

Transport Assessment
TPP

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1 INTRODUCTION

1.1 General

1.1.1 Transport Planning Practice (TPP) has been appointed by GPE (St Thomas Street)
Ltd (GPE) to prepare a Transport Assessment (TA) for the proposed redevelopment at a site known as New City Court, 20 St Thomas Street, London, SE1 9RS within the London Borough of Southwark (LBS).

1.2 Existing site context

- 1.2.1 The site is located in the London Bridge area covering an area of approximately 0.36 hectares (ha). The site is bounded by St Thomas Street to the north; shops on Borough High Street (A3) to the west; King's Head Yard to the south; and Guy's Hospital buildings to the east.
- 1.2.2 A site location plan is included in Figure 1 and a red line boundary plan is provided in Figure 2.

1.3 Proposed development

- 1.3.1 GPE is seeking to obtain full planning permission and listed building consent for the part demolition, part deconstruction and refurbishment of listed townhouses / façades, and construction of an office-led, mixed-use scheme.
- 1.3.2 The proposed development as described in the planning application form is as follows:

'Comprehensive redevelopment of the site to include demolition of existing 1980s office buildings and erection of a 37-storey building (including ground and mezzanine) of a maximum height of 144m (AOD), restoration and refurbishment of existing listed terrace, and redevelopment of Keats House with retention of existing façade to provide a total of 46,374 sqm of Class B1 office floorspace, 765 sqm of Class A1 retail floorspace, 1,139 sqm of Class A3 retail floorspace, 615 sqm of leisure floorspace (Class D2), 719 sqm hub space (Class B1/D2) and a 825 sqm elevated public garden, associated public realm and highways improvements, new station entrance, cycling parking, car parking, servicing, refuse and plant areas, and all ancillary or associated works.'



1.4 Report structure

- 1.4.1 Following this section, the remainder of the report is set out as follows:
 - Section 2: Transport policy provides a summary of the local, regional and national transport policies against which the proposals are assessed.
 - Section 3: Existing situation and assessment scenarios provides information on the existing site and sets out the assessment scenarios.
 - Section 4: Baseline conditions: pedestrians and cyclists reviews the accessibility of the site by walking and cycling.
 - Section 5: Baseline conditions: PTAL provides a PTAL assessment for the site.
 - Section 6: Baseline conditions: local bus services sets out the available bus services in the vicinity of the site.
 - Section 7: Baseline conditions: London Underground provides details of the available Underground services.
 - Section 8: Baseline conditions: National Rail sets out the available National Rail services near the site.
 - Section 9: Baseline conditions: River Taxi sets out the available River Taxi services near the site.
 - Section 10: Highway network and parking describes the local highway network and parking restrictions on roads surrounding the site. Baseline traffic flows and accident data is also provided.
 - Section 11: Proposed development provides details of the proposed scheme including the proposed land uses, access, parking and servicing arrangements.
 - Section 12: Trip generation sets out a multi-modal trip generation assessment for the existing and proposed development.



- **Section 13: Servicing trip generation** sets out the servicing vehicle generation for the existing and proposed development.
- Section 14 to Section 19 provides an assessment of the transport impacts associated with the development proposals on the local transport network. A cumulative assessment is also considered.
- Section 20: Interim Travel Plan outlines the key principles of the Travel Plan for the site.
- Section 21: Summary and conclusions summarises the report and its conclusions.



2 TRANSPORT POLICY

- 2.1.1 This section provides a summary of the relevant transport policies against which the proposals are assessed. The main policy and guidance documents in this regard are:
 - New National Planning Policy Framework (2018);
 - The London Plan (2016);
 - Draft New London Plan (2018);
 - Mayor's Transport Strategy (2018);
 - Saved Southwark Plan Policies (2013);
 - Southwark Core Strategy (2011); and
 - Draft New Southwark Plan (2018).

2.2 National Policy

New National Planning Policy Framework (NPPF) (2018)

- 2.2.1 The updated NPPF, revised for the first time since the original publication in 2012, was published in July 2018. The document focuses on increasing the delivery of new housing and achieving high quality design.
- 2.2.2 With regard to transport Chapter 9 'Promoting Sustainable Transport' states that transport issues should be considered from the earliest stages of planmaking and development proposals, so that:
 - the potential impacts of development on transport networks can be addressed;
 - opportunities from existing or proposed transport infrastructure, and changing transport technology and usage, are realised – for example in relation to the scale, location or density of development that can be accommodated;
 - opportunities to promote walking, cycling and public transport use are identified and pursued;



- the environmental impacts of traffic and transport infrastructure can be identified, assessed and taken into account – including appropriate opportunities for avoiding and mitigating any adverse effects, and for net environmental gains; and
- patterns of movement, streets, parking and other transport considerations are integral to the design of schemes, and contribute to making high quality places.

2.3 Regional Planning Policy

The London Plan (2016)

- 2.3.1 The London Plan (March 2016) provides the overall strategic plan for London setting out an integrated economic, environmental, transport and social framework for the development of the capital over the next 20-25 years.
- 2.3.2 Policy 6.1 'Strategic Approach' states that the Mayor will work with all relevant partners to: Encourage patterns and nodes of development that reduce the need to travel; improve the capacity and accessibility of public transport, walking and cycling; support development that generates high levels of trips at locations with high levels of public transport accessibility and/or capacity; and support measures that encourage shifts to more sustainable modes.
- 2.3.3 Policy 6.3 on 'Assessing Effects of Development on Transport Capacity' states that development proposals should ensure that impacts on transport capacity and the transport network are fully assessed. Transport Assessments should be provided in accordance with TfL guidance and Travel Plans should be provided for applications above the thresholds set out in TfL guidance.
- 2.3.4 Policy 6.7 on 'Better streets and surface transport' highlights the importance of promoting bus and tram networks. Policy 6.9 on 'Cycling' states that the Mayor will work with all relevant partners to bring a significant increase in cycling in London, so that it accounts for at least 5% of modal share by 2026. This will occur by identifying, promoting and implementing a network of cycle routes across London. Policy 6.10 on 'Walking' aims at increasing walking as a mode of transport in London by emphasizing the quality of the pedestrian and street environment. Policy 6.12 on 'Road network capacity' assesses proposals for



increasing road capacity and takes into account how conditions for pedestrians, cyclists, public transport users, freight and local residents can be improved.

2.3.5 The London Plan sets out standards for car parking and cycle parking. Policy 6.13 on 'Parking' states that the Mayor wishes to see an appropriate balance being struck between promoting new development and preventing excessive car parking provision that can undermine cycling, walking and public transport use. The document also states that in locations with high public transport accessibility, car-free developments should be promoted. Table 2.1 shows the minimum cycle parking standards relevant to the proposed development.

Table 2.1 - The London Plan (2016) minimum cycle parking standards

Land use		Cycle	Cycle parking					
		Long-stay	Short-stay					
B1	Business offices	inner/ central London: 1 space per 90 sqm outer London: 1 space per 150 sqm	first 5,000 sqm: 1 space per 500 sqm thereafter: 1 space per 5,000 sqm					
	Food retail from a threshold of 100 sqm: 1 space per 175 sqm		from a threshold of 100 sqm: first 750 sqm: 1 space per 40 sqm thereafter: 1 space per 300 sqm					
A1	Non-food retail from a threshold of 100 sqm: first 1000 sqm: 1 space per 250 sqm thereafter: 1 space per 1000 sqm		from a threshold of 100 sqm: first 1000 sqm: 1 space per 125 sqm thereafter: 1 space per 1000 sqm					
А3	Cafes & restaurants	from a threshold of 100 sqm: 1 space per 175 sqm	from a threshold of 100 sqm: 1 space per 40 sqm					

Draft New London Plan (2018)

- 2.3.6 The Draft New London Plan has been published for public consultation (which ended in March 2018) and is expected to be adopted in 2019 following public examination. The Mayor published the 'Draft New London Plan showing Minor Suggested Changes' on 13th August 2018. Given the current status of the Draft London Plan limited weight is expected to be given to it during consideration of the current application. Notwithstanding this, we have considered the application in light of the current draft, which contains the following potential change to policies:
 - Increased cycle parking standards for some land uses including for office and retail uses as set out in Table 2.2.



- Changes to the disabled car parking provision requirements although this applies to residential developments.
- Requiring developments to demonstrate how they will deliver improvements that support the Healthy Street Indicators.

Table 2.2 - Draft New London Plan (2018) minimum cycle parking standards

Land use		Cycle	parking
		Long-stay	Short-stay
B1	Offices Paris agric		First 5,000 sqm: 1 space per 500 sqm Thereafter: 1 space per 5,000 sqm
	Food retail	For a threshold of 100 sqm: 1 space per 175 sqm	For a threshold of 100 sqm Inner/central London: first 750 sqm 1 space per 20 sqm, thereafter 1 space per 150 sqm.
A1	Non-food retail	For a threshold of 100 sqm: first 1000 sqm, 1 space per 250 sqm, thereafter 1 space per 1000 sqm	For a threshold of 100 sqm, Inner/central London: first 750 sqm, 1 space per 60 sqm thereafter 1 space per 500 sqm.
А3	Cafes & From a threshold of 100 sqm: 1 space per 175 sqm		For a threshold of 100 sqm, Inner/central London: 1 sapce per 20 sqm

Mayor's Transport Strategy (2018)

- 2.3.7 The Mayor's Transport Strategy sets out the Mayor's policies and proposals to reshape transport in London over the next 25 years.
- 2.3.8 The strategy recognises transport is fundamental to the lives of all Londoners and is at the heart of many of the city's present and future challenges. The central aim of the strategy is to create a future London that is not only home to more people, but is a better place for all of those people to live in. At the heart of this vision is the aim that, by 2041, 80 per cent of Londoners' trips will be made on foot, by cycle or using public transport.
- 2.3.9 The strategy adopts the Healthy Streets Approach which creates streets and routes that encourage walking, cycling and public transport use, reducing car dependency. The vision

"to create 'Healthy Streets' aims to reduce traffic, pollution and noise, create more attractive, accessible and people friendly streets where



everybody can enjoy spending time and being physically active, and ultimately to improve people's health."

