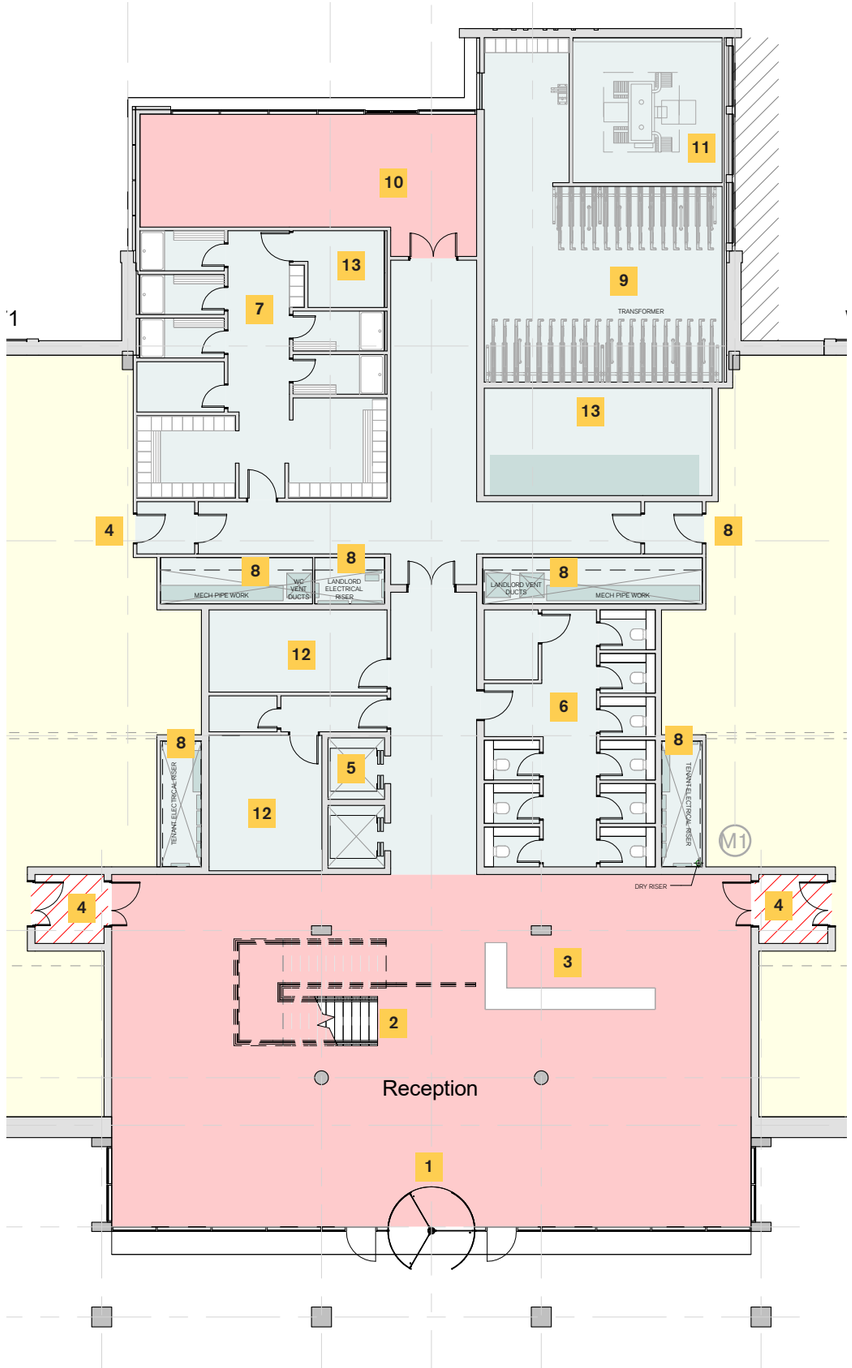
Building plant is also located to the rear of the building for efficiencies in the services strategy but also not to blight the surrounding landscaping with additional external enclosures, allowing more space for trees and greenery.





KEY

1. Main Access
2. Staircase from reception
3. Reception desk
4. Access to office space
5. Passenger lifts
6. Toilets
7. Changing room / showers
8. Risers
9. Bike storage
10. Rear entrance
11. Transformer
12. Ancillary space
13. Accessible Shower / WC

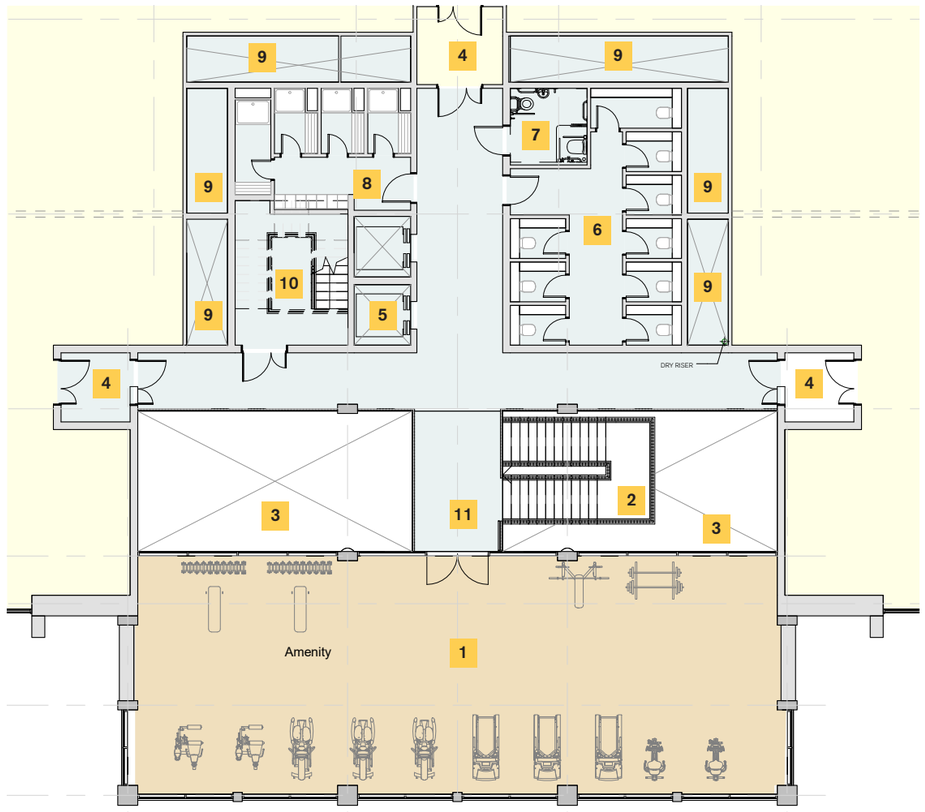


SECOND FLOOR GYM FACILITIES

Above the double height reception and within the entrance block will feature a state of the art gym, as linked back to the building core via bridge that spans the reception atrium below.

The frontage to the gym will be fully glazed within the expressed structural frame which will offer amazing views out across the park while people are exercising. The location of the gym has been carefully selected so the views out have the best vantage point whilst not overlooking any residential homes. This location will also limit any noise, both externally and internally away from the working lab floorplates.

The changing facilities are located behind the central lift core and occupants could also use the facilities on the ground floor.



KEY

1 Gym
2 Staircase from reception
3 Open to below
4 Access to office space
5 Passenger lifts
6 Toilets
7 Accessible Toilet
8 Changing room / showers
9 Risers
10 Stair to third floor
11 Access to gym