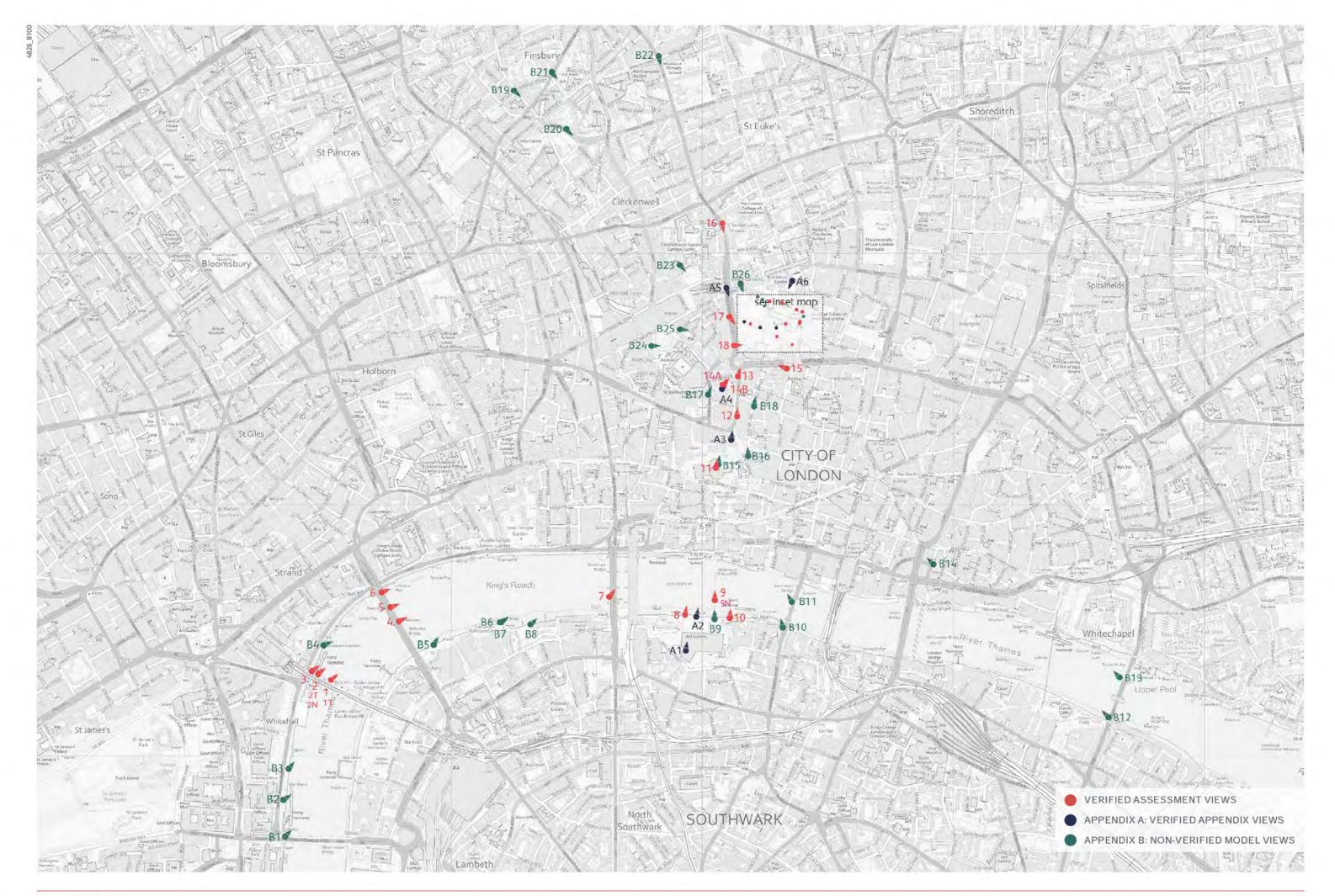
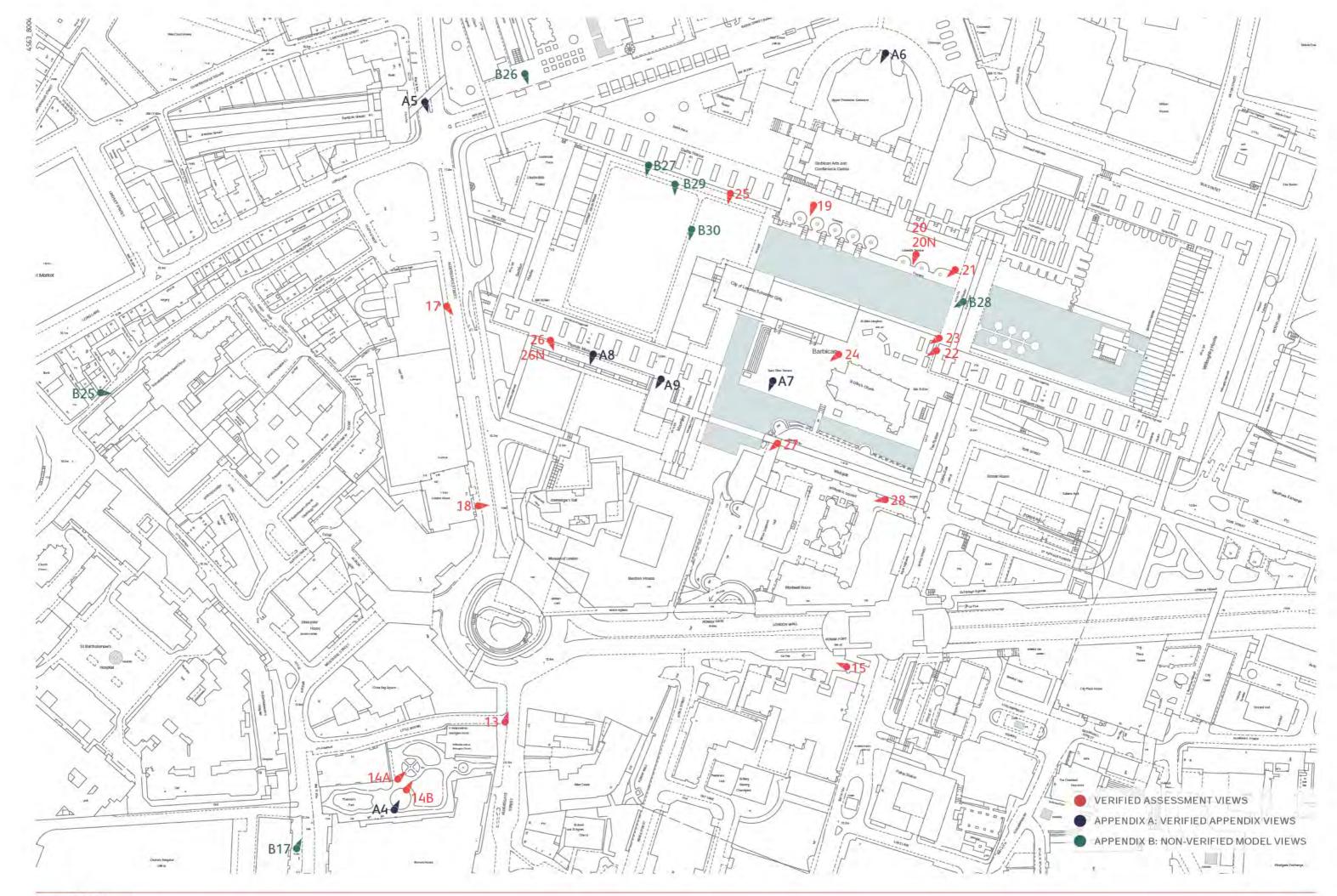