2.4 Local Planning Policy

2.4.1 Until the Draft Southwark Plan 2018 is adopted, guidance is provided in the form of the Saved Southwark Plan Policies (2013) and the Southwark Core Strategy (2011) as set out below.

Saved Southwark Plan Policies (2013)

- 2.4.2 This document contains the policies from the Southwark Plan (2007) which have been saved. Although the LBS Core Strategy has already been adopted, the saved policies from the Southwark Plan currently remain a material consideration.
- 2.4.3 Included within the saved policies is Policy 5.1 Locating Developments, which states that developments must be located in areas appropriate to the size and characteristics, including accessibility to public transport and sustainable travel.
- 2.4.4 Policy 5.2 is also saved and notes that planning permission will be granted for developments unless there is an adverse impact on transport networks, adequate provision has not been made for servicing and circulation or there has been no consideration to impacts of development on the Transport for London Road Network (TLRN) or Bus Priority Network.
- 2.4.5 Saved Policy 5.3 states that cycle parking should be convenient, secure and weatherproof. The cycle parking standards provided within the document indicate that a provision of 1 space per 250m² should be provided for A and B1 uses and that a minimum of 2 cycle parking spaces should be provided.
- 2.4.6 Saved Policy 5.6 states that all developments requiring car parking should minimise the number of spaces provided.

Southwark Core Strategy (2011)

2.4.7 LBS adopted its Core Strategy in April 2011. The Strategy sets out the long term plan for the area up to 2026, setting out areas for growth and locations for future developments within the Borough.



2.4.8 Strategic Policy 2 of the LBS Core Strategy relates to sustainable transport. It notes the approach of encouraging walking, cycling and the use of public transport rather than travel by car which will be done through a number of measures including planning places and development with priority for walking and cycling, whilst maximising the use of public transport and minimising car use. The policy also states that planning applications will require a Transport Assessment to show that schemes minimise their impacts, minimise car parking and maximise cycle parking to provide as many sustainable transport options as possible.

Draft New Southwark Plan (2018)

- 2.4.9 The Draft New Southwark Plan (NSP) will be a new borough-wide planning and regeneration strategy up to 2033. The formal consultation on the proposed submission version concluded in February 2018. Once finalised and adopted, the document will set out the aspirations of the borough's distinctive neighbourhoods and will contain sites allocated for development across the borough with requirements on how they should be developed and planning policies for making decisions on planning applications and development proposals.
- 2.4.10 The document proposes revised cycle parking standards as set out in Table 2.3.

Table 2.3 - Draft New Southwark Plan (2018) minimum cycle parking standards

		Cycle parking					
Land use		Long-stay	Short-stay				
B1	Business 1 space per 45 m², Minimum of two spaces		1 space per 250 m ² , Minimum of 2 spaces				
	Food retail 1 space per 175 m², a minimum of two spaces		1 space per 40m ² for first 750 m ² and 1 space per 300 m ² thereafter, minimum of 2 visitor spaces				
A1	1 space per 100 m² for first 1000 m² and 1 space per 1000m² thereafter, a minimum of 2 spaces		1 space per 125 m² for first 1,000 m² and then 1 space per 1,000 m² thereafter, minimum of 1 visitor space				
А3	Cafes & 1 space per 175 m², minimum of 2 space		1 space per 40 m ² , minimum of 2 visitor spaces				



2.5 Summary

2.5.1 The proposed development has been designed to comply with relevant transport policies at national, regional and local levels. The development is proposed to be car-free with the exception of two disabled bays and will provide cycle parking in accordance with TfL's and LBS's requirements. Further details regarding the proposals from a transport perspective are set out in Section 11.



3 EXISTING SITUATION AND ASSESSMENT SCENARIOS

3.1 Introduction

3.1.1 This section provides details of the existing site and sets out the proposed assessment scenarios.

3.2 Existing Site

- 3.2.1 The site is located approximately 50m from London Bridge Underground Station which has an entrance on Borough High Street whilst London Bridge National Rail Station is situated within 200m of the site. It is bounded by St Thomas Street to the north, shops on Borough High Street (the A3) to the west, King's Head Yard to the south and Guy's Hospital buildings to the east.
- 3.2.2 Whilst referred to as the New City Court development, the current site is composed of the following parts:
 - Georgian terraced townhouses at Nos. 4, 6, 8, 12, 14 and 16 St Thomas Street;
 - New City Court office building at No. 20 St Thomas Street; and
 - Keats House at Nos. 24 to 26 St Thomas Street.
- 3.2.3 The existing site currently provides approximately 12,763m² GIA of commercial floor-space and there are currently 900 people employed at the site.
- 3.2.4 A site location plan is included in Figure 1 and a red line boundary plan is provided in Figure 2.

3.3 Existing access and parking

3.3.1 Vehicular and pedestrian access to the site is currently from St Thomas Street (A200) and King's Head Yard. King's Head Yard provides access to the site's car parking area whilst St Thomas Street is used for servicing. There is currently no public open space or a public route through the site.



3.4 Assessment Scenarios

- 3.4.1 The following scenarios have been considered within the assessment:
 - Existing Baseline 2018;
 - Assessment (Future) Baseline 2026: This scenario comprises the Existing Baseline 2018 + committed developments which are currently under construction and are expected to be completed by the Development opening year;
 - Assessment (Future) Baseline 2026 + Development; and
 - Assessment (Future) Baseline 2026 + Development + committed developments: This scenario comprises the Assessment Baseline 2026 + Development + the committed developments which are not expected to be completed by the Development opening year.
- 3.4.2 With regard to the traffic assessment, traffic surveys were undertaken in 2018 for all LBS roads within the assessment area. For the Transport for London Road Network (TLRN) roads, the traffic data has been obtained from TfL. Where the data obtained was from 2017 or earlier, traffic growth has been applied based on the review of the DfT traffic trends over the last 10 years.
- 3.4.3 Table 3.1 summarises the committed schemes which will be included in the above scenarios. The schemes have been grouped into two categories according to where they are/expected to be in the planning/construction process relative to the proposed development.



Table 3.1 - Cumulative Schemes

Under construction and assumed to be completed and operational by proposed development opening year (added to create assessment baseline 2026)

Tower Bridge Magistrates Court and Police Station (15/AP/3303)

175-179 Long Lane (15/AP/4072)

25-29 Harper Road (15/AP/3886)

Isis House, 67-69 Southwark Street

1 Bank End (15/AP/2066)

Fielden House (Shard Place), Street, 28-42 London Bridge (17/AP/4008)

Expected to be completed post 2026 (included as cumulative schemes)

185 Park Street (17/AP/1944)

Capital House 40-46, Weston Street (14/AP/4640)

153-159 Borough High Street (15/AP/4980)

Lavington House, 25 Lavington Street (16/AP/2668)

19-23 Harper Street, 325 Borough High Street and 1-5 and 7-11 Newington Causeway (16/AP/3174)

133 Park Street (16/AP/4569)

Southwark Fire Station, 94 Southwark Bridge Road (17/AP/0367)

1-5 Paris Garden and 16-19 Hatfields (17/AP/4230)

Sampson House, 64 Hopton Street (17/AP/2286)



4 BASELINE CONDITIONS – PEDESTRIANS AND CYCLISTS

4.1.1 This section sets out the pedestrian and cycle facilities in the vicinity of the site and reviews the accessibility of the proposed development by these modes.

4.2 Pedestrian Network and Facilities

- 4.2.1 The site is located in an area with an established network of footways and pedestrian facilities. Due to its central London location, numerous public transport services and amenities can be accessed on foot. Details of the existing pedestrian infrastructure on each of the roads surrounding the site are provided below.
- 4.2.2 The key pedestrian desire lines are expected to be the footways of St Thomas Street and Borough High Street as they will provide access from the site to the nearest facilities for public transport. Another key pedestrian desire line is expected to be between the proposed development and the new London Underground exit proposed to be located adjacent to the development's public square.

St Thomas Street

- 4.2.3 St Thomas Street provides footways on both sides of its carriageway. The width of the footways varies between 2m (near the junction with Borough High Street) to 5m (in the vicinity of London Bridge Station and Weston Street).
- 4.2.4 A signalised pedestrian crossing facility is located on St Thomas Street, near the junction with London Bridge Street and Bedale Street. The crossing is provided with tactile paving on the footways on both sides of the carriageway and zig-zag road markings.
- 4.2.5 Signalised pedestrian crossings are also located at the junction with Borough High Street and outside the entrance to London Bridge Station. Both crossings are provided with tactile paving on the footways on both sides of the carriageway. The footways of St Thomas Street are well lit as they are provided with light columns at regular intervals.

Borough High Street

4.2.6 Borough High Street provides footways on both sides of the carriageway. The footways are generally wide and provide a minimum width of approximately 3m.



