

The background of the page is a detailed, light gray architectural site plan or floor plan. It shows various building footprints, courtyards, and structural elements, typical of a large-scale urban or institutional development project. The plan is oriented horizontally but has a slight tilt.

# PART 5 KEY PROJECTS

## 5.1 Reconciling People, Place and Traffic

*In developing the Masterplan for the University of Sheffield, it became clear that in order to positively effect a change in the public realm, a detailed review and testing of the existing highways was required. In essence, this review has unlocked the opportunity to relink severed areas of the campus as well as define areas for public realm developments.*

As previously stated in the Campus in Context, the University straddles the ring road, creating an east/west divide as well as being bisected by Western Bank, creating a north/south divide. Resolving this divide is key to unlocking the potential for the University to encourage a pedestrian dominant environment. In addition, the campus is currently dominated by surface car parks. The current development of Durham Road car park acts a catalyst for releasing prime areas to be transformed into livable, useful and exciting public spaces.

The following pages illustrate the coordinated urban design and infrastructure approach to Upper Hanover Street and Western Bank. As the subsequent identified key projects are hinged on the successful resolution of the highways, a more detailed approach was undertaken for this section.



Western Bank ①  
Upper Hanover Street ②





# 5.1 Reconciling People, Place and Traffic

## Key Strategic Principles

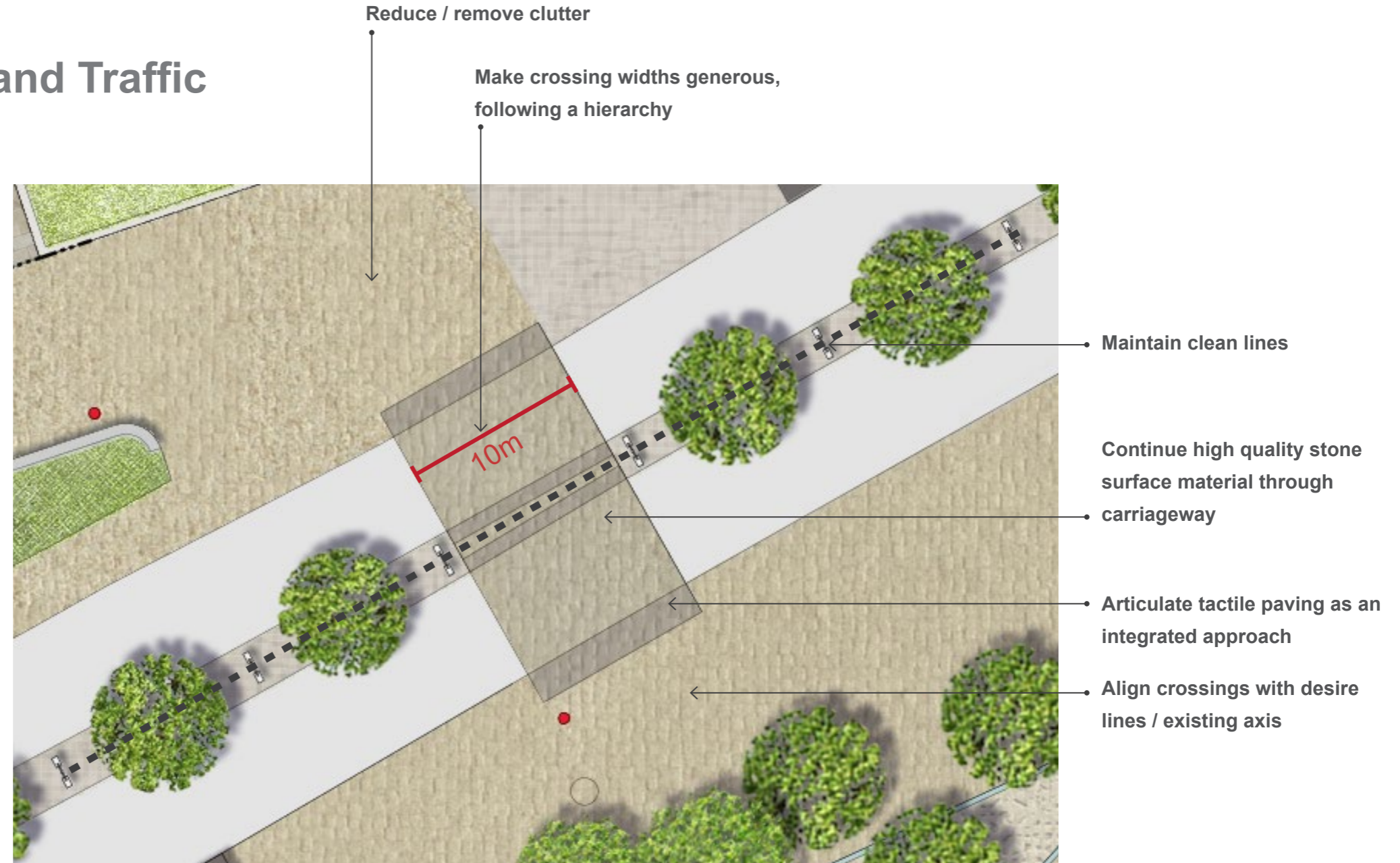
The design of the crossings and pedestrian realm on Western Bank and Upper Hanover Street is key to developing connectivity in the Masterplan. The adjacent diagram illustrates the key principles:

### Crossings

- Locate the crossings at key pedestrian desire lines
- Make crossing clearly aligned, avoid staggered crossings
- Reduce clutter, remove barriers
- Make the crossings wider, with a hierarchy of widths: 10 m for the main crossings, 7 m for the secondary crossings
- Reinforce legibility with a clear hierarchy of materials

### Streets

- Widen the pedestrian footway where practically feasible
- Reduce the number of lanes in the carriageway where practically feasible
- Reduce clutter, rationalise street furniture and signage
- Remove unnecessary items, such as the central concrete reserve in Western Bank
- Use tree planting to help break down the scale of the road





## 5.1.1 Western Bank Pedestrian Crossings

*A fundamental move in the Masterplan is to reconcile the divide between the north of Western Bank with the south of Western Bank campus. The character and function of Western Bank will be transformed by removing the concrete central reservation and replacing with tree planting, introducing three crossing points and relocating the bus stops.*

The existing pedestrian crossings from the northern to the southern areas of the Western Bank campus do not provide appropriate pedestrian connectivity. Completion of the three proposed signalised crossings will involve the implementation of tactile paving, studs and traffic signals, along with the associated kerb build outs, removal of the bus gate and layby infill on both sides of Western Bank with bus stop relocation on the westbound carriageway and the removal of the sections of concrete which form the central reservation

Details of the three crossings on Western Bank are illustrated over the following pages.



- Pedestrian Crossing at the Arts Tower ①
- Pedestrian Crossing at Favell Road ②
- Pedestrian Crossing at Firth Court ③



## 5.1.1 Western Bank Pedestrian Crossings

### 1 Western Bank Pedestrian Crossing at the Arts Tower

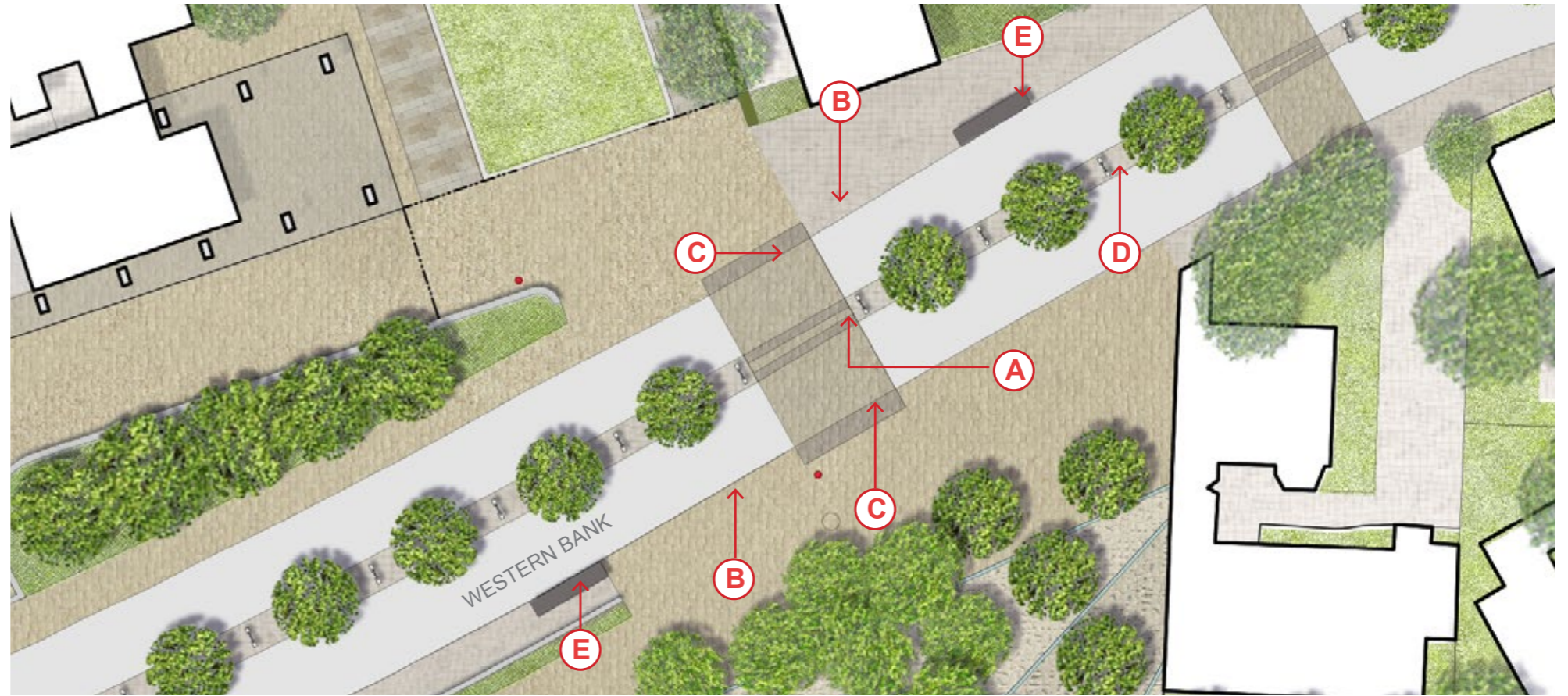
Western Bank currently causes a significant divide between the north and south of the campus. The Students' Union building acts as the major student hub within the Western Bank campus. The Hounsfield Favell Quarter is proposed to provide a secondary pedestrian hub adjacent to the Information Commons. From these locations one of the primary destinations is the Arts Tower. In order to provide greater pedestrian connectivity between these sites in the northern and southern zones of the Western Bank campus, a major new pedestrian crossing facility is planned across Western Bank along the pedestrian desire line at the top of Hounsfield Road.