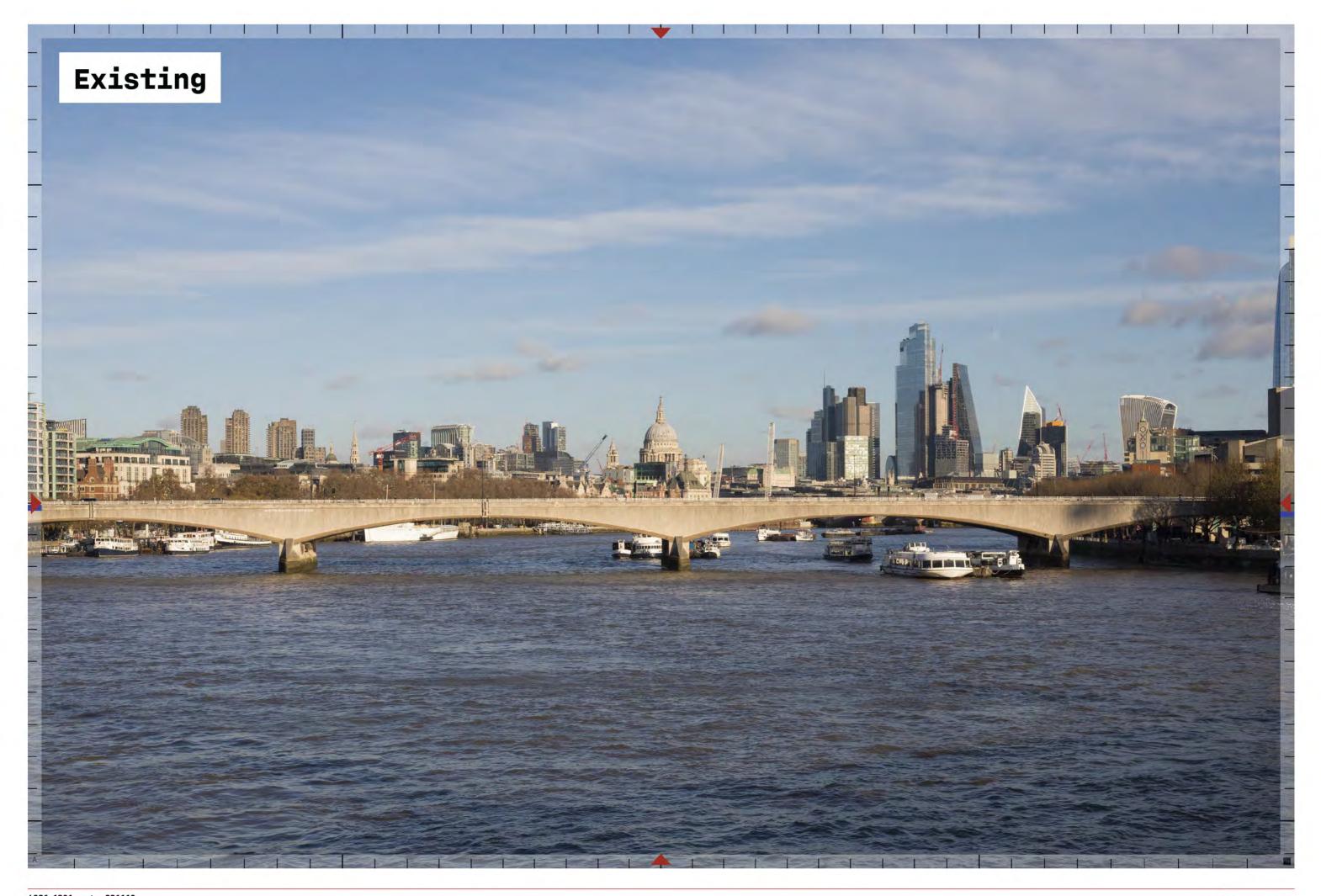
LVMF & LOCAL TOWNSCAPE VIEWS