- 4.2.7 Signalised pedestrian crossings are located on each arm at the four-arm junction between Borough High Street, St Thomas Street and Bedale Street. Signalised crossings are also provided at the junction between Borough High Street and Southwark Street, at the junction between Borough High Street and London Bridge Street and at the junction between Borough High Street and Duke St Hill.
- 4.2.8 The footways of Borough High Street are well lit as they are provided with light columns at regular intervals.

King's Head Yard and White Hart Yard

- 4.2.9 King's Head Yard is accessible from the south-eastern side of Borough High Street and provides narrow footways (approximately 1m-1.5m wide) on both sides of the carriageway.
- 4.2.10 White Hart Yard is also accessible from the south-eastern side of Borough High Street and offers very limited footway provision. The road is very lightly trafficked and is effectively used as a shared surface with pedestrians utilising the whole width of the yard and having priority over vehicles.

PERS Audit

- 4.2.11 A Pedestrian Environment Review System (PERS) Audit of the existing pedestrian network in the vicinity of the site has been undertaken.
- 4.2.12 It is noted that the local pedestrian environment will be undergoing changes as a result of the proposed development's public realm and TfL's proposals for St Thomas Street. Therefore, the pedestrian environment in the vicinity of the site by the time the proposed scheme is completed and operational will be different to the one currently in place. Notwithstanding this, the PERS audit was requested by TfL and LBS during pre-application discussions. The audit has been undertaken by Transport Research Laboratory (TRL) and is included in Appendix A.
- 4.2.13 The audit shows that at present, a number of links achieve a red rating which indicates a poor level of provision. These include on the southern side of St Thomas Street, on the southern side of Borough High Street outside of the Site, on White Hart Yard and on King's Head Yard. The links have been scored based on several parameters with worst scoring parameters being poor maintenance,



user conflict, colour contract, tactile information and permeability. It is noted that this is the existing situation and the proposed development includes proposals which would improve the existing situation. The proposed new entrance to the London Bridge Underground station directly from the proposed development's new public square means that pedestrian conditions on St Thomas Street and Borough High Street are expected to improve as pedestrians divert through the site.

- In respect of St Thomas Street, this will be subject to improvements as part of TfL's proposals and would be expected to provide good level of pedestrian provision once implemented.
- In respect of King's Head Yard, this will become a largely car-free pedestrian route and will be adjacent to the new public square as part of the development proposals significantly enhancing this link.
- With regard to White Hart Yard, the proposed development is not expected to add any additional pedestrians onto the yard and the pedestrian enhancements and new connection through the site seek to encourage pedestrians to divert from this link. Additionally, the audit assumed that pedestrians are only able to use the limited footway provision on the yards whereas in reality, pedestrians are observed utilising the whole width with the yards which operate as informal shared surfaces.

4.3 Cycle Network and Facilities

- 4.3.1 The site is located in close proximity to established cycle routes which provide access within the Borough and the wider area. Figure 3 shows the available network for cyclists and cycle facilities in the vicinity of the site include Cycle Superhighway 7 (CS7) and National Cycle Network Route 4.
- 4.3.2 Additionally, Weston Street and Bermondsey Street are located to the east of the Site and are identified by TfL on their cycle maps as routes 'signed or marked for use by cyclists on a mixture of quiet or busier roads'. Tooley Street (north to the site) has been labelled in the same way.



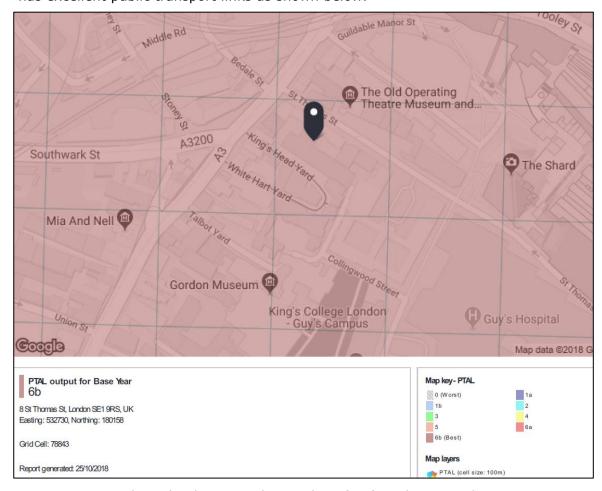
- 4.3.3 Newcomen Street, Snowsfields and Crosby Row are local roads located to the west of the Site which feature on the TfL cycle map as 'quieter roads recommended by other cyclists'.
- 4.3.4 Cycle parking facilities are provided throughout St Thomas Street in the form of Sheffield Stands. A cycle hire docking station is located on Tooley Street, approximately 400m (4-5 minute walk) to the north of the site. The docking station provides access to 20 bicycles.
- 4.3.5 Southwark Bridge Road is located to the west of the site and is part of Cycle Superhighway 7. The superhighway extends by approximately 13.7km (an approximate 45 minute cycle) and connects the City, Southwark, Lambeth, Wandsworth and Merton.
- 4.3.6 Tooley Street forms part of the National Cycle Network Route 4, a long distance route between London and Fishguard via Reading, Bath, Bristol, Newport, Swansea, Carmarthen, Tenby, Haverfordwest and St Davids.
- 4.3.7 Given the above, it can be see that the site is well located to the local cycle network.



5 BASELINE CONDITIONS - PTAL

5.1 Public Transport Accessibility Level (PTAL)

5.1.1 The TfL Planning Information Database (WebCat PTAL assessment tool) identifies the site as having a PTAL of 6b (the highest level). This indicates that the site has excellent public transport links as shown below.



5.1.2 Due to its central London location, the site benefits from being in close proximity to numerous bus routes, London Bridge Underground and National Rail stations. The various public transport services available are discussed in the following sections.



6 BASELINE CONDITIONS – LOCAL BUS SERVICES

6.1.1 This section summarises the bus services available in the vicinity of the site.

6.2 Local Bus Services

- 6.2.1 The local area is served by several bus routes. London Bridge Bus Station is located within a 200m walking distance (2-3 minute walk) to the north of the site and provides access to bus stops 'B', 'C' and 'D'. Bus stop 'B' provides access to routes 521 and N343. Bus stop 'C' provides access to routes 43 and 141. Bus stop 'D' provides access to routes 149, N21 and N343.
- 6.2.2 Bus stops 'S' and 'R' are located on Duke St Hill within a 300m walking distance (3-4 minute walk) to the north of the site. Both bus stops are served by routes 47, 343, 381, N381 and RV1. Bus stop R is also served by route N199.
- 6.2.3 Bus stops 'M' and 'Y' are located on Borough high Street within a 320m walking distance (3-4 minute walk) to the north of the site. Bus stop 'M' is served by routes 17, 21, 35, 40, 43, 47, 48, 133, 141, 149, 344 and N21. Bus stop 'Y' is served by routes 17, 21, 35, 40, 47, 48, 133, N21, N133 and N199.
- 6.2.4 There are two bus stop located outside of The Hop Exchange on Southwark Street within a 250m walking distance (2-3 minute walk) to the west of the site. These bus stops are served by routes 344, 381, N343, N381 and RV1.
- 6.2.5 Bus 'Southwark Street' is located on Borough High Street within a 280m walking distance (2-3 minute walk) to the south-west of the site. The bus stop provides access to routes 21, 35, 40, 133, 343, N21, N133, and N343. Bus stop 'G' is located on Borough High Street within a 400m walking distance (4-5 minute walk) to the south-west of the site and is served by the same bus routes as bus stop 'Southwark Street'.
- 6.2.6 Bus stop 'BD' is located on Southwark Bridge Road within a 580m walking distance (5-7 minute walk) to the west of the site. The bus stop is served by route 344.
- 6.2.7 Table 6.1 presents the bus services which are accessible in close proximity of the site.



Table 6.1 - Summary of local bus services

Bus	Charalla satisas	Stor Location Destination		day – iday		Court de co
Route	Stop Location	Destination	AM Peak	PM Peak	Saturday	Sunday
48	Υ	London Bridge	6	6	6	5
40	М	Walthamstow Bus Station	6	6	6	5
343	S / Southwark Street	New Cross / Jerningham Road	7	7	8	6
	R / G	City Hall	8	8	8	6
21	Y / Southwark Street	Molesworth Street	9	9	8	5
	M/G	Newington Green	9	9	8	5
17	Υ	London Bridge	7	7	6	4
17	М	Archway Station	8	8	6	4
	M / G	Duke's Place	8	8	6	4
40	Y / Southwark Street	Dulwich Library	7	7	6	4
	M / G	Shoreditch	6	6	6	4
35	Y / Southwark Street	Clapham Junction Station / Falcon Road	6	6	6	4
381	S / The Hope Exchange	County Hall	6	6	6	5
201	R / The Hop Exchange	Peckham Bus Station	6	6	6	5
344	M / The Hop Exchange	Appold Street	8	8	6	7
	BD	Clapham Junction Station	8	8	7	7
RV1	R / The Hop Exchange	Tower Gateway Station	4	3	3	3
KVI	S / The Hop Exchange	Covent Garden / Catherine Street	4	3	3	3
	В	London Bridge Station	20	20	-	-
521	В	Waterloo Station / Mepham Street	21	23	-	-
	С	London Bridge Station	8	8	8	5
141	C / M	Tottenhall Road	8	8	7	6
149	London Bridge Station	London Bridge Station	11	9	8	7
149	A / M	Edmonton Green Bus Station	11	9	7	7
	С	London Bridge Station	11	11	9	7
43	C / M	Halliwick Park or Archway Station	11	11	7	6
47	S / M	Shoreditch	6	6	5	3
4/	R / Y	Catford Garage	5	5	5	3
	M / G	Great Winchester Street	11	11	7	4
133	Y / Southwark Street	Streatham Station	11	11	8	4
	To	tal	257	253	182	138



- 6.2.8 Table 6.1 above shows that during the weekday AM and PM peak hours, there are scheduled to be over 250 bus services arriving and departing from the vicinity of the site. A total of 182 and 138 hourly services are provided throughout the day on Saturday and Sunday.
- 6.2.9 The local bus network and the Public Transport access map are shown in Figures 4 and 5 respectively.