The proposed crossing will:

- Provide a vista towards the south side of the recently restored, historic Arts Tower building and plaza
- Provide a more direct link between the pedestrianised zones than the concourse underpass
- Form part of the University Gold Route towards Glossop Road
- Support the main arterial route from Western Bank to the St George's campus
- Be designed with a Department for Transport (DfT) maximum width of 10m

Technical Details (key refers to adjacent plan):

- The bus gate will be removed from outside the Dainton Building
- One set of signals will serve both the bus lane and general traffic lane at the crossing (A)
- The bus lane will end at the same point as the existing bus gate so as to allow general traffic to use the right turn lane at the Brook Hill roundabout
- Proposed infill of the bus layby located on the westbound carriageway to the north of Hounsfield Road (B)
- Widening of the footways by 0.5m on each side of Western Bank in order to incorporate the direct pedestrian crossing and to increase the pedestrian flow along the eastbound and westbound footways (C)
- Removal of the concrete central reserve across the 10m width of the crossing (D)
- New bus cage to replace existing layby (E)



Pedestrian Crossing at the Arts Tower (refer to Technical Details for key)





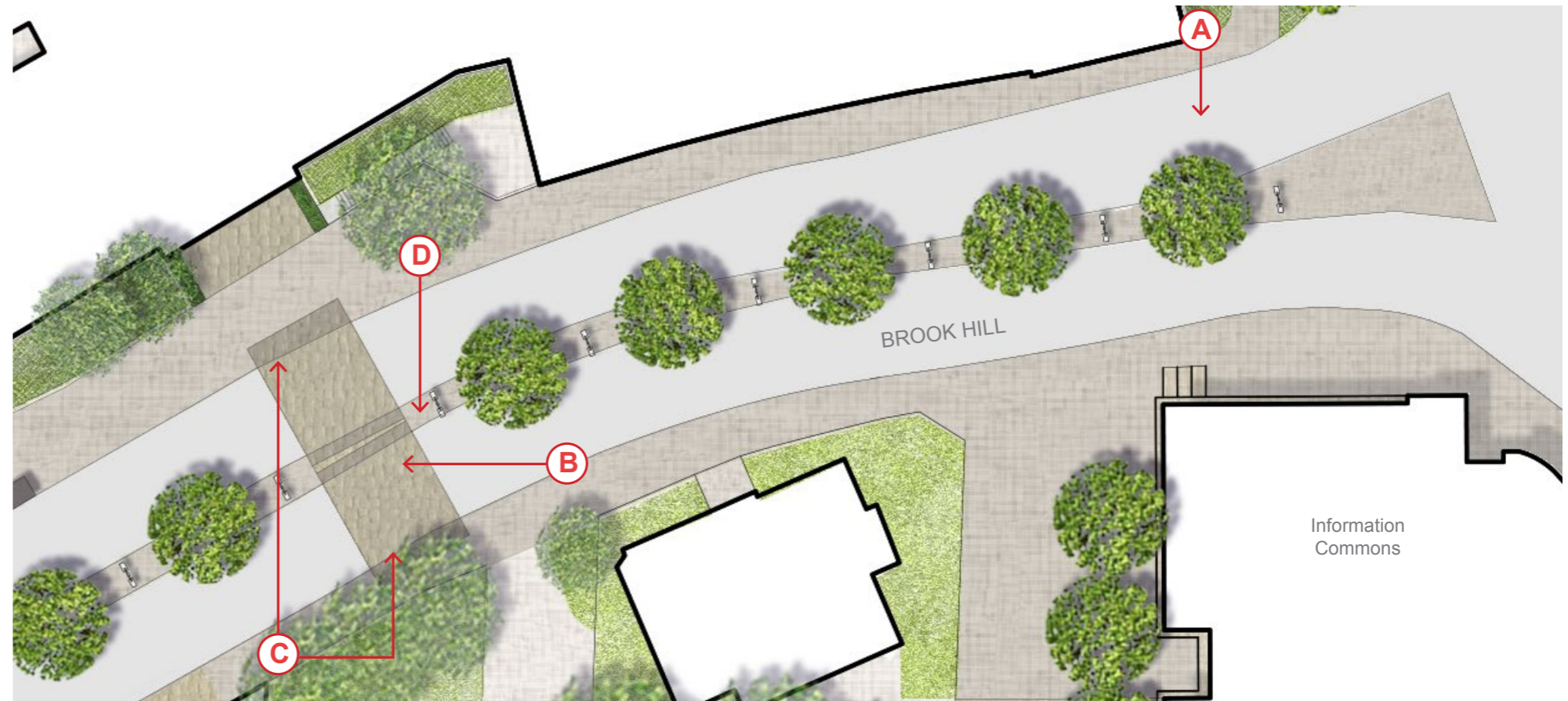
## 5.1.1 Western Bank Pedestrian Crossings

### 2 Western Bank Pedestrian Crossing at Favell Road

The existing crossing near Brook Hill Roundabout creates a dangerous environment for both pedestrians and motorists. Drivers are focused on the road past the pedestrian crossing and therefore do not give the pedestrians at the crossing their full concentration. The central refuge at this location is narrow, providing little protection for pedestrians, especially if a number congregate on the island. The stagger in the crossing causes an increased crossing time for pedestrians who have to wait for two sets of signals.

The proposed crossing will (key refers to adjacent plan):

- Link the pedestrian hotspot located between the Dainton and Richard Roberts Buildings to the Hounsfield Favell Quarter
- Will move pedestrians away from the roundabout and will provide a safer, more direct crossing (A)
- Link pedestrians to the main arterial route through the University campus along Leavygreave Road
- Designed with a width of 7m (B)
- The footway on both the north and south sides of Western Bank will be widened by 0.6m (C)
- The central reserve will be increased in width to accommodate any pedestrians stopping in the centre of the road (D)



Pedestrian Crossing at Favell Road (refer to notes for key)





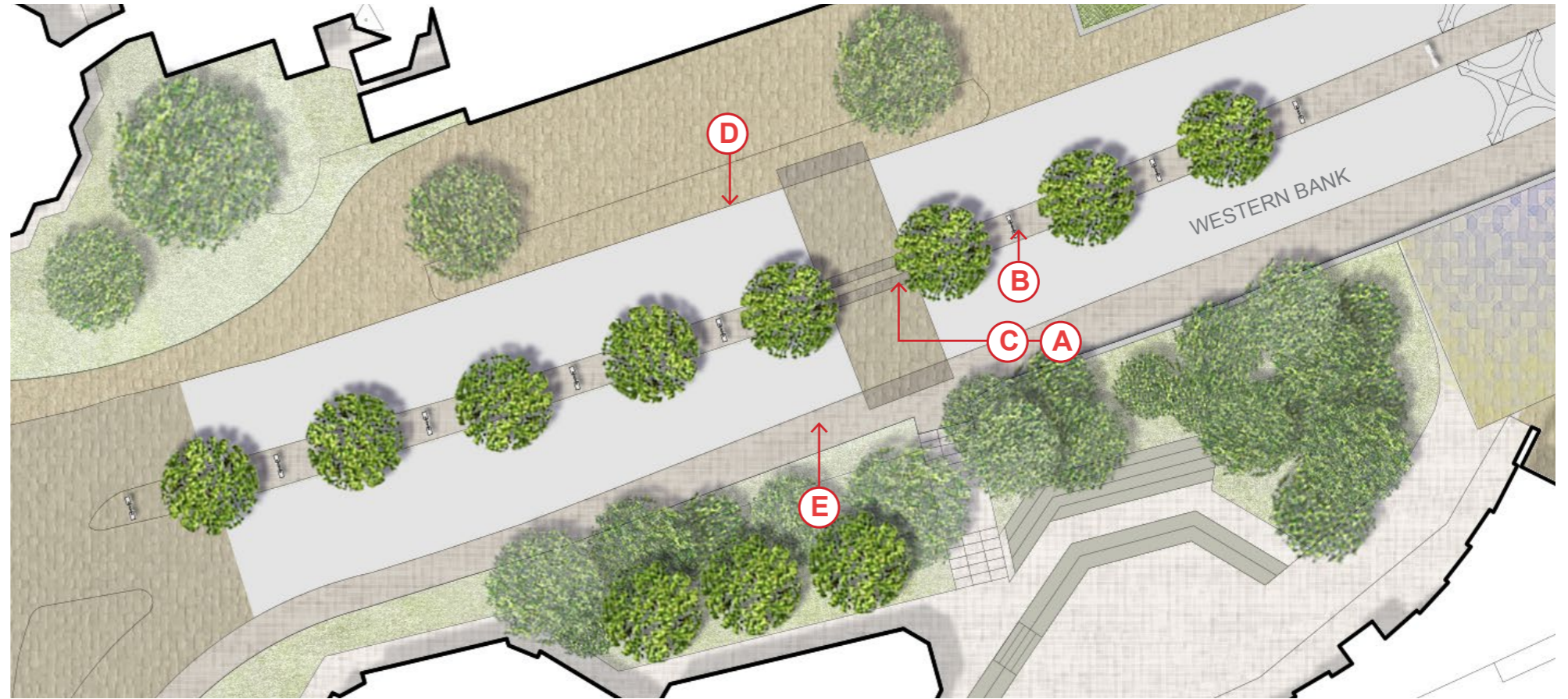
## 5.1.1 Western Bank Pedestrian Crossings

### 3 Western Bank Pedestrian Crossing at Firth Court

The existing staggered pedestrian crossing over Western Bank at Clarkson Street requires pedestrians to wait at three sets of signals when crossing from the north of the campus towards the Students' Union. The TPS survey indicates the existence of a pedestrian desire line between the Octagon Centre / Students' Union hub and Firth Court.