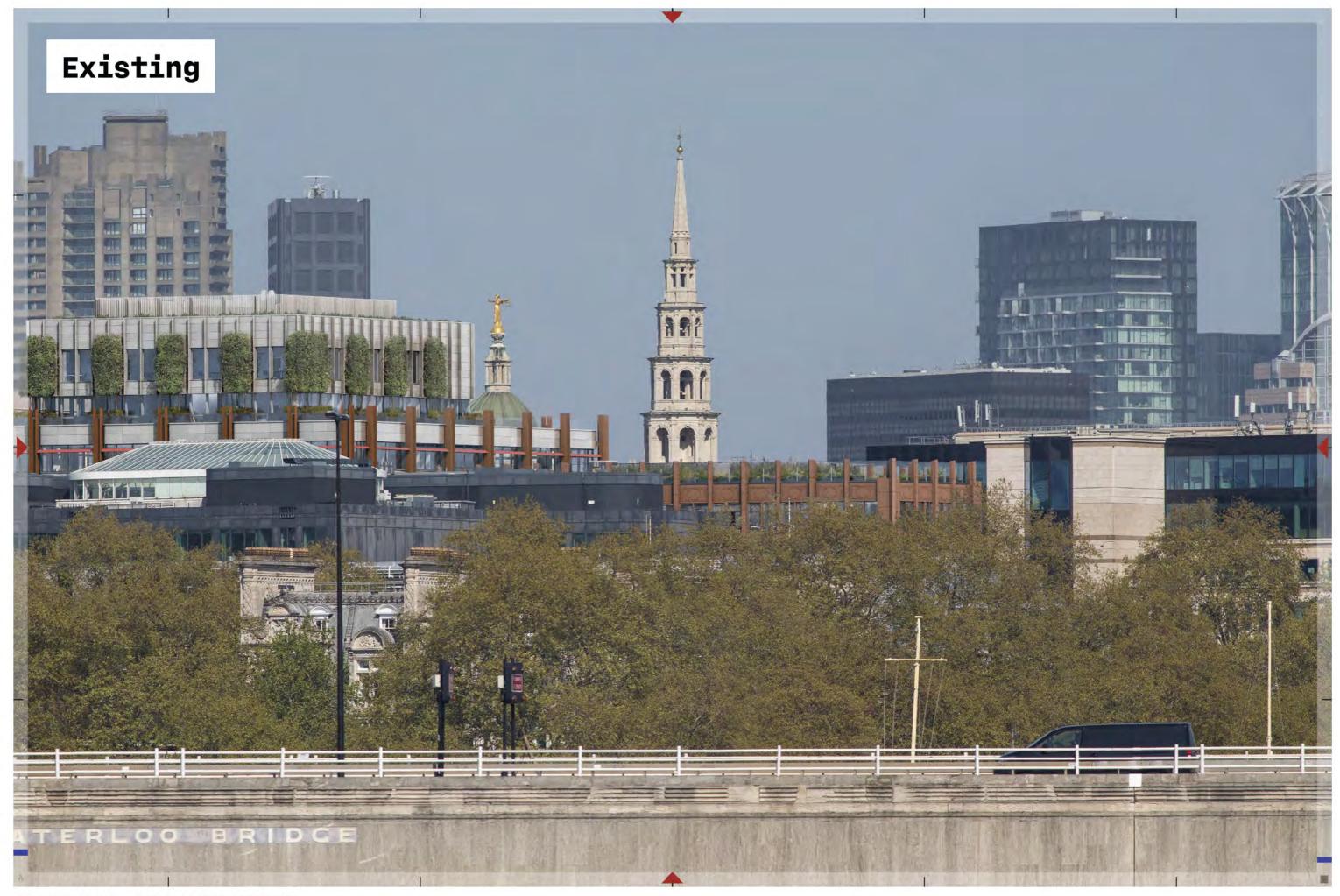


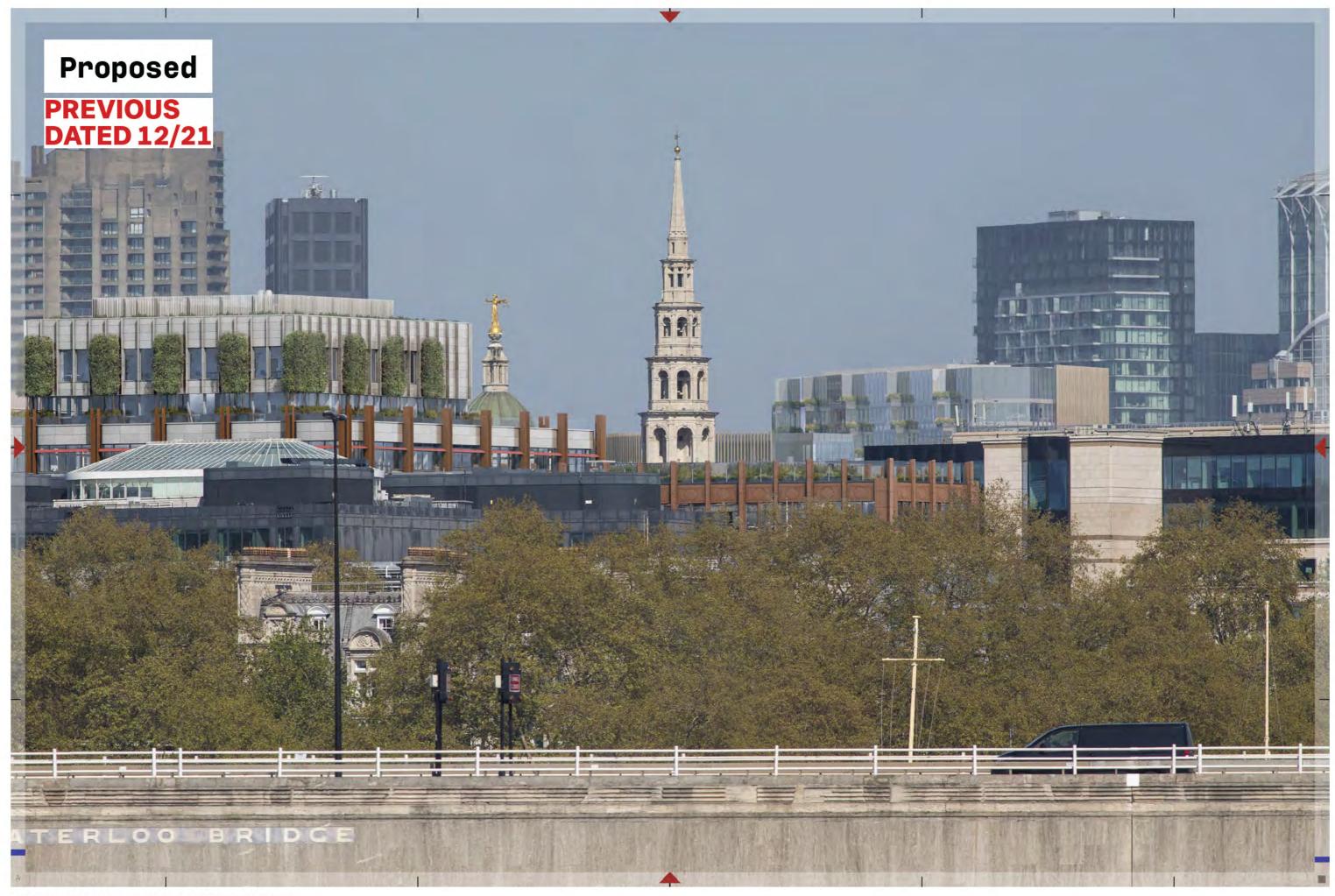


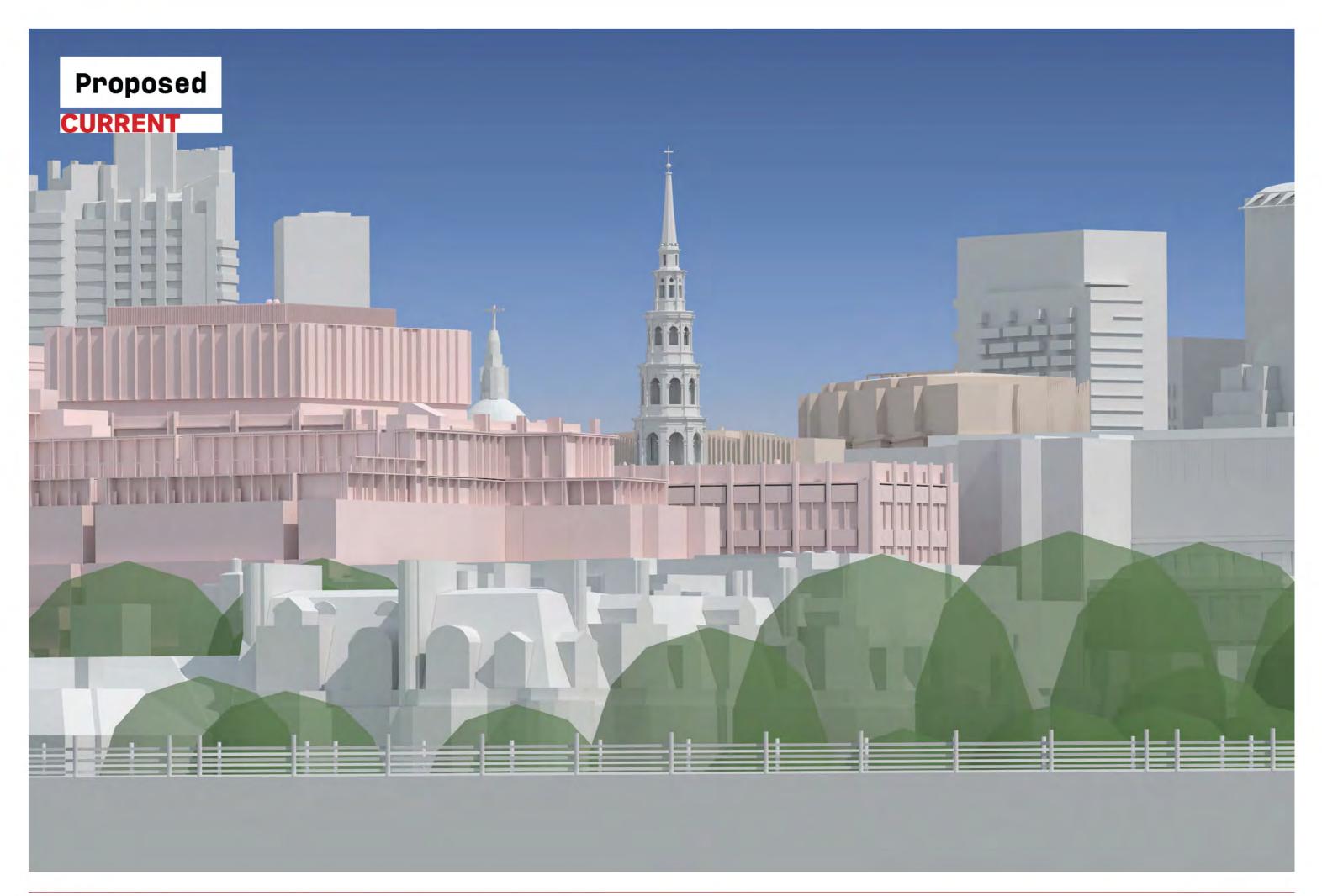






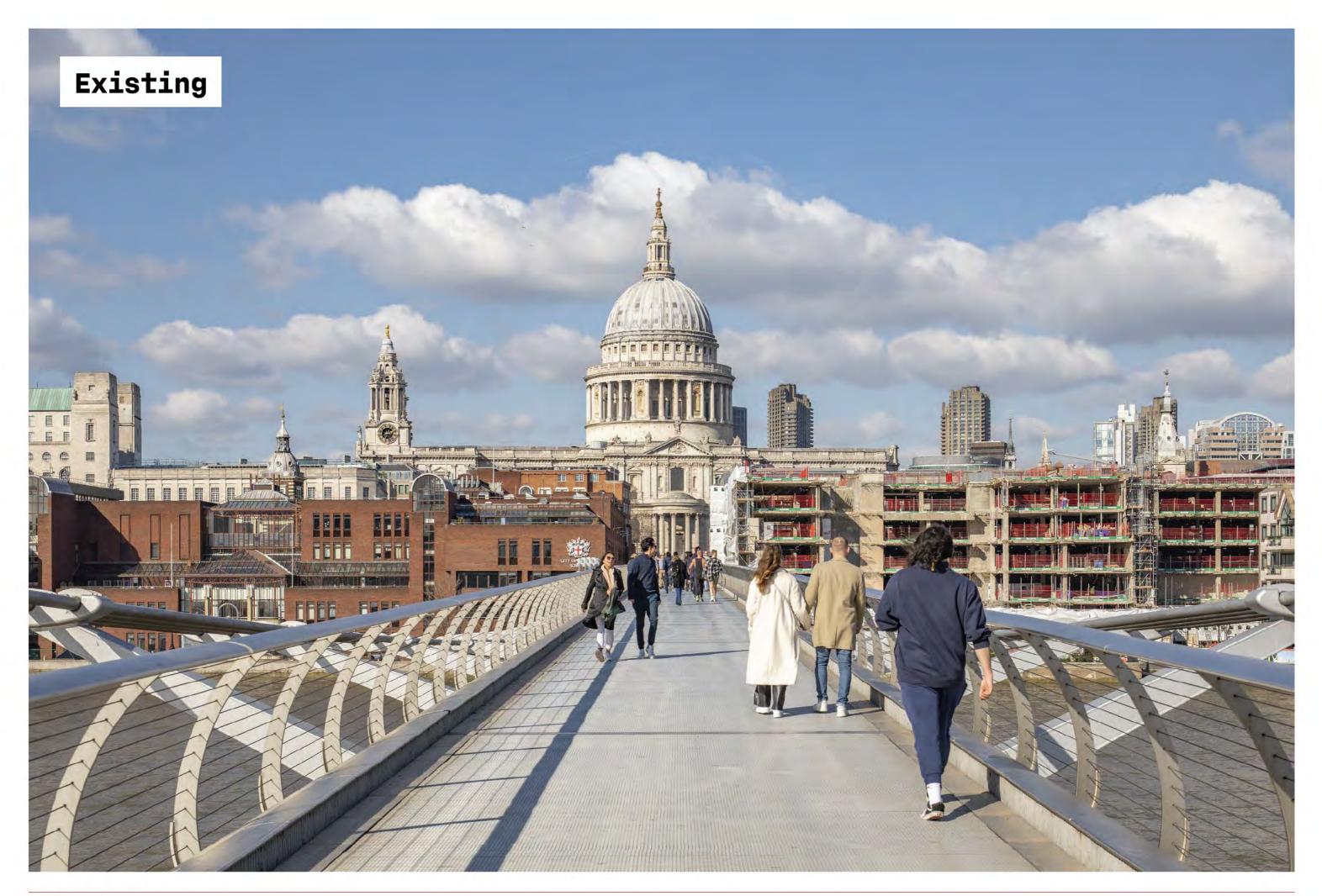


