7 BASELINE CONDITIONS – LONDON UNDERGROUND SERVICES

7.1.1 This section summarises the London Underground services available from London Bridge Underground Station.

7.2 London Underground Services

7.2.1 The site is located approximately 50m from the Borough High Street entrance to London Bridge Underground Station. The station is served by the Jubilee Line, which provides services towards Stratford and Stanmore and the Bank branch of the Northern Line, which provides services towards High Barnet, Mill Hill East, Edgware and Morden. Table 7.1 shows the peak hour frequencies at London Bridge Underground Station.

Table 7.1 - Services & frequencies from London Bridge Underground Station

		Monday	– Friday			
Service	Direction	08:30- 09:30	17:00- 18:00	Saturday	Sunday	
Jubilee Line	Westbound	30	30	24	24	
	Eastbound	30	30	24	24	
Na while a war I is a a	Northbound	25	23	20	20	
Northern Line	Southbound	23	23	20	20	

- 7.2.2 Table 7.1 indicates that London Bridge Underground Station provides 30 Jubilee Line services and a minimum of 23 Northern Line services in both directions during the weekday AM and PM peak hours. Over Saturday and Sunday, the station provides 24 hourly Jubilee Line and 20 hourly Northern Line services in both directions throughout the day.
- 7.2.3 Planning capacity figures obtained from TfL indicate that each Jubilee Line train has a planning capacity of 960 passengers. Based on the AM Peak frequency of 30 trains per hour per direction there is a planning capacity of 28,800 passenger per hour per direction (pphd) on the Jubilee Line. With regard to the Northern Line, each train is shown to have a planning capacity of 800 passengers and therefore capacity of 20,000 pphd in the northbound direction in the AM peak and 18,400 in the southbound direction. In the PM peak the capacity is 18,400 pphd in each direction.
- 7.2.4 Additionally, it is understood that there are proposals to enhance the capacity of the Jubilee Line and the Northern Line by increasing the peak hour frequencies



to 36 and 30 services per hour respectively although at present there are no confirmed timescales for the implementation of this.



8 BASELINE CONDITIONS – NATIONAL RAIL SERVICES

8.1.1 This section summarises the National Rail services available from London Bridge National Rail Station.

8.2 National Rail Services

- 8.2.1 London Bridge National Rail Station provides services operated by Southern and Southeastern Rail and Thameslink. The station provides services from Charing Cross to southeast London, Kent and East Sussex as well as destinations towards South East England.
- 8.2.2 Table 8.1 presents the peak hour frequencies of National Rail services departing from London Bridge National Rail Station. These include through trains heading north (Thameslink) or terminating / leaving London Charring Cross or Cannon Street as well as the services to the south, to destinations in Sussex, Kent and Surrey.

Table 8.1 - Services & Frequencies from London Bridge National Rail Station

Destination	Monday – Friday				
Destination	08:30-09:30	17:00-18:00			
Bedford and northern destinations	11	13			
Other London Terminating stations	53	29			
Sussex, Kent and Surrey	57	71			
Total	121	113			

8.2.3 As can be seen, there is a high number of services available from London Bridge with 121 and 113 individual trains in both directions during the AM and PM peak hour respectively.



9 BASELINE CONDITIONS - RIVER TAXI SERVICES

9.1.1 This section summarises the River Taxi services available from the London Bridge City Pier.

9.2 River Taxi Services

- 9.2.1 The London Bridge City Pier is located approximately within a 550m walking distance (5-7 minute walk) to the north-east of the site. It is served by routes RB1, RB1X, RB2 and RB6.
- 9.2.2 RB1 and RB1X provide services between Westminster and North Greenwich. RB1 operates daily whereas RB1X provides additional services on the weekend. RB2 operates daily and provides services between Battersea Power Station and London Bridge City. RB6 provides services between Blackfriars to Canary Wharf on weekday mornings and evenings only.
- 9.2.3 The river services during the AM, PM and weekend peak hours are summarised below.

Table 9.1- River Taxi Services

Service	Destination	AM Peak 08:30- 09:30	PM Peak 17:00- 18:00	Saturday	Sunday
	Westminster	3	1	2	2
RB1	North Greenwich	2	3	2	2
	Westminster	-	-	2	2
RB1X	North Greenwich	-	-	2	2
	Battersea Power Station	-	-	2	2
RB2	London Bridge City	-	-	2	2
	Blackfriars	2	3	-	-
RB6	Canary Wharf	3	1	_	-



10 BASELINE CONDITIONS - HIGHWAY NETWORK AND PARKING

10.1 Local Road Network

St Thomas Street

- 10.1.1 St Thomas Street is a TfL Red Route and is marked with double red lines on both sides of the carriageway which restrict stopping at all times. The eastern section of the road only allows for one-way westbound traffic whilst the western section of the road allows for two-way traffic. The road allows for two-way traffic from the vicinity of the junction with Weston Street (approximately 80m to the west of the junction).
- 10.1.2 There are a number of on-street parking facilities located on the western section of the road, near the site's access and in the vicinity of the junction with Borough High Street. At this location, there are marked taxi and 'Pay and Display' bays located on the southern side of the carriageway. The 'Pay and Display' bays have restrictions from Monday to Saturday between 08:00 and 18:30 and allow for a maximum stay of four hours. There is also a loading bay located on the southern side of the carriageway which has a 'No stopping' restriction between 07:00 and 19:00 except between 10:00 and 16:00. During these times, loading is available for a maximum of 20 minutes. The northern side of the carriageway provides bays restricted to authorised vehicles only.

Borough High Street

- 10.1.3 Borough High Street provides a wide carriageway which ranges between 12m and 15m in width. The section of the road in the vicinity of the site is a TfL Red Route and is marked with double red lines on both sides of the carriageway which restrict stopping at all times.
- 10.1.4 There are loading bays provided on Borough high Street, near the access junction with Talbot Yard and King's Head Yard / White Hart Yard. The loading bays have a 'No stopping' restriction between 07:00 and 19:00 except between 13:00 and 16:00 or between 10:00 and 13:00. During these times, loading is available for a maximum of 20 minutes and parking for disabled users is available for up to three hours.



King's Head Yard and White Hart Yard

10.1.5 King's Head Yard and White Hart Yard are marked with single yellow lines on both sides of the carriageway with restrictions from Monday to Saturday between 08:00 and 18:30. A disabled bay is provided at the south-eastern end of White Hart Yard and is available for use only by disabled badge holders.

10.2 Baseline Traffic Flows 2018

10.2.1 Traffic data has been obtained for roads surrounding the site which has been summarised in the Table 10.1 set out below.

Table 10.1- Existing baseline traffic flows (2018)

Link	AM Peak Baseline Flows		PM Peak Baseline Flows		Baseline Daily Flows	
Link	All vehicles	HGVs	All vehicles	HGVs	All vehicles	HGVs
London Bridge to the North of Tooley Street	1,294	276	1,108	236	25,388	4,663
Borough High Street to the south of London Bridge	2,347	673	2,525	572	19,622	3,566
St Thomas Street	258	7	213	4	6,104	567
White Yard Road	4	1	2	1	26	5
Southwark Street to the east of Southwark Bridge Road	413	56	381	34	12,375	1,375
Southwark Street to the west of Southwark Bridge Road	890	87	741	72	14,825	1,447
Southwark Bridge Road	759	134	623	88	14,493	1,768
Marshalsea Road	763	160	755	107	14,311	2,044
Borough Highstreet to the north of Union Road	862	160	837	127	14,326	2,371
Long Lane	683	45	570	38	11390	756
Tower Bridge Road to the south of Druid Lane	1,392	145	1,160	95	23,202	1,909
Tooley Street	537	116	460	100	8,949	1,932

10.3 Assessment Baseline Flows 2026

10.3.1 Given that the Development is not expected to be completed before 2026, the future baseline conditions which are expected to be in place at the year of opening are considered more applicable in terms of assessing the Development's effects. To this end, a future baseline scenario has been created incorporating those committed developments which are currently already under construction and would be expected to be operational by the Development opening year.



10.3.2 Based on the review of the transport reports for each of the committed developments which are expected to be completed by 2026 it has been found that they are reported to result in minor changes to traffic flows across the whole day with no changes in traffic during the AM and PM peak hours. The 2026 assessment baseline flows for the AM and PM peak hour as well as across the whole day are provided in Table 10.2.