The proposed crossing will (key refers to adjacent plan):

- Will provide a direct link between the north and south of the Western Bank campus (A)
- Will retain existing crossing at Clarkson Street to provide access to the Sheffield Children's Hospital
- Will require the removal of the concrete central reserve on Western Bank (B)
- Has been designed at 7m wide, with a crossing length of 14.4m
- Will be signalised (C)
- Localised widening of the footpath by 1.75 m on the North side (D)
- Localised widening of the footpath by 0.5m on the South Side (E)



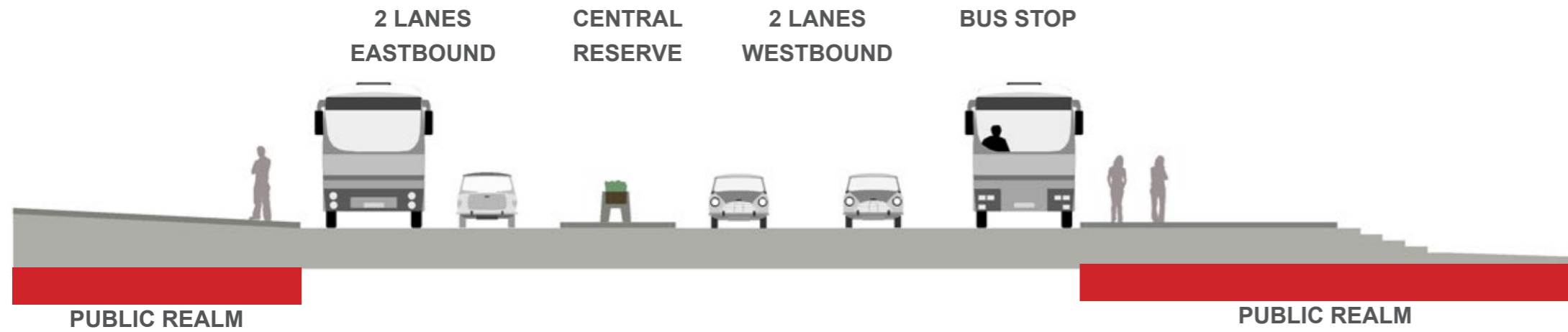
Pedestrian Crossing at Firth Court (refer to nptes for key)



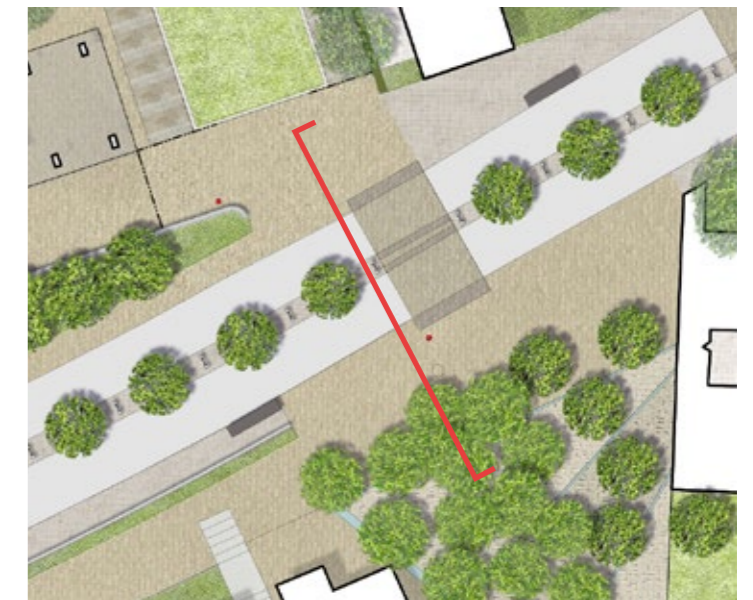
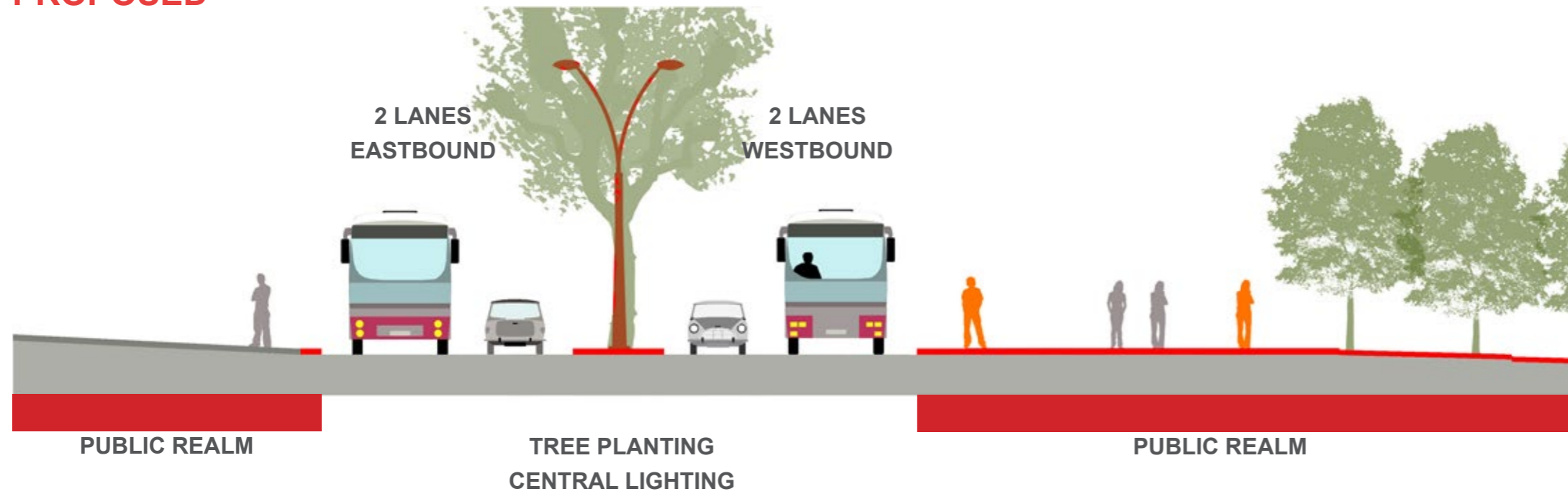