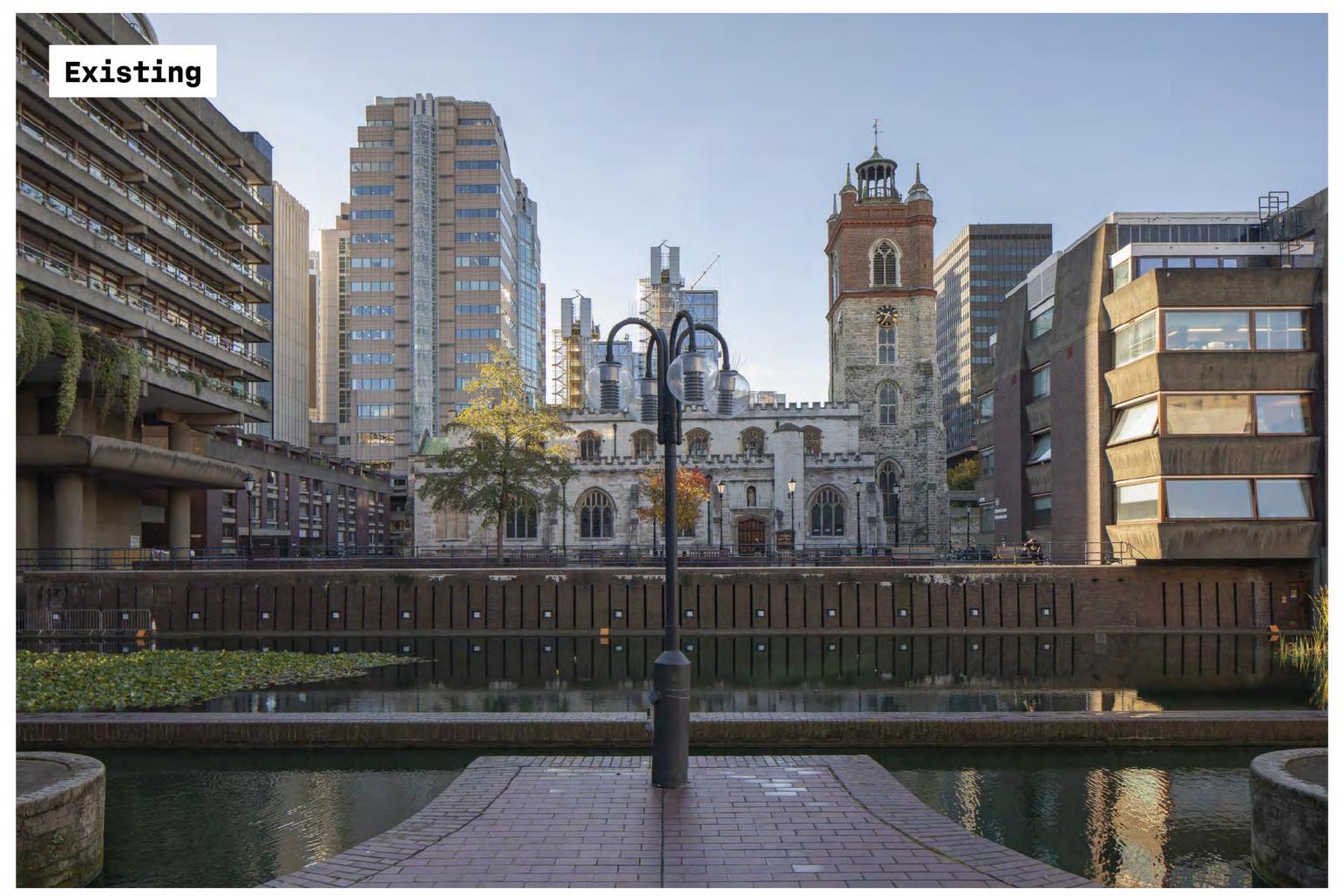


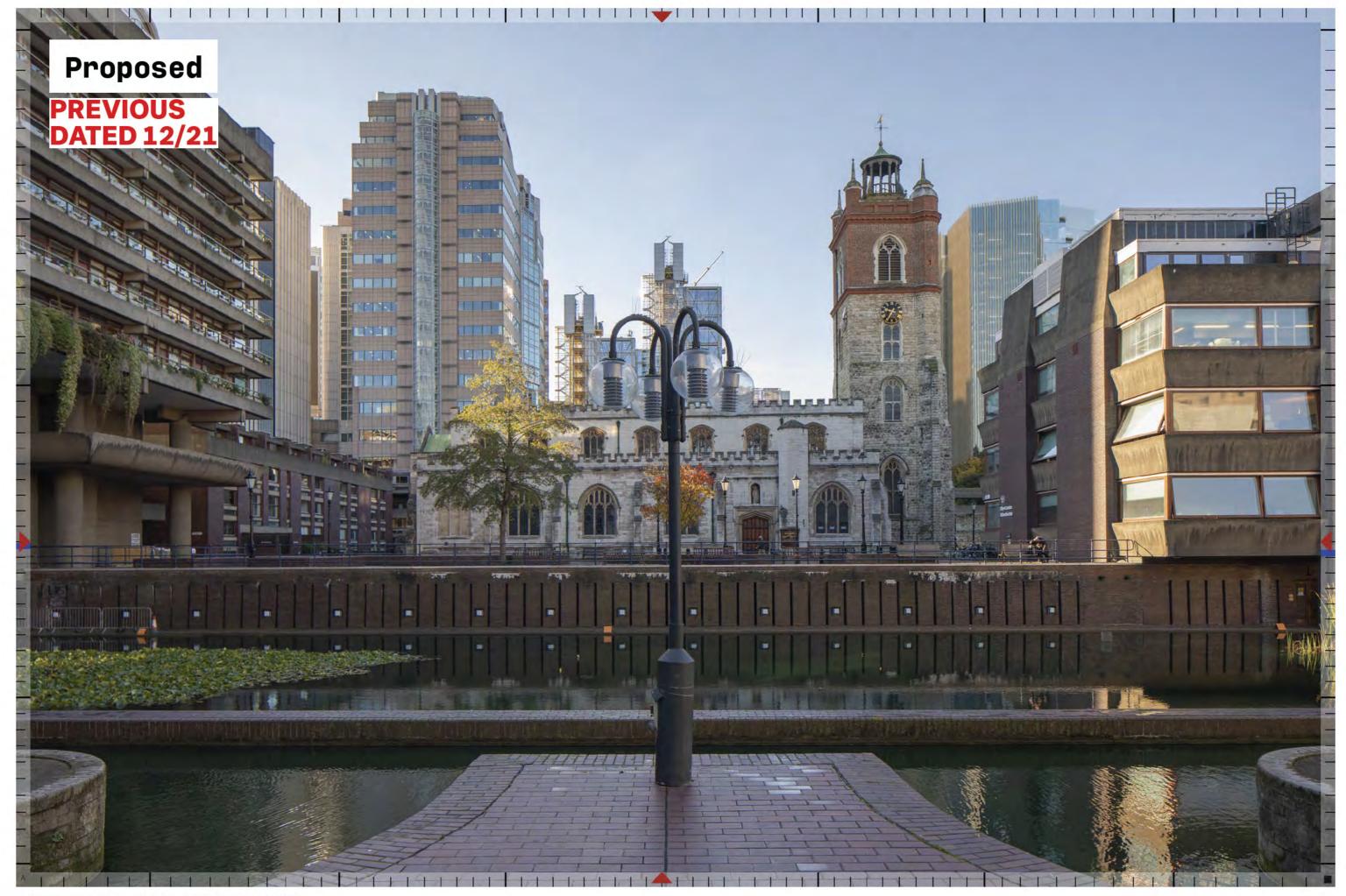




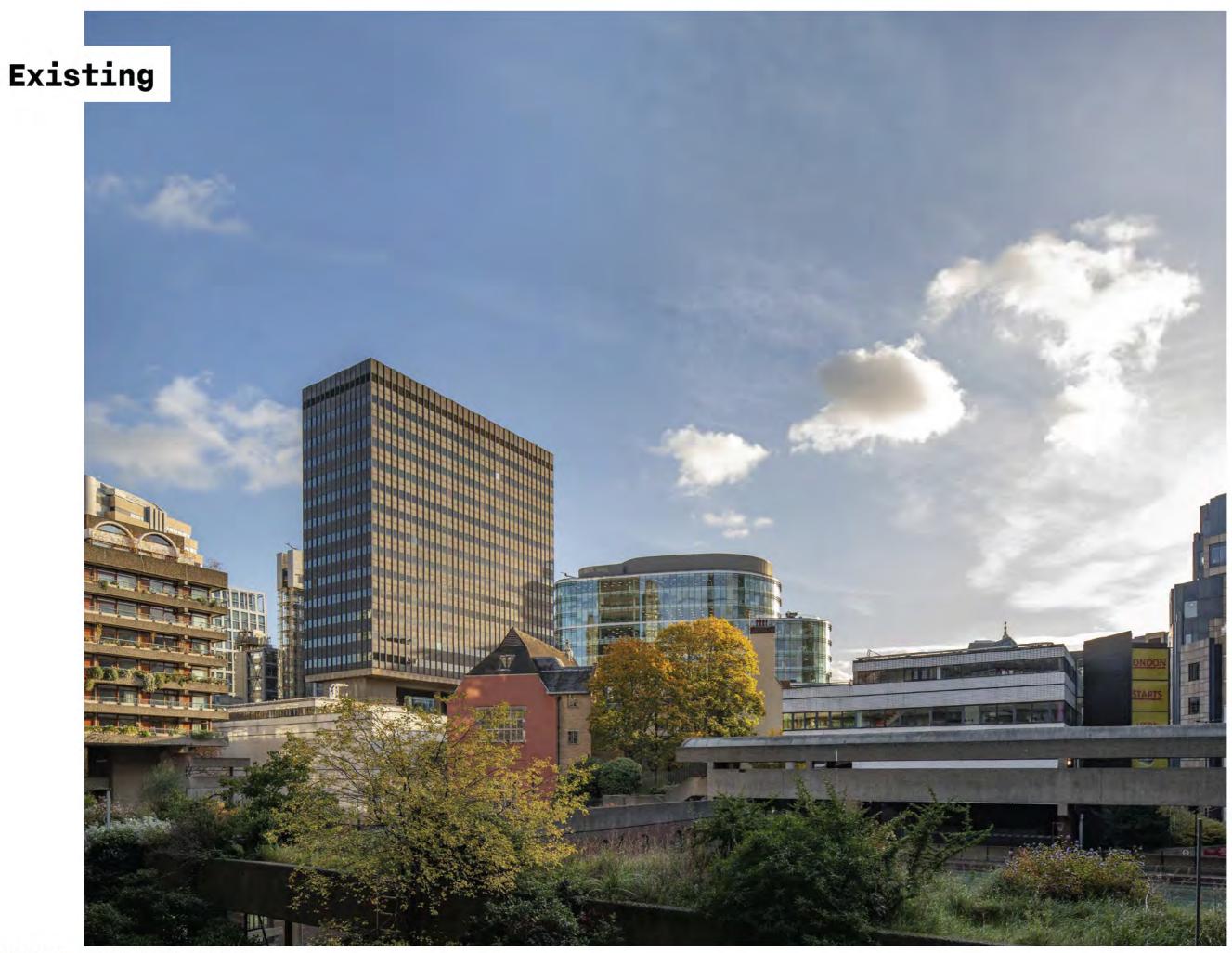