Table 10.2 - Assessment baseline traffic flows (2026)

Link	AM Peak Assessment Baseline Flows		PM Peak Assessment Baseline Flows		Assessment Baseline Daily Flows	
	All vehicles	HGVs	All vehicles	HGVs	All vehicles	HGVs
London Bridge to the North of Tooley Street	1,294	276	1,108	236	25,427	4,664
Borough High Street to the south of London Bridge	2,347	673	2,525	572	19,661	3,567
St Thomas Street	258	7	213	4	6,104	567
White Yard Road	4	1	2	1	26	5
Southwark Street to the east of Southwark Bridge Road	413	56	381	34	12,429	1,375
Southwark Street to the west of Southwark Bridge Road	890	87	741	72	14,887	1,447
Southwark Bridge Road	759	134	623	88	14,501	1,768
Marshalsea Road	763	160	755	107	14,319	2,044
Borough Highstreet to the north of Union Road	862	160	837	127	14,361	2,372
Long Lane	683	45	570	38	11,406	756
Tower Bridge Road to the south of Druid Lane	1,392	145	1,160	95	23,202	1,909
Tooley Street	537	116	460	100	8,965	1,934

10.4 Car clubs

- 10.4.1 The nearest 'Car Club Only' bay provided by Zipcar is located on Tooley Street, within a 280m walking distance (3-4 minute walk) to the north-east of the site. The bay provides access to two vehicles. The vehicles available at this location are a Ford Zipcar Logo Focus and a Hyundai Zipcar Logo i30. A second 'Car Club Only' bay operated by Zipcar is located on Weston Street within a 400m walking distance (4-5 minute) to the south-east of the site.
- 10.4.2 Zipcar offer special business accounts to commercial users.



10.5 Collision Data

- 10.5.1 Road traffic collision data has been provided by Transport for London (TfL) and provides an account of all incidents within the local area in the three year period between February 2015 and February 2018. Appendix B of this document shows the study area and the location of the collisions recorded.
- 10.5.2 Table 10.3 presents a summary of the collisions that occurred within the most recent three years.

Table 10.3 - Road collision data for the most recent three years

	Colli	ision Seve		
Year	Slight	Serious	Fatal	Total
February 2015 – February 2016	12	1	0	13
February 2016 – February 2017	5	1	0	6
February 2017 – February 2018	17	2	0	19
Total	34	4	0	38

- 10.5.3 As shown in Table 10.3, there were a total of 38 collisions recorded over the three year period, the majority of which (90%) were classified as slight in severity. Of the casualties involved in the 38 collisions, 12 were pedestrians and 17 were cyclists with remainder being drivers or motorbike riders.
- 10.5.4 It is noted that no collisions were recorded on King's Head Yard and White Hart Yard.
- 10.5.5 The majority of collisions occurred at / near the junctions between Borough High Street and St Thomas Street and between Borough High Street and Bedale Street. A total of 13 collisions took place at or near the junction of Borough High Street with St Thomas Street all of which were slight. Of these collisions, three involved a pedestrian and five involved a cyclist.
- 10.5.6 Of the total number of collisions, 4 (10%) were serious and two of these occurred at the junction of Borough High Street with Southwark Street. The other two serious collisions took place on Borough High Street near its junction with Talbot Yard and near the junction of Union Street.



- 10.5.7 All of the collisions that occurred over the three-year period primarily occurred due to human error. "Failure to look properly", "reckless" behaviour and "poor manoeuvring" were among the main reasons for the collisions occurring. Only one collision was attributed to the conditions of the local highway network although this collision was also attributed to numerous human errors.
- 10.5.8 Overall, it can be concluded that the local area is relatively safe given the very few (4) serious injuries and no fatal collisions over the three year study period.



11 PROPOSED DEVELOPMENT

11.1.1 This section provides details of the proposed development from a transport perspective including the proposed access, parking and servicing arrangements.

11.2 Proposed development description

11.2.1 The proposed development as described in the planning application form is as follows:

'Comprehensive redevelopment of the site to include demolition of existing 1980s office buildings and erection of a 37-storey building (including ground and mezzanine) of a maximum height of 144m (AOD), restoration and refurbishment of existing listed terrace, and redevelopment of Keats House with retention of existing façade to provide a total of 46,374 sqm of Class B1 office floorspace, 765 sqm of Class A1 retail floorspace, 1,139 sqm of Class A3 retail floorspace, 615 sqm of leisure floorspace (Class D2), 719 sqm hub space (Class B1/D2) and a 825 sqm elevated public garden, associated public realm and highways improvements, new station entrance, cycling parking, car parking, servicing, refuse and plant areas, and all ancillary or associated works.'

11.2.2 The proposed ground level and basement level plans prepared by the scheme's architects are provided in Appendix C.

11.3 Proposed land uses

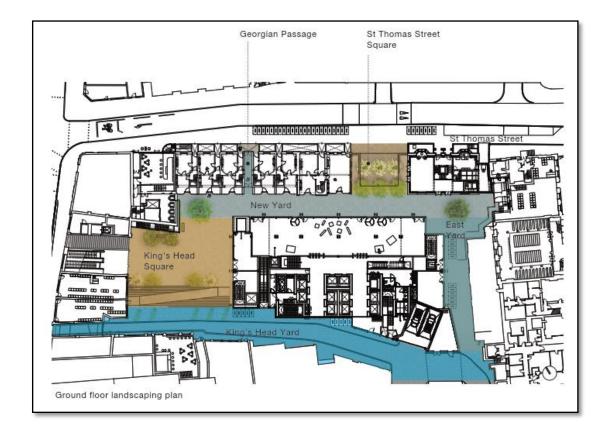
- 11.3.1 The proposal is to redevelop and extend the existing site, to provide the following:
 - 46,374m² Gross Internal Area (GIA) of B1 office, of which 44,906m²
 GIA would be provided in the Tower block with 1,468m² GIA accommodated within Keats House and the Georgian Terrace.
 - 1,904 m² GIA of flexible retail/restaurant Use Class (A1-A3, A5) space of which 1,063m² GIA is included in the Tower block with the remaining 841m² GIA provided within Keats House and the Georgian Terrace.
 - Elevated Public Garden (D2 use) on Level 5 comprising 825m² GIA;



11.3.2 There will also be a gym (Use Class D2) at basement level B1 of the Tower, open to both building users and the public comprising 615m² GIA.

11.4 Pedestrian access and public realm improvements

11.4.1 The pedestrian realm will be improved throughout, with increased permeability between King's Head Yard and St Thomas Street. The public realm within the development comprises a variety of new spaces including squares, passages and yards as illustrated below.



- 11.4.2 The main Tower will have a pedestrian entrance from New Yard which is one of the two yards created by the public realm proposals within the site. The Yard will be for pedestrian use only and will link with St Thomas Street through the proposed St Thomas Square.
- 11.4.3 Permeability will be further enhanced through opening up of the original passage through the Georgian Terrace linking the site with St Thomas Street.
- 11.4.4 Outside of the site's red line boundary there is a proposal to open up the rear of the London Bridge Underground station building at ground level to provide a new exit directly into the site's largest public space (King's Head Square). This is



- supported by TfL and London Underground. The applicant would enter into a development agreement with London Underground to undertake this works.
- 11.4.5 As part of the development proposals King's Head Yard will also be improved to offer a better pedestrian environment. The yard will operate predominantly as a car-free area given the very low vehicle movements on this road. In order to maintain the very low traffic flows and ensure that the route is as attractive to pedestrians as possible, the development's service yard will be accessed from White Hart Yard only.

11.5 Vehicular access

- 11.5.1 Cars and Light Goods Vehicles (LGVs) will access the basement service area and car park via vehicle lifts provided on White Hart Yard. Two vehicle lifts will be provided, one for entering and one for exiting vehicles. The lifts have been positioned at the widest part of the yard to enable vehicles to undertake all the required manoeuvres when entering/exiting the site as indicated in Appendix D. Sufficient visibility has been provided between exiting vehicles and vehicles and pedestrians on King's Head Yard. This is shown in Drawing 048 rev B in Appendix D.
- 11.5.2 Larger vehicles including refuse collection vehicles will be able to access a ground level delivery and waste management area adjacent to Keats House from a relocated on-street loading bay on St Thomas Street. Vehicles will approach along St Thomas Street from the east. This is discussed in greater detail in the Delivery Service and Waste Management Plan (DSWP).
- 11.5.3 Motorcycles and couriers will be able to stop on St Thomas Street.

11.6 Car parking

11.6.1 The development is proposed to be car-free with the exception of two accessible parking bays at basement level for the use of blue badge holders. This has been agreed as an acceptable level by LBS. The basement level parking will be accessible via White Hart Yard.

11.7 Cycle parking

11.7.1 Facilities for cyclists are divided into long stay and short stay across the various users types on site, as per LBS and TfL's policies. Seventy showers and over 400 lockers are also provided and located within easy reach of the cycle parking.



- 11.7.2 Cycle parking spaces and associated shower and locker provisions have been allocated across ground level and Basement Level 1. Short stay Sheffield stand parking has been provided at ground level and a mixture of double stacking racks, Sheffield stands and folding bike lockers are proposed at Basement Level 1 in secure access zones.
- 11.7.3 Access to the basement for cyclists with bikes is provided from King's Head Yard via a combined cycle stair ramp with a special conveyor system to assist. This is wide enough to allow two people to pass on the stair. A dedicated shuttle lift allows cyclists to return to reception once bikes have been stored.
- 11.7.4 There are a number of different cycle parking standards that apply to the proposed development including the currently adopted London Plan, the Draft New London Plan and LBS's forthcoming standards set out in the LBS Draft New Local Plan. Having reviewed the different standards, the most onerous requirement is to meet the Draft New Southwark Plan, whose requirements are summarised in Table 11.1 below.

Table 11.1- Cycle parking requirements

Land Use	Draft New So	outhwark Plan
Land Use	Long Stay	Short Stay
B1 office	1013	182
A1 Retail (non-food)	1	5
A1 Retail food	1	12
A3 Café/ Restaurant	8	68
<u>Gym (D2)</u>	2	6
<u>Hub (D2)</u>	2	7
Public Garden (D2)	2	9
Total	1029	289

11.7.5 The proposed development will provide a total of 1,031 long stay cycle parking spaces and 291 short stay spaces, thereby according with the above standards.