# 5.1.1 Western Bank Pedestrian Crossings

## EXISTING

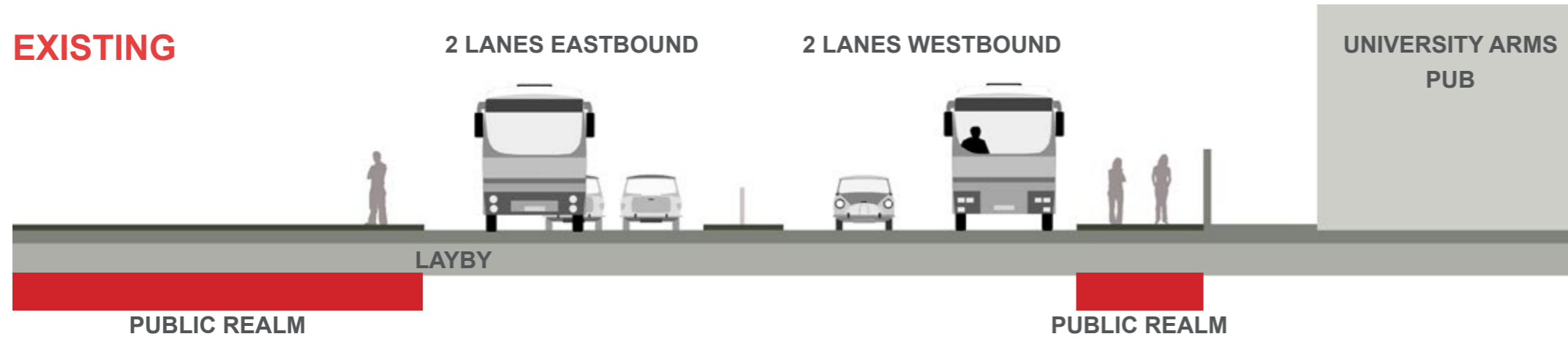


## PROPOSED

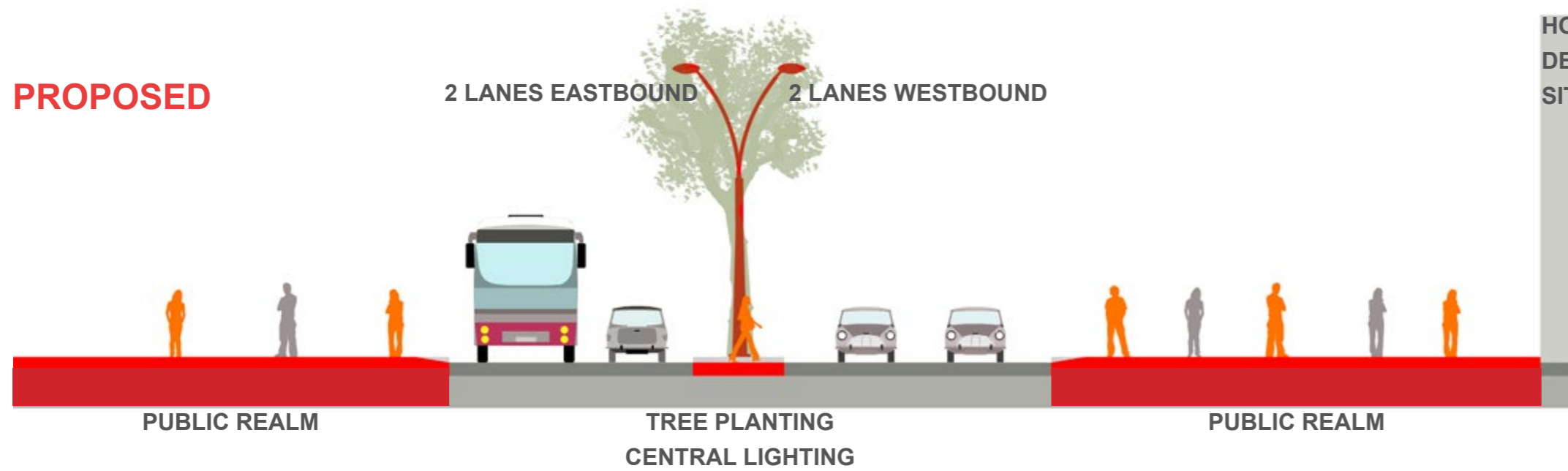




**EXISTING**



**PROPOSED**



HOUNSFIELD  
DEVELOPMENT  
SITE





## 5.1.2 Upper Hanover Street Pedestrian Crossings

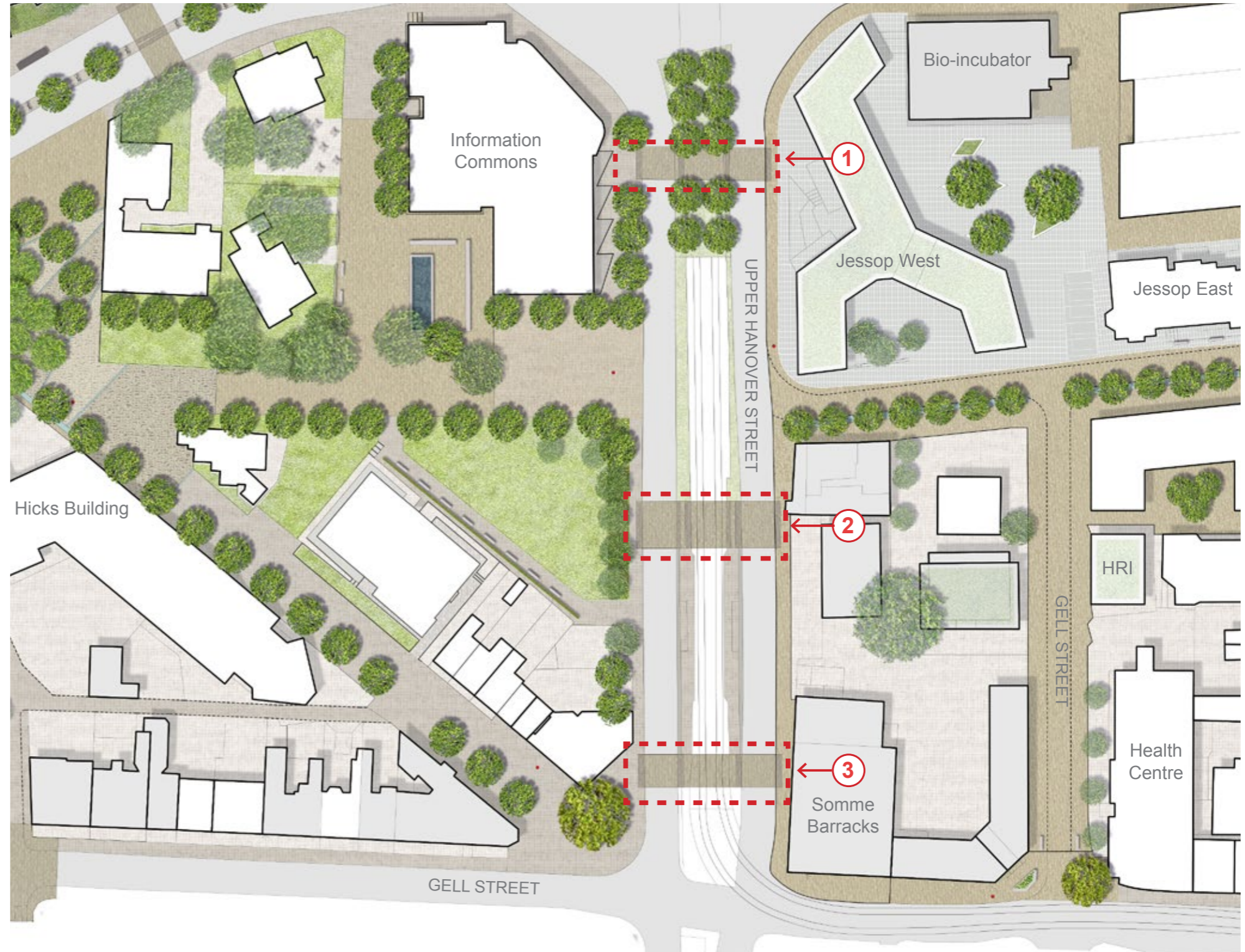
*A fundamental move in the Masterplan is to reconcile the divide between St George's Campus and the Western Bank campus. The three pedestrian crossings over Upper Hanover Street will be widened and aligned in order to provide improved pedestrian connectivity between the two halves of the campus, reinforcing the University Gold Route.*

The main arterial route through the University runs from the Arts Tower, through the Hounsfield Favell Quarter and along Leavygreave Road to the St George's campus. Improvements are required so as to connect the St George's and the Western Bank campuses across Upper Hanover Street, which currently provides a significant disruption to movement. In order to widen the central crossing, located on the main arterial route through the campus, the tram platform will be reduced in length by two metres.

There are currently three signalised crossing points which provide a link from east to west. Each of the existing crossings have a staggered arrangement across the northbound and southbound carriageways, with the central crossing stagger incorporating an unassisted crossing over the tram tracks. These staggers increase the pedestrian crossing time and create pinch points, reducing the number of pedestrians able to cross during each green cycle.

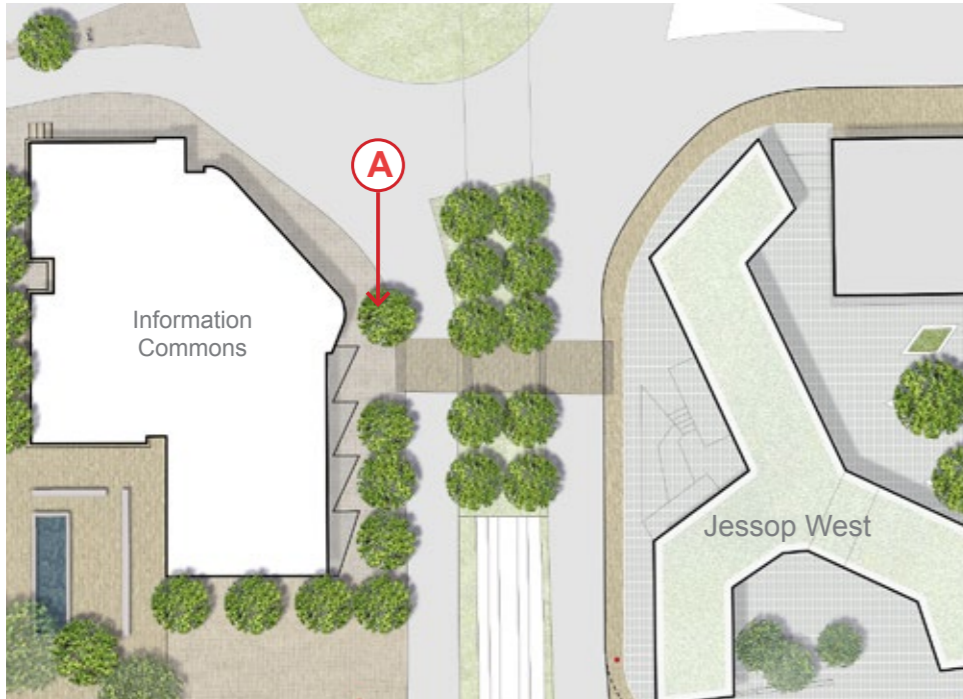
Opportunity to explore the removal of the existing 'lean to' structure of the Henderson Relish Building in order to increase pavement width and improve pedestrian flow.

Details of the three crossings on Upper Hanover Street are illustrated over the following pages.



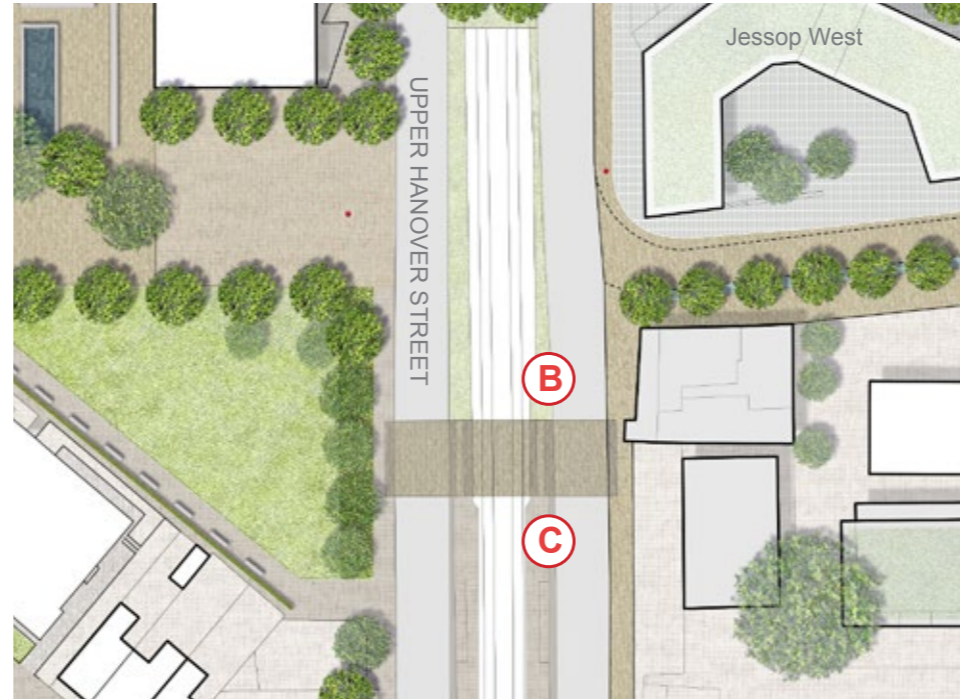


## 5.1.2 Upper Hanover Street Pedestrian Crossings



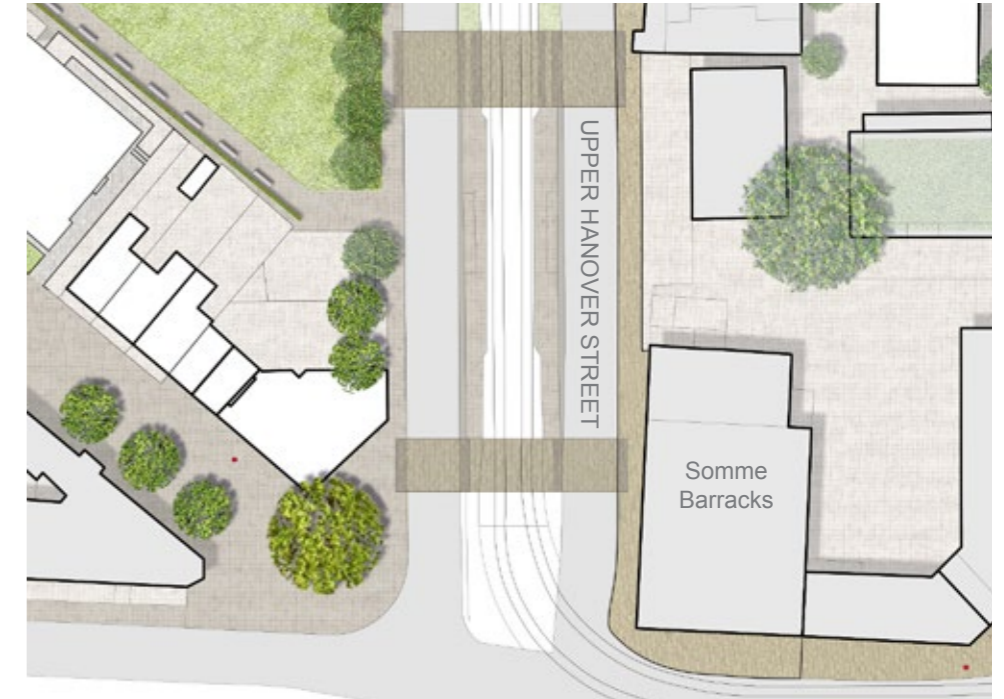
**1 Upper Hanover Street North Crossing**

- The least busy
- Designed with a width of 7m
- Aligned to provide a more direct route between St George's and Western Bank campuses
- The northbound carriageway will be reduced by one lane, reducing the crossing distance for pedestrians and increasing the footway adjacent to the Information Commons Building (A).