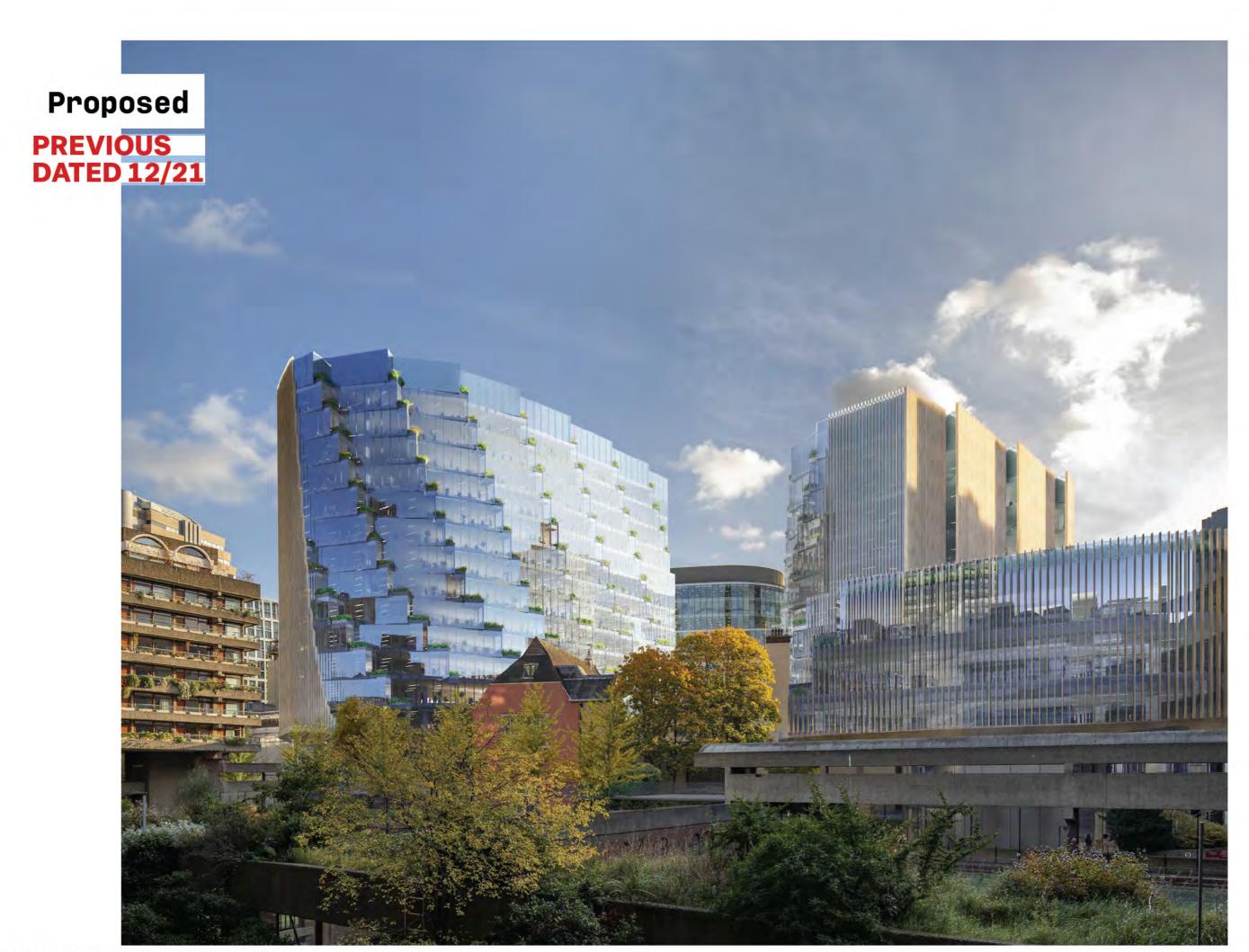












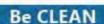






SUSTAINABILITY OVERVIEW

Energy Strategy – at a glance



Be LEAN

Be GREEN



Along delivering a Net Zero Carbon development, the aim is also to ensure that it can adapt through its useful life and can be reclaimed and reused when no longer fit for purpose