11.8 Alterations to public highway

11.8.1 TfL have consulted on proposals to manage the directions of vehicles along St Thomas Street. This includes an original scheme to make St Thomas Street one way westbound along its entire length. This is in keeping with the western end which is already one way.



- 11.8.2 Due to time constraints TfL are currently proposing an interim solution whereby the western end of the road remains two-way but with a 7.5 ton restriction i.e. taxis will be able to access from Borough High Street but delivery vehicles will not.
- 11.8.3 We understand that it is still TfL's aspiration to make the road one way and therefore the development proposal includes kerb build-outs, narrowing the carriageway and off-carriageway cycle racks, loading and parking bays as part of the scheme's public realm improvements. This, along with the existing highway arrangement, is shown in Appendix E.
- 11.8.4 Notwithstanding this the scheme could operate successfully without the one way operation if TfL decide not to progress with this idea.

11.9 Waste storage and collection arrangement

- 11.9.1 With regard to refuse, the strategy is that waste will be stored in 1,280l Eurobins at basement level with separate containers provided for the various waste streams (general/recyclables). The arrangement would be for the on-site management to transport the relevant waste stream to a ground level storage room via a bin lift on collection day. The storage room will be located at ground level fronting St Thomas Street where an on-street loading bay is located allowing a refuse vehicle to stop within 10m of the waste storage room, as required by LBS.
- 11.9.2 Waste would be collected by private contractors daily for each of the waste streams based on a 5 day week. A cardboard baler is also proposed given that paper is expected to make up the majority of the office recyclable waste.
- 11.9.3 It is envisaged that waste would be collected early morning to avoid highway peak periods.

11.10 Servicing

11.10.1 The proposed arrangement is for servicing is to take place primarily from the development's service yard away from the public highway. The service yard is proposed at basement level B2 accessed via two vehicle lifts from White Hart Yard. Two vehicles lifts will be provided, one for entering and one for exiting vehicles. Three loading bays are proposed within the development's service area.



- 11.10.2 Given the existing access restrictions on White Hart Yard, the proposed arrangement will allow for cars and LGVs to access the site in this manner. This is with the exception of the office accommodation provided within Keats House and the Georgian Terrace which will be serviced from St Thomas Street.
- 11.10.3 Servicing in heavy goods vehicles will take place on St Thomas Street from a relocated loading bay. A dedicated goods lift will be provided within the site on the St Thomas Street frontage to allow for transfer of goods from the loading bay.
- 11.10.4 Motorcycle couriers will also stop on St Thomas Street to deliver/collect packages from the development.
- 11.10.5 A Delivery, Servicing and Waste Management Plan has been prepared for the development which provides further details on the proposed arrangement and management of deliveries to the various elements of the proposed scheme.

11.11 Swept path analysis drawings

11.11.1 Swept path analysis has been undertaken for the proposed access and servicing arrangement consisting of the followings drawings in Appendix F:

Development's service yard and access

- Drawing 30848/AC/059: Swept path analysis of a 4.6t transit van accessing and egressing vehicle lifts;
- Drawings 30848/AC/043 45: Swept path analysis of a 4.6t transit van accessing and egressing the loading bays at basement level.
- Drawings 30848/AC/046 47: Swept path analysis of a large car accessing and egressing the disabled parking bays at basement level.

St Thomas Street tracking

- Drawing 30848/AC/055: Swept path analysis of 10.5m long refuse vehicle accessing and egressing the on-street loading bay.
- Drawing 30848/AC/056: Swept path analysis of a 9m long refuse vehicle accessing and egressing the on-street loading bay.



 Drawing 30848/AC/057: Swept path analysis of a 10m long delivery vehicle accessing and egressing the on-street loading bay.

Drawing 30848/AC/058: Swept path analysis of an 8m long delivery vehicle accessing and egressing the on-street loading bay.

Road Safety Audit

- 11.11.2 As part of the review into the impact of the servicing proposals on the local highway network a Stage 1 Road Safety Audit was commissioned. The finding of this audit and TPP's designer's response is included within the DSWMP.
- 11.11.3 It should be noted that following a meeting with LBS, where the findings of the audit and the response were discussed, it was also agreed that the developer would contribute to further improvements on White Hart Yard and King's Head Yard to help control / reduce vehicle speeds if required.
- 11.11.4 Whilst the scheme has been further refined there have been no material alterations that would affect the findings of the RSA or the designer's response.



12 TRIP GENERATION AND MODE SHARE

12.1.1 This section sets out a trip generation assessment for the proposed and existing development. A net change in trips has also been provided.

12.2 Proposed B1 office trip generation

TRICS assessment

12.2.1 In the first instances, the industry standard TRICS (Trip Rate Information Computer System) database has been reviewed for comparable office sites within central London. Table 12.1 shows three sites which have been selected based on their central London locations and excellent public transport accessibility.

Table 12.1 - Selected office sites from TRICS

TRICS Site	RICS Site Location		PTAL
CI-02-A-02	City of London	9,803m ²	6b
CN-02-A-02	Camden	6,056m ²	6b
SK-02-A-01	Southwark	17,187m²	6b

12.2.2 The sites have been used to obtain average persons' trip rates per 100m² which have then been applied to the proposed B1 office space (46,374m² GIA). The results of this assessment for the AM and PM peak hour are shown in Table 12.2.

Table 12.2- Person trip rates and trips for B1 Office based on TRICS

	AM Pea	ık (08:30 –	09:30)	PM Peak (17:00 - 18:00)			
	In	Out	Total	In	Out	Total	
Person Trip Rates per 100m ² GIA	1.465	0.073	1.538	0.182	1.646	1.828	
Person Trips per 46,374m ² GIA	679	34	713	84	763	847	

12.2.3 The TRICS assessment indicates that the number of persons trips to the proposed development could be in the region of 713 two-way trips in the AM peak and 847 trips in the PM peak. Compared to the expected occupancy levels of the proposed development, these figure appear low. Therefore, as a check, a first principles assessment has been undertaken.



First principles trip assessment

12.2.4 The maximum capacity of the proposed office space has been calculated as 3,818 employees based on the occupation density of 1 employee per 8m² Net Internal Area (NIA). It would be reasonable to assume that 85% of employees would be in the office on any given day taking account of absenteeism/ working from home etc. and of those in the office 45% would arrive during the morning peak hour. On this basis, the number of people expected to arrive during the morning peak hour is calculated as 1,460 people. When compared to the TRICS trip generation, it can be seen that the TRICS assessment indicates a significantly lower trip generation. This could be due to the proposed development being more efficient in terms of the usable office space compared to the TRICS sites which are older developments. As such, it is proposed to use the first principles assessment as the basis of the trip generation analysis which shows a higher but a more realistic number of trips. This has been complemented by the TRICS data to establish the likely arrival/departure profile at the development. The resultant peak hour trip generation for all modes is provided in Table 12.3.

Table 12.3 – Proposed development office trip generation (persons trips)

Time	In	Out	Total
08:30 - 09:00	718	29	746
09:00 - 09:30	742	58	800
08:30 - 09:30	1,459 (2.895 per 100m ² GIA)	87 (0.173 per 100m ² GIA)	1,546 (3.067 per 100m ² GIA)
17:00 - 17:30	80	715	795
17:30 - 18:00	66	608	674
17:00 - 18:00	146 (0.289 per 100m ² GIA)	1,323 (2.625 per 100m ² GIA)	1,469 (2.915 per 100m ² GIA)

12.2.5 Based on the above assessment, the proposed number of total person trips to the proposed office is expected to be 1,546 in the AM peak and 1,469 trips in the PM peak hour.

Modal split

12.2.6 The above persons trips have been distributed by mode using the 2011 Census 'Workday Population' data for the Southwark 002 Middle Layer Super Output Area, where the site is located. It is noted that the proposed office does not provide any on-site car parking other than 2 disabled bays. With this in mind and given the local on-street parking restrictions, the proposed office modal split has



been adjusted to exclude car trips with the surplus distributed proportionally across the other modes. The results are provided in Table 12.4 which shows that 97.5% are expected to be undertaken by sustainable trips. The remaining 2.5% would be made by other modes including taxi, motorcycles and as a passenger in a car. This is in line with the future travel pattern assumptions to and from central London as set out within the Mayors' Transport Strategy.

Table 12.4- Proposed B1 modal split (main mode)

	Mode	Mode	AM Pea	k (08:30	-09:30)	PM Pea	ak (17:00-	18:00)
	моце	Split %	In	Out	Total	In	Out	Total
0)	Underground	28.2%	412	25	437	42	373	415
able	Train	48.4%	707	42	749	71	641	712
äi	Bus	10.2%	149	9	158	15	135	150
Sustainable	Bicycle	5.6%	82	5	87	8	74	82
0,	On foot	5.1%	74	5	79	7	68	75
	Sub-total	97.5%	1,424	86	1,510	143	1,291	1,434
	Car	0.0%	0	0	0	0	0	0
es	Taxi (Persons)	0.2%	3	0	3	0	3	3
lod	Motorcycle	1.5%	22	1	23	2	20	22
Other Modes	Passenger in a car	0.4%	6	0	6	1	5	6
ō	Other	0.3%	4	0	4	0	4	4
	Sub-total	2.5%	35	1	36	3	32	35
G	rand Total	<u>100.0%</u>	<u>1,459</u>	<u>87</u>	<u>1,546</u>	<u>146</u>	1,323	<u>1,469</u>

Adjustment to Underground trips

12.2.7 It is noted that approximately 48% of trips are expected to use rail as their main mode of transport. It is reasonable to assume that not all rail trips will be to/from London Bridge given that employees could be travelling from various locations across London, the South-East and potentially even further away. Therefore, some of the rail trips will use the Underground to get to London Bridge having used one of the other railway stations in London as the main mode. Based on the analysis of the 2011 Census 'Location of usual residence and place of work by method of travel to work' data it has been found that approximately 26% of the rail trips would terminate at stations other than London Bridge and therefore, 26% of these rail trips have been added onto the number of Underground trips. The adjusted Underground trips are shown in Table 12.5 below.