**2 Upper Hanover Street Central Crossing**

- Important due to its proximity to the University tram stop and forms part the City Gold Route Extension
- Has the largest number of pedestrians crossing per hour at 930
- Due to the significance of this crossing as a major pedestrian link, it is proposed that the crossing width is extended to 10m
- Crossing width is restricted by the structure of the tram underpass to the north (B)
- Crossing width is restricted by the tram platform to the south (C)
- The pinch points and clutter created by the crossing guard rails will be removed, allowing the maximum number of pedestrians to utilise the crossing.



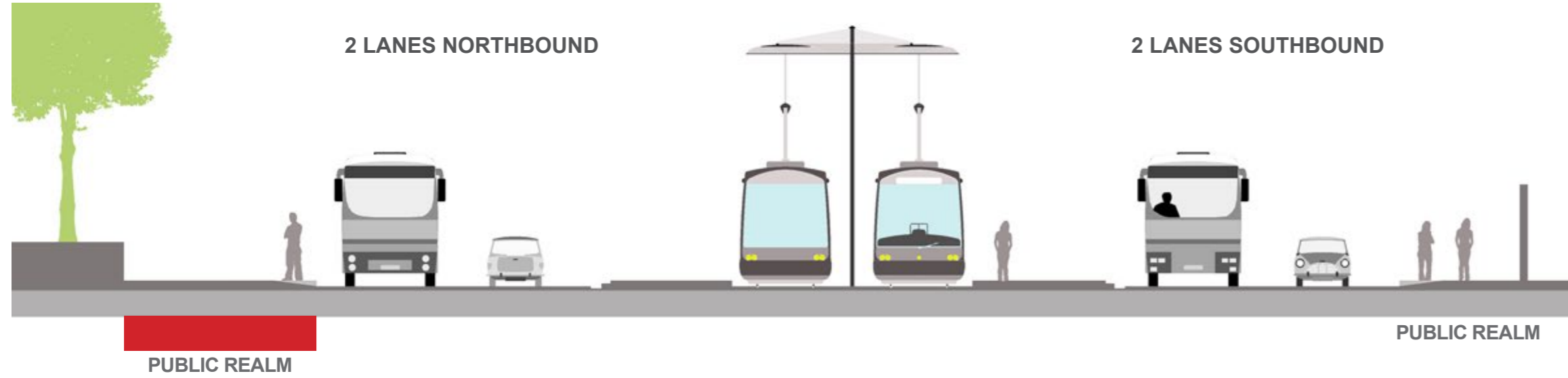
**3 Upper Hanover Street South Crossing**

- Serves pedestrians crossing from the University Western Bank campus buildings including the Students' Union, science buildings and Arts Tower towards the city centre
- Designed with a 7m width
- Will be aligned in order to provide the shortest crossing distance.

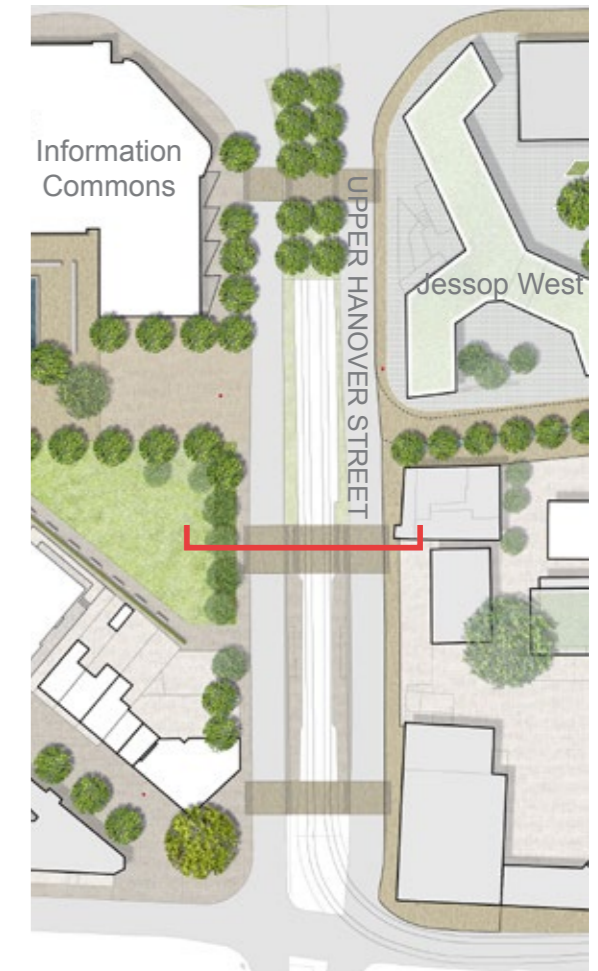
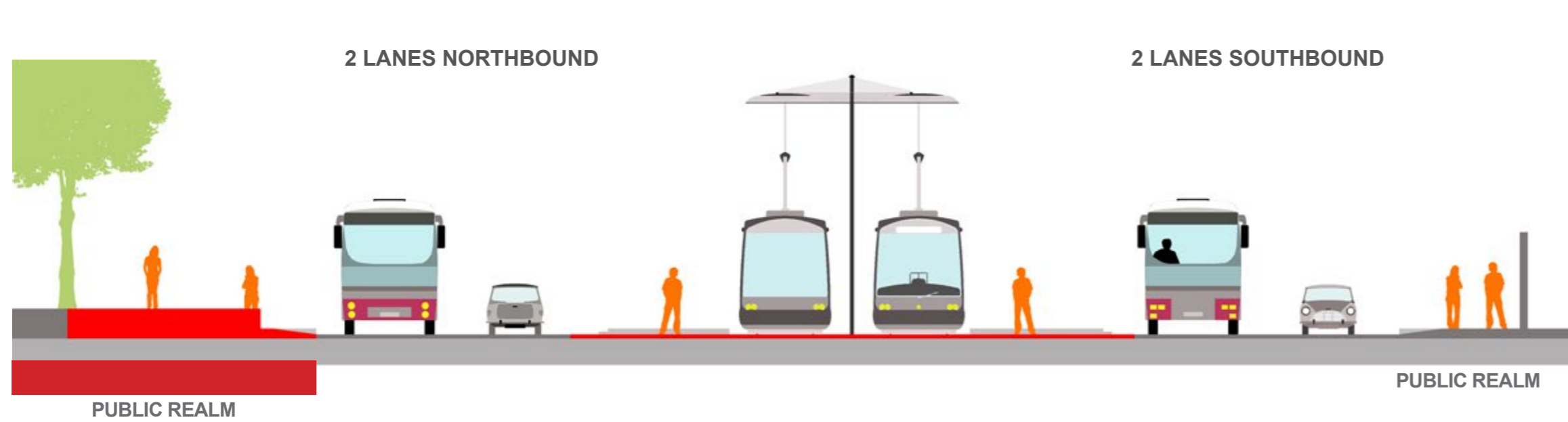


## 5.1.2 Upper Hanover Street Pedestrian Crossings

### EXISTING



### PROPOSED



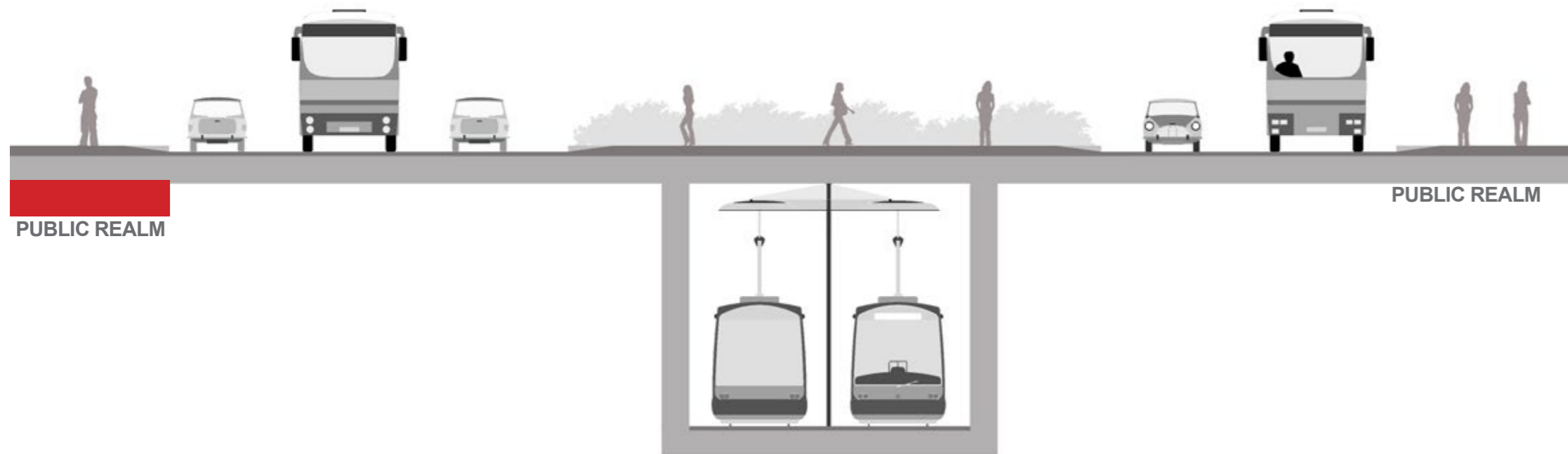
PROPOSED KEY PLAN (NTS)