Photovoltaic panels, to generate clean onsite energy



Air Source Heat Pumps are low-carbon systems that can provide both heating and cooling to a building using the air from outside



LED lighting with high efficacy and linked to perimeter daylight dimming





Centralised ventilation The main buildings have supplementary mechanical ventilation from a centralised ventilation system. Air handling units (AHUs) with 80% heat recovery efficiency.



External solar shading to minimise the need for additional cooling, therefore reducing energy consumption and glare discomfort.



Connection to the Citigen network for both heating and cooling and subject to the further development of the design in collaboration with Citigen.



Greening: Enhancement of planting and green space to increase biodiversity, reduce stormwater run-off and create a pleasant environment.



Mixed mode ventilation based on operable windows linked to central energy management system.



Demand control ventilation, based on room temperature and air quality (CO2 levels), meaning less energy is used



Façade optimisation High thermal performance curtain wall system and solar control coating. Reducing the need for addition heating and

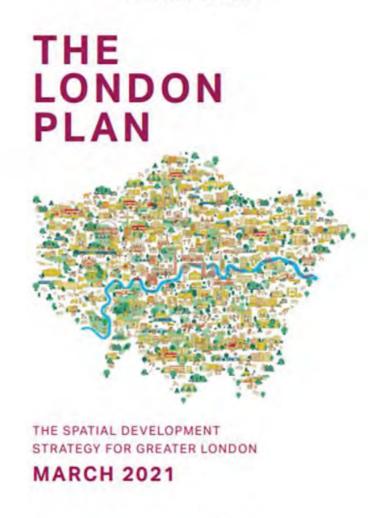
cooling.



SuDS, to incorporate green roof, rain garden, permeable surfacing, Greenfield discharge Rainwater harvesting.

Policies and Framework

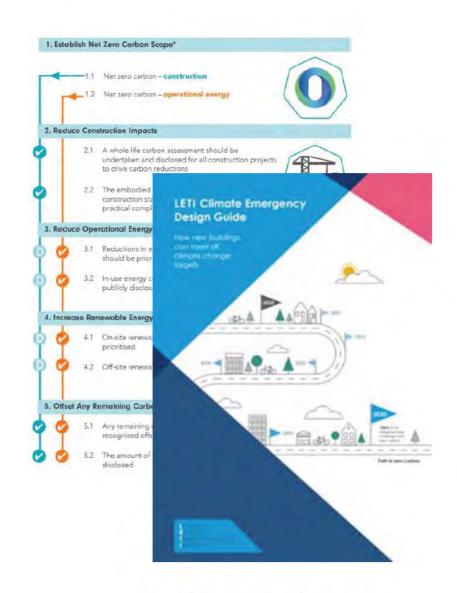
MAYOR OF LONDON



London Plan 2021



BREEAM Outstanding is currently being targeted through Baseline/ Medium risk credits (81.9%)



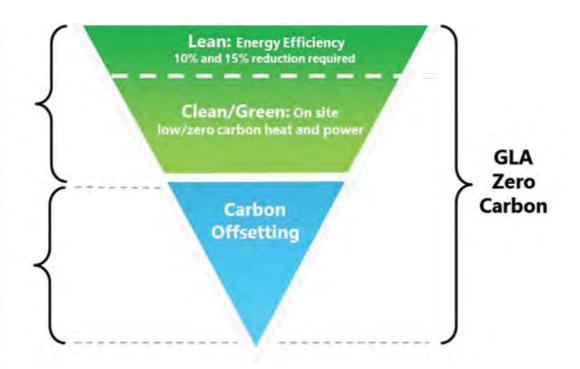
Net Zero Carbon UK GBC and LETI

GLA and Regional Policy

GLA London Plan (2021)	City of London-policies
 10% savings in residential and 15% in non-residential from energy efficiency alone Following the energy and overheating hierarchy 35% on-site total carbon savings (using SAP 10 future carbon factors) 	 Policy SI2 of the London Plan (2021) relates to the minimisation of greenhouse gases within major developments across London. Policy SI7 of the London Plan (2021) relates to the reduction of waste and the increase of re-usable materials to support the circular economy of major developments. Part B of Policy SI7 notes that 'referable applications should promote circular economy outcomes and aim to be net zerowaste
☐ Zero carbon through borough offsets	Core Strategic Policy CS15 of the City of London's Local Plan (2015)
☐ Minimise/justify the need for cooling	requires all development proposals to develop the highest feasible
☐ Decentralised heat networks with no net NOx and air quality impacts	sustainability standards in the design, construction, operation and 'end of life' phases of development.
☐ TM54 modelling for the redevelopment	Strategic Policy CS16 of the City's Draft Local Plan (2021) relates to overall strategic management of

waste at all stages of the

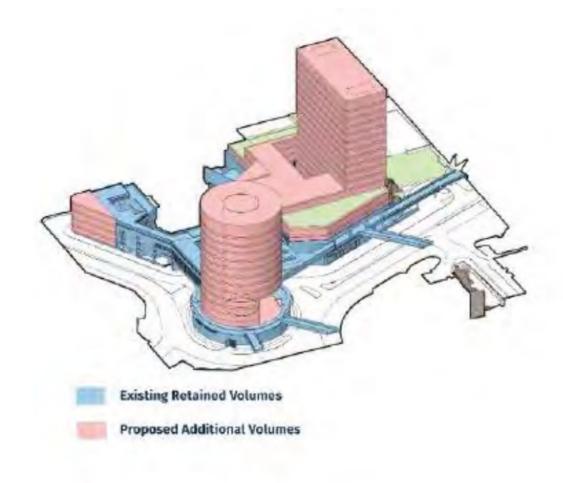
development cycle.