Table 12.5 - Adjusted Underground trips

Mode		AM Peak		PM Peak		
Mode	In	Out	Total	In	Out	Total
Underground	412	25	437	42	373	415
Underground having used train as main mode to station other than London Bridge	184	11	195	18	167	185
Total Underground	596	36	632	60	540	600

12.3 Existing B1 Office trip generation

12.3.1 It is noted that the existing development already provides approximately 12,763m² GIA of B1 office space. It would therefore be appropriate to offset the proposed number of trips against the existing trip generation to allow for a net change assessment to be calculated. The existing trip generation has been calculated on the same basis as the proposed assessment and is set out in Table 12.6 for the AM and PM peak hour.

Table 12.6- Existing office persons trips

	AM Peak (08:30-09:30)			PM Peak (17:00-18:00)			
	In	Out	Total	In	Out	Total	
Person Trip Rates per 100m ² GIA	2.895	0.173	3.067	0.289	2.625	2.915	
Person Trips per 12,763m ² GIA	460	27	487	46	417	463	

12.3.2 Similar to the proposed development, the existing trips have been distributed using the local Census travel to work data. Adjustments have also been made to the car driver mode to account for a small amount of car parking provision at the existing site. The existing trip generation by mode is set out in Table 12.7.



Table 12.7 - Existing B1 modal split (main mode)

	Mode	Mode	AM Pea	k (08:30	-09:30)	PM Pea	ak (17:00-	18:00)
	моае	Split %	In	Out	Total	In	Out	Total
a)	Underground	27.6%	114	7	121	12	103	115
able	Train	47.2%	195	12	207	20	177	197
ain	Bus	10.0%	41	3	44	4	37	41
Sustainable	Bicycle	5.6%	23	1	24	2	21	23
0)	On foot	4.8%	21	1	22	2	19	21
	Sub-total	95.20%	394	24	418	40	357	397
	Car	1.9%	5	0	5	0	5	5
es	Taxi (Persons)	0.4%	1	0	1	0	1	1
Modes	Motorcycle	1.6%	6	0	6	1	5	6
Other N	Passenger in a car	0.4%	2	0	2	0	2	2
ō	Other	0.4%	1	0	1	0	1	1
	Sub-total	4.80%	15	0	15	1	14	15
<u>G</u>	rand Total	<u>100%</u>	<u>409</u>	<u>24</u>	<u>433</u>	<u>41</u>	<u>371</u>	<u>412</u>

Adjustment to Underground trips

12.3.3 As with the proposed development, an adjustment has been made to the Underground trips to account for employees using the Underground having used one of the train stations (other than London Bridge) as the main mode. This is shown in Table 12.8 below.

Table 12.8 - Adjusted Underground trips

Mode		AM Peak		PM Peak		
Mode	In	Out	Total	In	Out	Total
Underground	114	7	121	12	103	115
Underground having used train as main mode to stations other than London Bridge	51	3	54	5	46	51
Total Underground	165	10	175	17	149	166

12.4 Net change in trips: B1 office use

12.4.1 By comparing the existing and proposed office trip generation, the net change in trips per mode is presented in Table 12.9.



Table 12.9 - Net change in trips: B1 office use

	Mode	AM Pea	ık (08:30-	09:30)	PM Peak (17:00-18:00)		
	моде	In	Out	Total	In	Out	Total
	Underground	298	18	316	30	270	300
Sustainable	Underground having used train as main mode	133	8	141	13	121	134
tair	Train	512	30	542	51	464	515
sns	Bus	108	6	114	11	98	109
07	Bicycle	59	4	63	6	53	59
	On foot	53	4	57	5	49	54
	Car	-5	0	-5	0	-5	-5
es	Taxi (Persons)	2	0	2	0	2	2
Jod	Motorcycle	16	1	17	1	15	16
Other Modes	Passenger in a car	4	0	4	1	3	4
ð	Other	3	0	3	0	3	3
	<u>Total</u>	1,183	71	1,254	118	1,073	1,191

12.4.2 It can be seen that the proposed office development is expected to result in an additional 1,254 two-way trips in the AM peak and 1,191 two-way trips in the PM peak hour. It is also noted that a small reduction is expected in car trips given the removal of general car parking as part of the proposed development which will only provide 2 disabled bays.

12.5 A1 / A3 Trip Generation

- 12.5.1 It is assumed that trips to the proposed A1 and A3 uses will be pass-by or linked trips and that they will not generate additional movements on the transport infrastructure. This is with the exception of staff travel although the employment arrangements would be organised in shifts outside of the peak times as is typical for A1/A3 uses.
- 12.5.2 The likely number of taxi trips to the proposed A1/A3 uses has been established based on servicing surveys undertaken at existing retail and restaurant uses along Notting Hill Gate. The units surveyed comprise 2,790m² GIA which is similar to that proposed at the development. Additionally, similar to the proposed development, the uses are a mixture of food and non-food retail including coffee shops and restaurants. Based on the assessment of this comparable site, the proposed number of taxi trips to the proposed A1/A3 uses are set out in Table 12.10.



Table 12.10- Proposed taxi movements to A1/A3 uses

	P	M Peal	(PM Pea	k		Daily	
Mode	In	Out	Total	In	Out	Total	In	Out	Total
Taxi Vehicles	0	0	0	1	1	2	12	12	24

12.6 Proposed public garden and gym uses

- 12.6.1 It is noted that the proposed development also includes a public garden and a gym for the use of both the on-site employees and the wider public. There is no general car parking proposed on-site and therefore any trips associated with the above uses would be by sustainable modes. Furthermore, it is considered that these uses will mainly generate pass-by or linked trips. With regard to the gym, given its central location, any users would be expected to access the gym as part of a trip that they would be making anyway (e.g. on the way to/from work). The level of primary trips to the gym i.e. whereby the gym is the only purpose a trip is made would be very low and outside of the peak hours.
- 12.6.2 Similarly, anyone visiting the public garden that is not based at the site already would be expected to do so as part of a linked trip. The garden is expected to attract people who would be present in the area anyway. It is acknowledged that a proportion of trips to the public garden would be trips whose sole purpose is the garden itself although these would not be expected to be undertaken during the peak hours given the leisure nature of the facility.



13 SERVICING TRIP GENERATION

13.1 Existing development

13.1.1 It is noted that the existing development provides approximately 12,763m² GIA of B1 office space and attracts servicing trips already. A servicing survey has been undertaken of the existing development recording the number and type of vehicles. The survey found that servicing takes place from St Thomas Street from the loading and pay & display bays. The results are provided in Table 13.1.

Table 13.1 - Existing servicing movements

Time	LGV	HGV	M/C	Total
05:00 - 06:00	1	1	0	2
09:00 - 10:00	0	0	2	2
12:00 - 13:00	1	0	0	1
13:00 - 14:00	1	0	0	1
14:00 - 15:00	0	1	0	1
15:00 - 16:00	2	0	0	2
Total daily	5	2	2	9

13.2 Proposed development

B1 office use

- 13.2.1 For the proposed office development, servicing vehicle generation has been established based on an independent servicing survey undertaken at an existing office development in Southwark. This was done following a review of the TRICS database when it was found that there is no servicing data for office developments within central London.
- 13.2.2 The development surveyed is the 240 Blackfriars Road office development located in a highly accessible location within LBS. The site was completed in 2014 and provides 29,823m² of Gross External Area (GEA) most of which is made up of office accommodation with 620m² GEA of food and drink uses. As such, the site is expected to closely match the proposed development and therefore represent a reasonable basis for assessing the proposed servicing trip generation. Based on the survey, the daily servicing trip rate equated to 0.192 vehicles per 100m² GEA on average.



- 13.2.3 Whilst the Gross External Area (GEA) of the proposed development has been further refined as the scheme has developed, for the purposes of the servicing trip generation the GIAs were factored up by between an additional 5% (for the Tower including servicing and plant) and 10% (for Keats House and the Georgian Terrace) to provide GEAs. This enabled us to carry out the assessment before the final GEA figures were available, but in the knowledge that our assessment would be robust as the assessed GEAs would be higher than the actual GEAs:

 The development GEAs used in the assessment are 52,353m² of office and 2,774m² of retail; and the GEAs that have been measured by AHMM for the proposed development are less for both uses.
- 13.2.4 It is noted that the 240 Blackfriars development provides primarily office use with a small amount of food and drink retail use meaning that the servicing survey would have captured deliveries to this element as well. Grossing up the 240 Blackfriars areas to take into account the increased quantum of area for the new development results in 1,058m² of retail use already being accounted for within the grossed up 240 Blackfriars results. As there is 2,774m² GEA of retail being proposed in total at New City Court, of which 1,058m² has already been assessed, this leaves 1,716m² of retail to be assessed separately. This has been assessed using the local shop category within the TRICS database. This assessment is set out in more detail in the Delivery, Servicing and Waste Management Plan submitted as part of this application. A summary of the daily movements per vehicle type is set out in Table 13.2.