**EXISTING**

3 LANES NORTHBOUND

2 LANES SOUTHBOUND

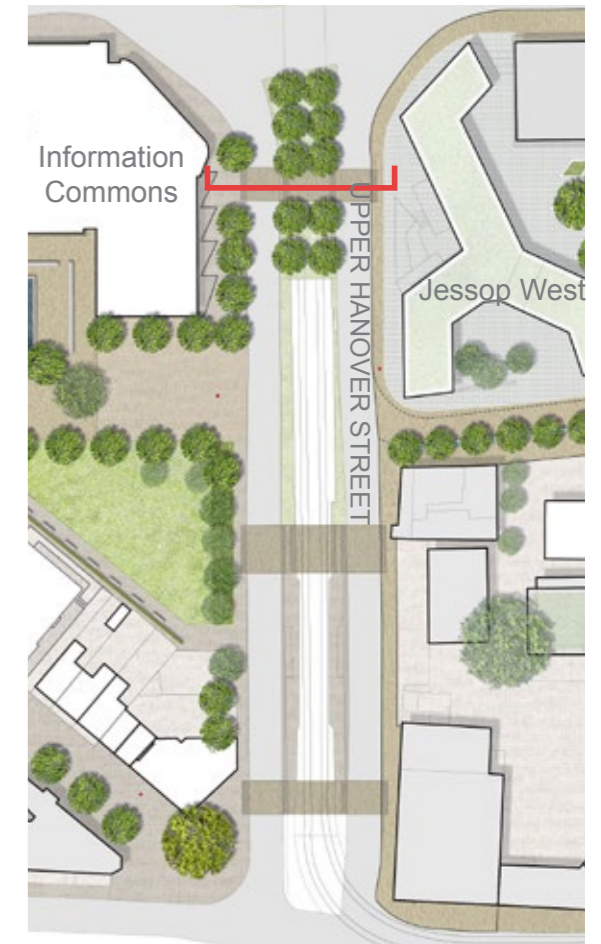
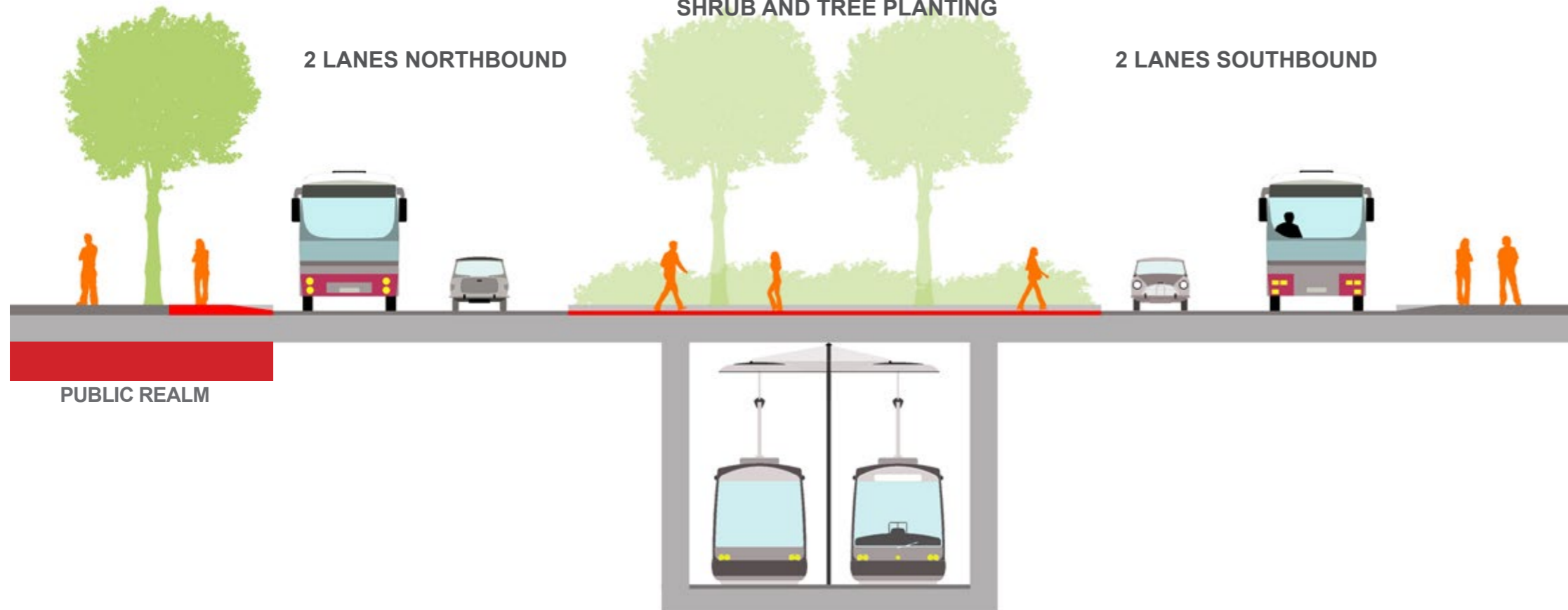


**PROPOSED**

2 LANES NORTHBOUND

RE-ALIGNED CROSSING WITH NEW SHRUB AND TREE PLANTING

2 LANES SOUTHBOUND



PROPOSED KEY PLAN (NTS)

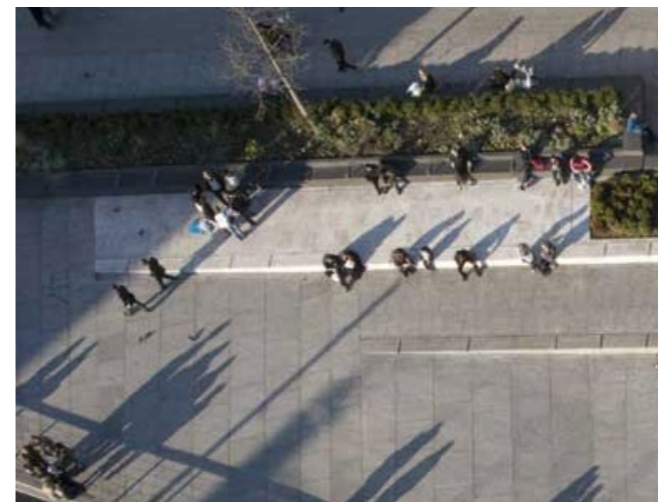
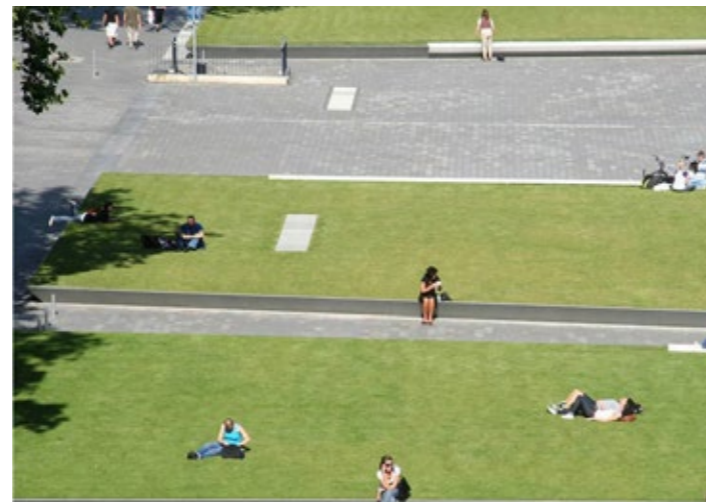


## 5.2 Arts Tower Court

***To create a significant new public space that is central to the campus and on the Gold Route. The enclosure of new buildings will provide an activated edge to the space, optimum seasonal sunshine, shelter from wind and noise, and suitable floor area to meet University growth.***

The Grade II listed Arts Tower and Western Bank Library are key destinations and landmarks for the University attracting significant people movement to and from the buildings, as well as being identified on the alignment of the City Gold Route. The surrounding environs are currently used as a large surface car park and provide an uninviting arrivals entrance to the University, dominated by vehicle movement. With the proposed Durham Road multi-storey car park the intention is to remove the parking from the Arts Tower concourse area and establish a significant new public space for the University and improve the pedestrian link from Bolsover Street to the Hounsfield Favell site.

The space is conceived as a high quality formal University Court, responding to the strong form of the Arts Tower, paved in stone with a grass plinth and raised reflective pool/water feature. The space could be used for University events, gatherings and graduations. The intention would be to allow limited parking to the rear of the Arts Tower (north elevation) and improved pedestrian links to Weston Park via a terraced garden space adjacent to the Western Bank Library. New bicycle parking and planted screen is proposed to the eastern edge of the tower helping to provide shelter from the wind whilst still allowing glimpse views out. Access for vehicles to the northern elevation of Firth Court will need to be maintained.