Building Regulation Part L2A 2021

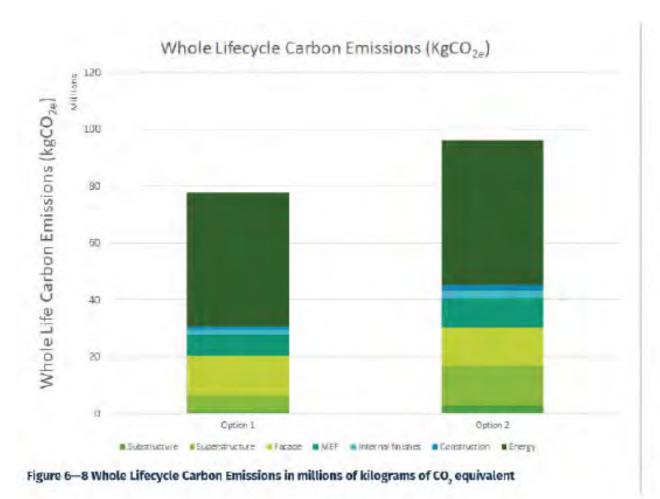
RE-USE OPTIONS

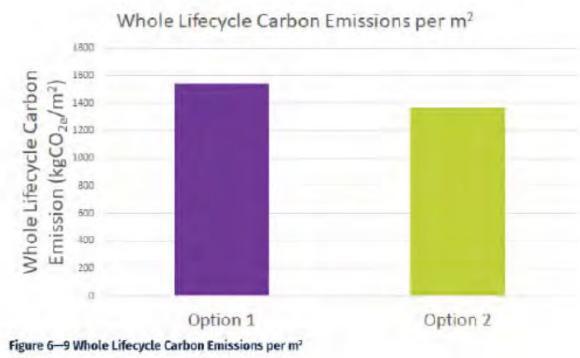
PASTRE-USE STUDY





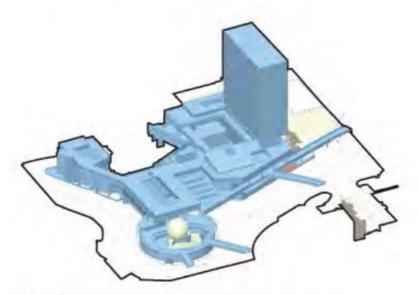
PASTRE-USE STUDY



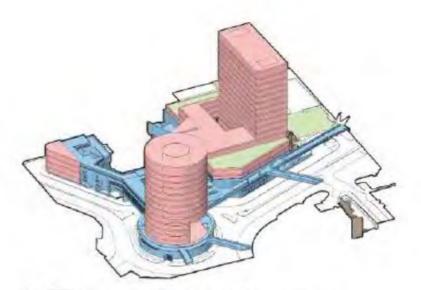




No intervention



Minor refurnishment



Major refurbishment

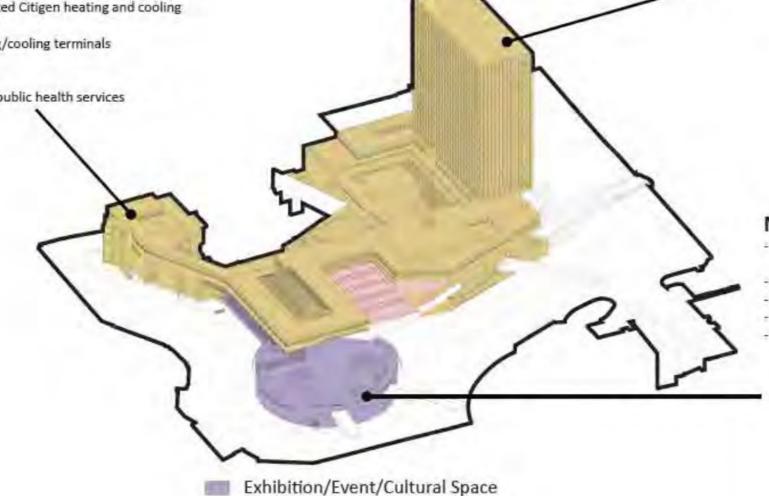


New build

NEW MOL OFFICE SPACE

- Convert suitable museum space to office space
- New cladding, stick façade system, operable windows
- Anti-carbonation treatment to concrete
- Internal insulation to retained solid elements
- New MEP installations:
 - New lift cars and machinery
 - Roof plant for ventilation separated from cultural venue equipment
 - New dedicated Citigen heating and cooling connections
 - New heating/cooling terminals
 - Re-wire
 - Re-lighting





Retail F&B

Office

BASTION HOUSE

- Refurbished office space
- New cladding, stick façade system, operable windows
- Anti-carbonation treatment to concrete
- Internal insulation to roof and lowest floor
- New MEP installations:
 - New lift cars and machinery
 - Increased roof plant for increased ventilation
 - Retain Citigen heating and cooling connections
 - New heating/cooling terminals
 - Re-wire
 - Re-lighting
 - Renewal of public health services

NEW CULTURAL SPACE

- Refurbish existing Museum of London to whitebox Cultural Space
- Replace glazing
- Anti-carbonation treatment to concrete
- Internal insulation to retained solid elements
- New MEP installations:
 - New lift cars and machinery
 - New ventilation equipment to suit
 - Retain Citigen heating and cooling connections
 - New ducted heating/cooling to FOH areas and heating/cooling terminals to BOH areas
 - Re-wire
 - Re-lighting
 - Renewal of public health services

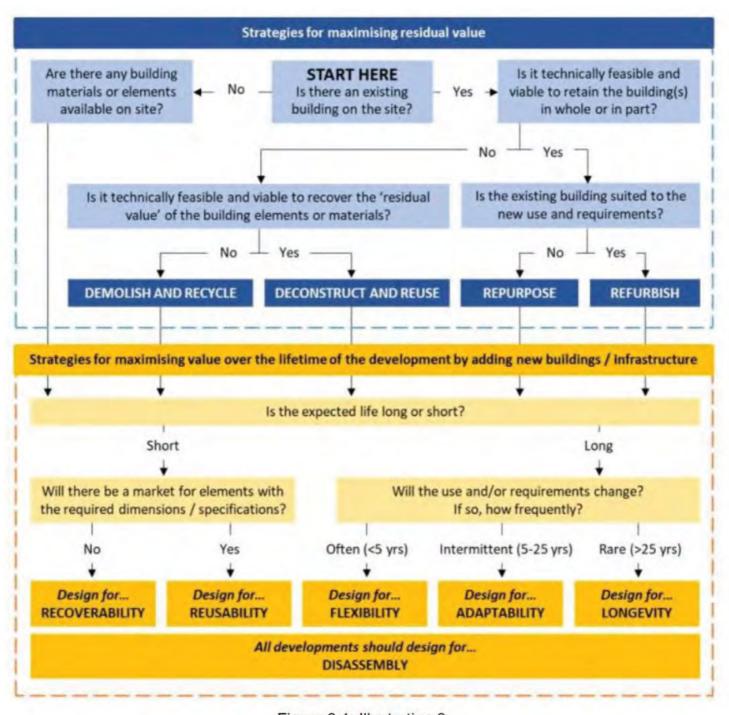


Figure 3.1: Illustration 3

RE-USE STUDY - OPTION 0