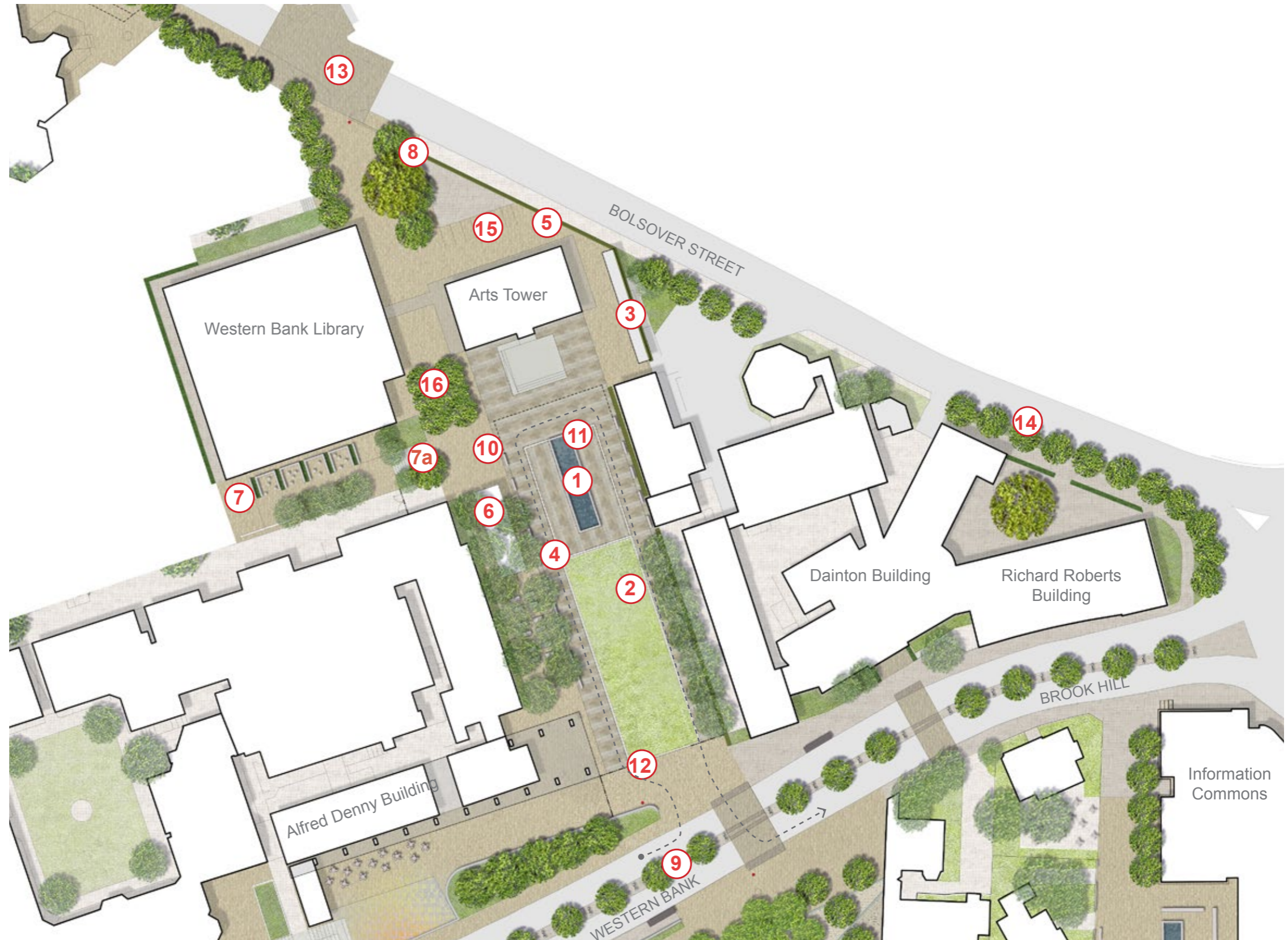


## 5.2 Arts Tower Court

### ARTS TOWER COURT PLAN

SCALE 1:1000 @ A3

1. Shallow pool water feature with raised stone seating edge
2. Lawn with raised stone seating edge
3. Relocated bicycle shelter
4. Distinctive stone paved surface (service access)
5. Planted green screen
6. New café
7. Garden terrace link to Weston Park with new steps at 7a
8. Landscape treatment to mark entrance to forecourt
9. Single row of trees in central reserve of Western Bank
10. Formal stone seating/benches
11. Distinctive stone paved surface surrounding water feature
12. New integrated security barriers for service access
13. New designated crossing points to Weston Park
14. New line of street trees
15. 10 no. parking spaces to rear of Arts Tower
16. Opportunity to investigate additional tree planting to Tower Court, subject to below-ground structures/services and detailed design for vehicle movement.





## 5.2 Arts Tower Court

*Existing View*





*Illustrative View*



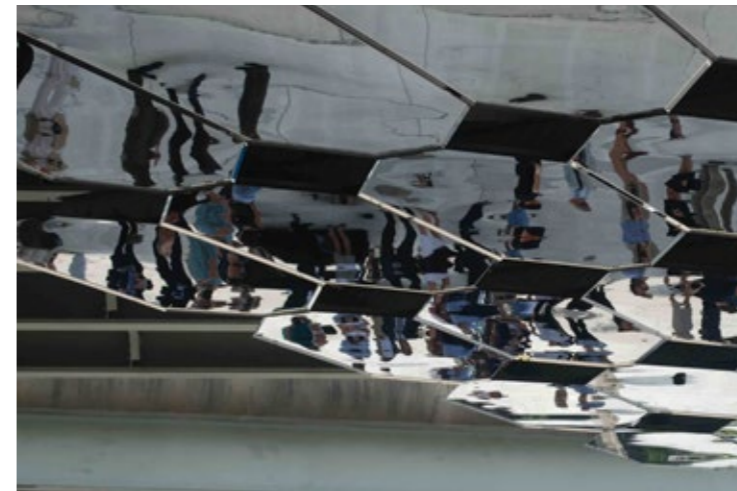


## 5.3 Concourse

***To consolidate the Concourse and Students' Union spaces, and give them enhanced connections to the University Gold Route by both a widened pedestrian route to the north of the Hicks Building and an activated ground floor frontage to the Alfred Denny Building.***

The Concourse is a key student space providing an important link beneath Western Bank as well as offering a space for shelter and student gatherings. The intention is to reinforce the links with the Students' Union and upgrade the quality of the space through a combination of a richly paved ground plane; an interactive arts lightwall structure along the underside of the concourse together with terraced seating. There is also the opportunity to explore the introduction of a permanent café facility incorporated beneath the concourse structure. In addition the parapet of the concourse structure needs to be cleaned and appropriately lit. Washing the soffits of the concrete with concealed lighting as well as up lighting the glass blocks which traverse the central reservation will create a 'cathedral' like space where staff, students and the public wish to remain rather than at present an area that is at the heart of campus but one which most people try to avoid staying within. Introducing planting adjacent to the concourse through a series of planters and through some appropriate landscaping will be important to break the hard landscape up.

The potential for green wall in this area will be explored with the owners of the road, Sheffield City Council, but this will present both practical difficulties and potential maintenance challenges as the bridge structure needs to be regularly inspected and maintained.



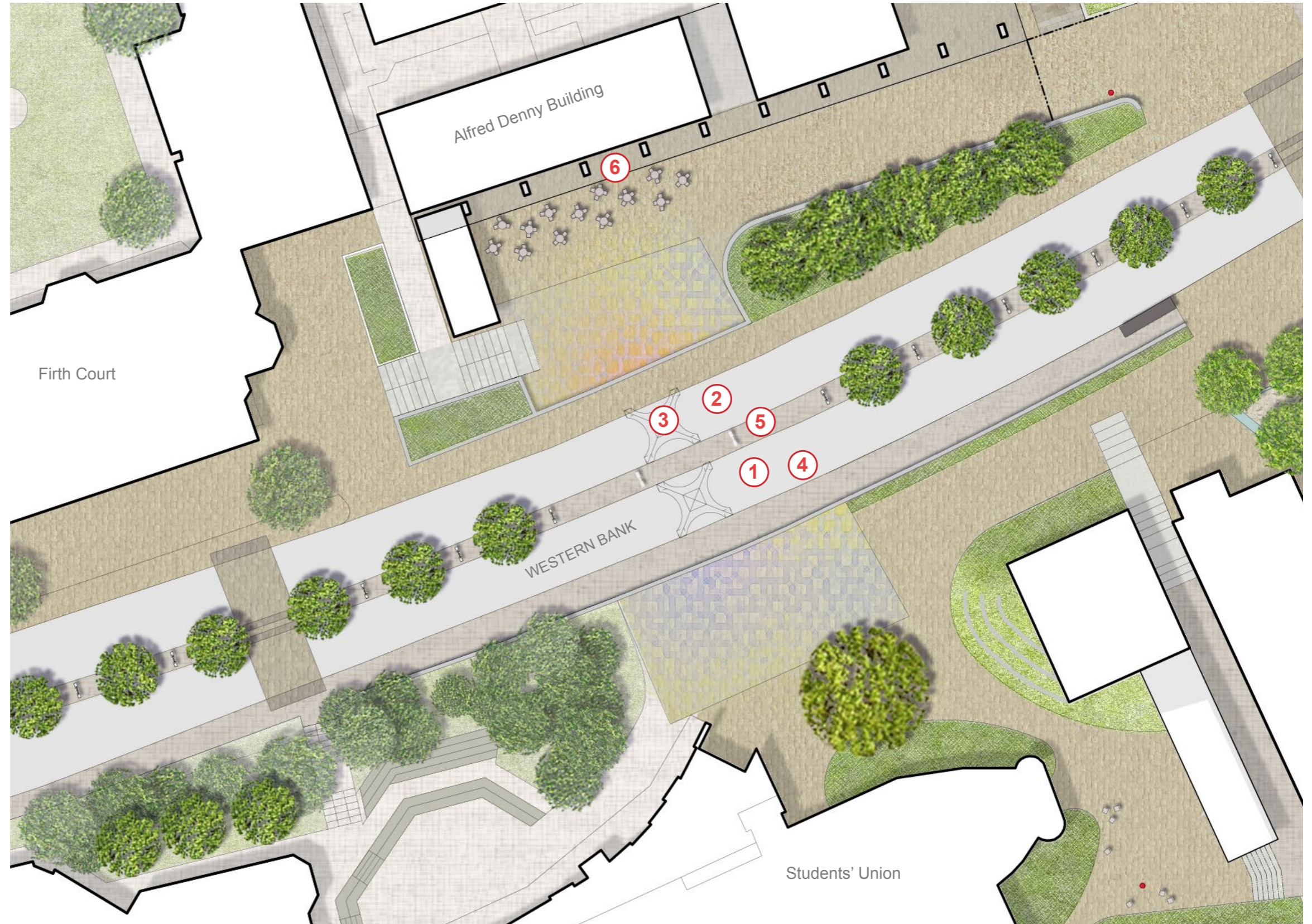


# 5.3 Concourse

## CONCOURSE PLAN

SCALE 1:500 @ A3

- 1. Distinctive/playful paving to concourse extents and extending ~12m from overhead structure
- 2. Feature lighting to paving
- 3. Uplighting highlighting existing columns
- 4. Lighting to walls
- 5. New café space
- 6. Seating and active frontage





## 5.4 Leavygreave Road

***To enhance the streetscape of Leavygreave Road by strengthening the building line with new buildings, introducing activated frontages, and creating focused public spaces along its route.***

The length of Leavygreave Road and Portobello Street is designed as a shared surface space, meaning that there is no definition between pedestrian and trafficked areas - an integrated space where pedestrians have priority. The intention is that the current adopted road designation would be changed and the streets would be maintained by the University. Vehicular access for the majority of the street is to be limited to emergency and maintenance access only. The streets would be paved throughout with a line of street tree planting along the western approach and a sustainable drainage system (SuDS) water feature located along the southern edge of the street. Large-scale trees are proposed to frame the arrival spaces of the academic buildings, such as The Diamond at Jessop East, and create a sequence of pocket spaces and gardens along the road.



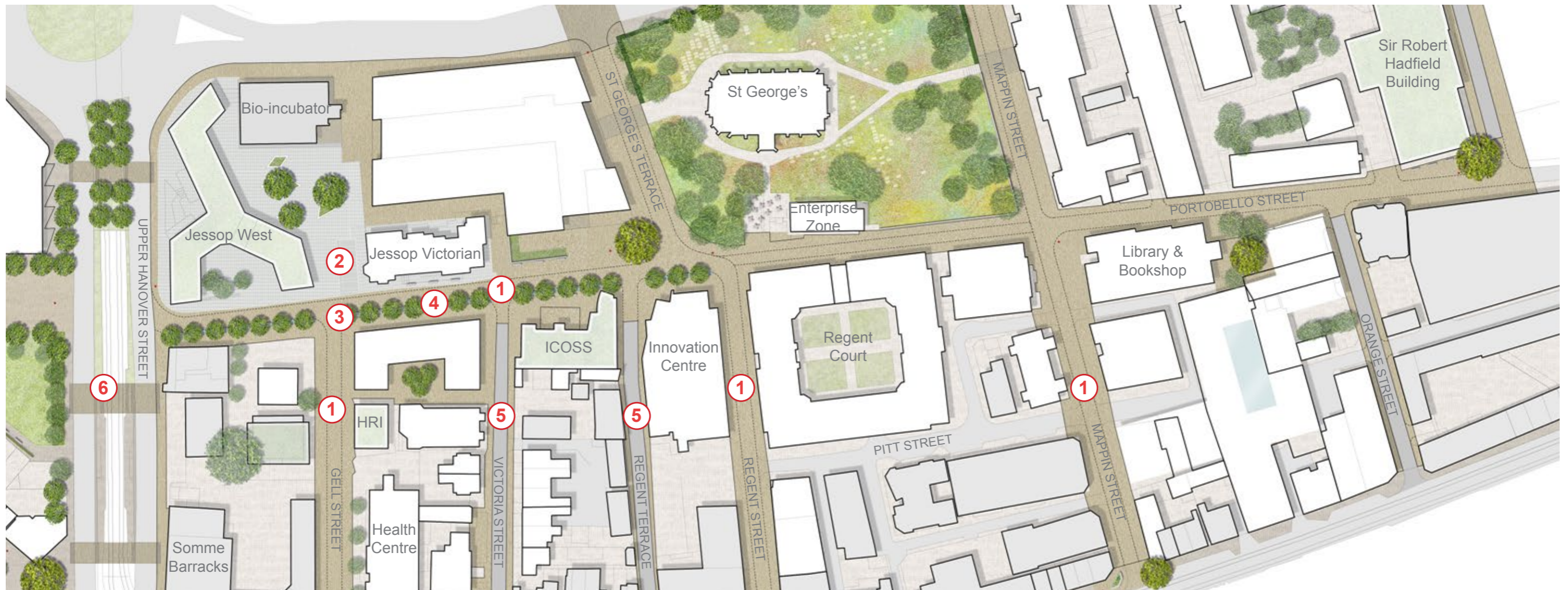


# 5.4 Leavygreave Road

## LEAVYGREAVE ROAD PLAN

SCALE 1:500 @ A3

- 1. Continuous shared surface
- 2. Jessop West paving extent
- 3. SuDS planters
- 4. Tree planting
- 5. Secondary streets
- 6. Upper Hanover Street at Leavygreave crossing





## 5.4 Leavygreave Road

### Existing View





*Illustrative View*

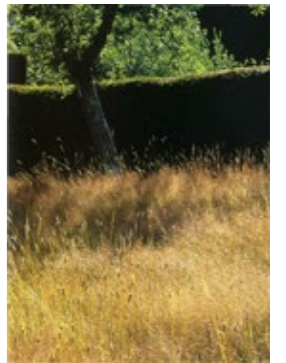




## 5.5 St George's Green

***To sensitively enhance the important historic green of the campus by enclosing the street edge with tree planting, encouraging seasonal change and introducing colour and texture with meadow planting, and finally activating the Leavygreave Road edge with a café terrace.***

The churchyard, with its combination of mature trees and cut grass is the only area of green open space within the University's domain; it is currently perceived as a contained area and a refuge from the hub of the city. However it lacks enclosure and the space is impacted upon by the adjacent road traffic from Broad Lane. There are opportunities to enhance the landscape setting of the church grounds and make the space more inviting for university use; a place for students to linger, relax and enjoy. The proposed landscape measures include new Yew hedgerow and additional tree planting along the northern boundaries; establishment of wildflower margins, additional seating and a new café and terrace at the entrance off Leavygreave Road. The intention is to work with the existing grave stones.



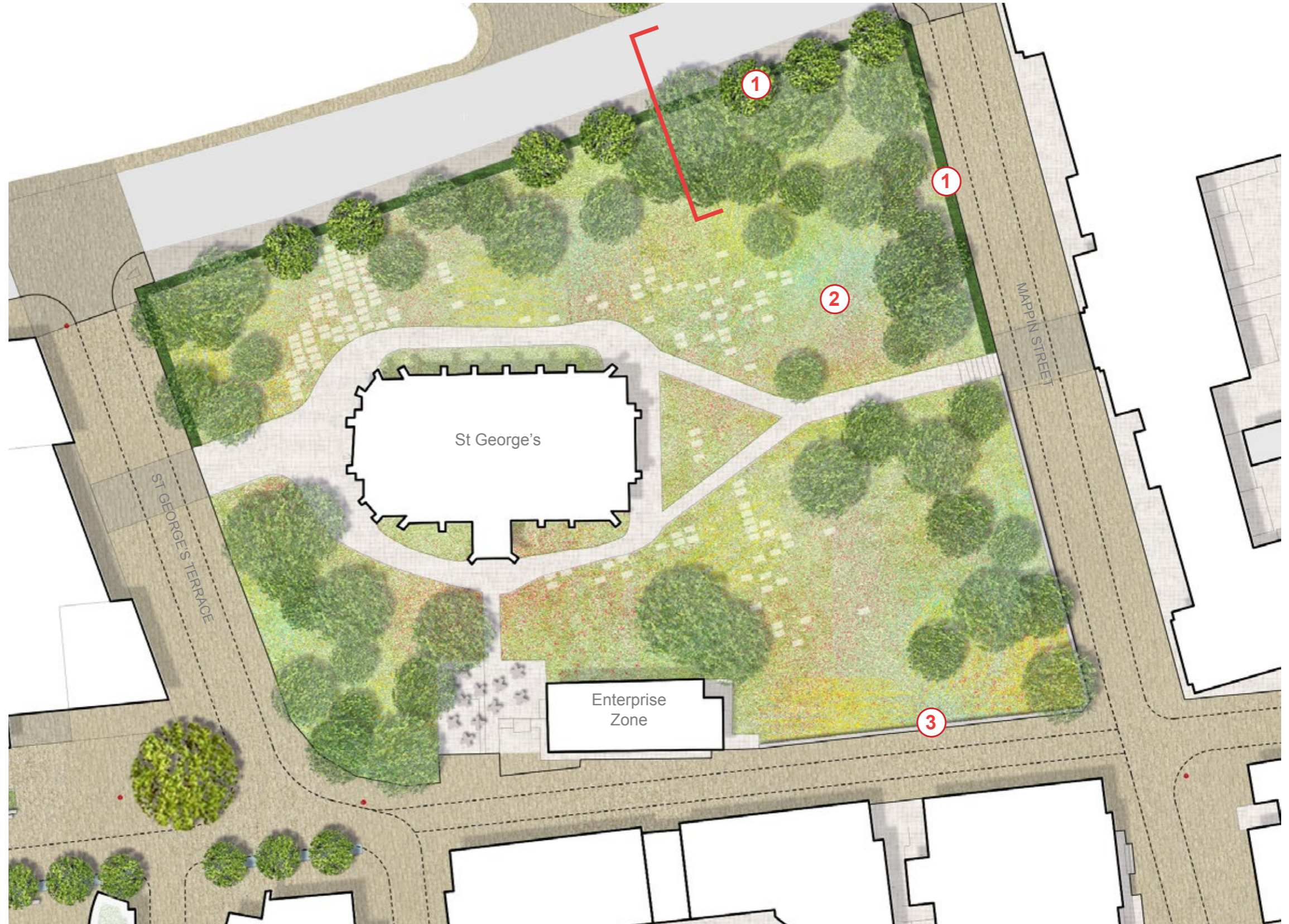


# 5.5 St George's Green

## ST GEORGE'S GREEN PLAN

SCALE 1:250 @ A3

- 1. Reinforce enclosure to St George's Green on Brookhill with tree planting and hedgerow
- 2. Seasonal meadow planting and enclosed tree planting around boundaries
- 3. South facing seating edge





## 5.6 University Square, Hounsfield

***To create a significant new public space – a University Square – that is central to the campus and a key destination on the City’s Gold Route. The enclosure of the square with the new University buildings will provide an activated edge to the space, optimum seasonal sunshine, shelter from wind and noise, and suitable floor area to meet University growth. The University Square will be a key area for academic staff and students to meet and share interdisciplinary research ideas as well as contribute to social and cultural life of the city.***

The University Square will be characterised by a grove of forest scale trees and seasonal herbaceous planting, with a linear urban rain garden, linking with the proposals on Leavygreave Road. The ground plane of the Square will be paved in a distinctive pattern of stone to create a unique identity to the space as well as complement the material palette of the City’s Gold Route. Coffee bars, social spaces and places to meet will be provided within the University buildings around the edge of the Square to create an active frontage and provide an opportunity to socialise, relax, study or just pause.



# 5.6 University Square, Hounsfieid

## UNIVERSITY SQUARE PLAN

SCALE 1:250 @ A3

1. Proposed University buildings with roof gardens arranged to create a new square public space.
2. University Square
3. Extension to Information Commons
4. Teraced link with tree planting to Western Bank
5. Stepped link to Upper Hanover Street
6. Grove of forest trees and central garden
7. Seating and active frontage
8. Urban rain garden
9. Street tree planting to Hounsfieid Road





## 5.6 University Square, Hounsfieid

*Existing View*





*Illustrative View*