Table 13.2 - Servicing trips generated by the redevelopment of New City Court

Land Use	Cars and LGVs	HGVs	Motorbikes
52,353m ² Office + 1,058m ² retail	63	18	20
Remaining 1,716m ² retail	15	4	5
Total	78	22	25

Servicing locations

White Hart Yard

13.2.5 It is proposed that all deliveries made by cars and LGVs will take place from the proposed development's basement where 3 loading bays are proposed. This is with the exception of deliveries to the proposed office accommodation within



Keats House and the Georgian Terrace and these are envisaged to stop on St Thomas Street.

13.2.6 The site's service yard will be accessed via White Hart Yard with no vehicles permitted to use King's Head Yard. In order to minimise the impact of the additional vehicles on White Hart Yard, a management strategy will be implemented at the development requiring all regular deliveries to be prebooked. Given that development will have management presence 24 hours, a proportion of deliveries will be scheduled overnight between 12am – 6am. To further minimise the impact of the servicing activity, only 2 delivery slots will be made available between 08:00 – 09:00 and 17:00 – 18:00. The proposed number of deliveries per hour to the site's service yard is set out in Table 13.3.

Table 13.3 - Expected servicing vehicle arrivals at the development's service yard

Time	Arrival Profile	No. of LGVs and Cars
12am – 6am	10.0%	8
05:00 - 06:00	6.2%	5
06:00 - 07:00	8.2%	6
07:00 - 08:00	4.8%	4
08:00 - 09:00	3.2%	2
09:00 - 10:00	3.2%	2
10:00 - 11:00	9.6%	8
11:00 - 12:00	10.3%	8
12:00 - 13:00	4.1%	2
13:00 - 14:00	8.9%	6
14:00 - 15:00	7.6%	7
15:00 - 16:00	11.0%	8
16:00 - 17:00	3.2%	3
17:00 - 18:00	3.2%	2
18:00 - 19:00	4.8%	4
After 18:00	1.4%	1
Total	100.0%	76

13.2.7 The above assessment shows that the maximum number of vehicles arriving in a single hour would be 8 vehicles.

St Thomas Street

13.2.8 The proposed arrangement is for servicing in Heavy Goods Vehicles (HGVs) to take place from St Thomas Street from a relocated on-street loading bay outside



of the site. It is also envisaged that deliveries to the office accommodation within Keats House and Georgian Terrace will also be from St Thomas Street as will be the motorcycle courier deliveries. It is noted that servicing already takes place from St Thomas Street to the existing development and since it will be replaced by the proposed scheme, it is appropriate to undertake a net change assessment. The net additional servicing vehicles on St Thomas Street are set out in Table 13.4. As with the LGVs deliveries, it is proposed to manage all regular HGV deliveries as part of the DSWMP with an element of night-time servicing. The proposed arrival profile takes into account the peak period restrictions within the loading bay.

Table 13.4 - Expected servicing vehicle arrivals on St Thomas Street

Time	Arrival Profile	LGVs and Cars	HGVs	Motorbikes
12am – 6am	10.0%	0	2	0
05:00 - 06:00	8.3%	-1	0	1
06:00 - 07:00	11.0%	0	2	2
07:00 - 08:00	0.0%	0	0	2
08:00 - 09:00	0.0%	0	0	2
09:00 - 10:00	0.0%	0	0	0
10:00 - 11:00	12.9%	1	4	2
11:00 - 12:00	13.8%	1	3	2
12:00 - 13:00	5.5%	-1	2	1
13:00 - 14:00	11.9%	-1	2	2
14:00 - 15:00	10.1%	0	1	2
15:00 - 16:00	14.7%	-1	4	2
16:00 - 17:00	0.0%	0	0	1
17:00 - 18:00	0.0%	0	0	3
18:00 - 19:00	0.0%	0	0	1
After 18:00	1.8%	0	0	0
Total	100.0%	-2	20	23

13.2.9 The assessment in Table 13.4 shows that the proposed development would add 20 extra HGVs and 23 motorcycle across the whole day. Regarding LGVs, there would overall be a decrease on St Thomas Street given that all existing LGVs are at the present on St Thomas Street but in the future scenario they will be on White Hart Yard with the exception of the office accommodation within Keats House and the Georgian Terrace.



14 IMPACT ASSESSMENT – PEDESTRIANS AND CYCLISTS

14.1.1 This section sets out the number of walking and cycling trips generated by the development, their expected impact and if there is any additional mitigation required for these trips.

14.2 Impact of walking trips

14.2.1 The total two-way pedestrian trips to and from the proposed development are calculated to be 1,032 and 981 in the AM and PM peak hours respectively. These include walking trips between the site and transport access points such as to/from the local bus stops and Underground/train station with the remainder being undertaken solely on foot. The breakdown of the pedestrian trips associated with the development is set out below in Table 14.1.

Table 14.1 - Proposed development walking trips

Mode	AM Peak			PM Peak			
Mode	In	Out	Total	In	Out	Total	
Walking to/from Underground	298	18	316	30	270	300	
Walking to/from Underground (having used train as main mode)	133	8	141	13	121	134	
Walking to/from London Bridge Station*	379	22	401	38	343	381	
Walking to from bus stops	108	6	114	11	98	109	
Walking to from Other (River Taxi)	3	0	3	0	3	3	
Solely on Foot	53	4	57	5	49	54	
Total	974	58	1,032	97	884	981	

^{*}Trips to other railway stations excluded from walking trips as they would use the Underground to get to/from London Bridge and are already accounted for in the table.

14.2.2 The walking trips would be dissipated across the existing network and the main pedestrian desire lines are anticipated to be to/from the London Bridge Underground and National Rail Station and to local bus stops on Borough High Street and St Thomas Street. Nearly 45% of the walking trips are predicted to be between the site and the Underground station. The nearest entrance to London Bridge Underground Station is adjacent to the site on Borough High Street and as such these trips will be contained within the immediate vicinity of the development minimising impacts on the local highway network. Furthermore, there are proposals to provide a new entrance to the Underground station directly from the development's public square. With the new entrance in place,



the proposed development walking trips associated with the Underground access would be contained within the Site's boundary and would have no impact on the pedestrian network.

14.2.3 It is noted that approximately 39% of walking trips would be between the Site and London Bridge National Rail station. The development will have a pedestrian entrance directly off St Thomas Street approximately 100m to the west of London Bridge Street which provides access to the station either via the retail arcade or the escalators adjacent to the Shard. The only walking trips that would be expected to be undertaken over a wider pedestrian network are those being made solely on foot which only account for approximately 6% of all walking trips. Pedestrian trips to and from the bus stops would be on the local pedestrian network.

14.3 Mitigation of walking trips

- 14.3.1 The existing and proposed infrastructure is considered sufficient to meet the additional pedestrian and demand and bring benefits to the local area.
- 14.3.2 The development will have a positive impact on the public realm and provide high quality connectivity through new public routes and a new public square. The new public areas will be kept well maintained and will benefit from natural/passive surveillance provided by the office lobby and entrances from the retail/restaurant entrances. This will enhance the perceptions of public safety by increasing the quality of the public realm.

14.4 Impact of cycling trips

14.4.1 As shown in the trip generation, the development is expected to generate 63 and 59 cycle trips respectively in the AM and PM peak hour.

14.5 Mitigation of cycling trips

14.5.1 The proposed long-stay cycle parking at the site will more than meet the operational demand. Additionally, cycle stands will be provided within the public realm for the use of the visitors/customers and the general public. With this in mind and given the number of cycle trips proposed no other mitigation measures are considered necessary.



14.6 Cumulative Assessment

- 14.6.1 Each of the committed developments would generate their individual number of walking and cycling trips, but similar to the proposed development, they would be required to deliver schemes of high environmental and design quality, improved public realm and sufficient cycle parking provision for occupants and visitors in accordance with LBS and TfL requirements.
- 14.6.2 Some of the pedestrian links in the vicinity of the Site are forecast to have poor pedestrian comfort as a result of additional developments in the area with Borough High Street predicted to experience very uncomfortable conditions (do nothing 2031 future baseline scenario) as set out in the Space Syntax report submitted as part of this planning application.
- 14.6.3 The additional permeability and the improved public realm as part of the Development significantly improves the pedestrian comfort around the site and takes away pressure off Borough High Street.
- 14.6.4 Additionally, walking and cycling trips generated by the cumulative assessment schemes would not all be focused on an isolated route and will be widely dissipated across the existing and proposed pedestrian and cycle network resulting in a negligible impact on the local pedestrian and cycle network.



15 IMPACT ASSESSMENT – BUSES

15.1 Introduction

15.1.1 This chapter sets out the number of bus trips generated by the development and the expected impact and assesses any suitable mitigation of these trips.

15.2 Bus Trips

15.2.1 The proposed development is expected to generate 114 and 109 dedicated bus trips in the AM and PM peak hours respectively.

15.3 Impact of Bus Trips

15.3.1 Based on an average bus operational capacity of 63 persons and a weekday AM and PM peak bus frequency of 128 buses in each direction, the planning bus capacity has been calculated as 8,064 passengers per direction per hour. On this basis, the effect of the additional bus trips associated with the Development on the bus network is set out in Table 15.1.

Table 15.1 - Bus Network Impact Assessment

Time and direction		Bus trips	Bus network capacity (hr)	% of bus network capacity
AM Dook In		108	8,064	1.34%
AM Peak	Out	6	8,064	0.07%
PM Peak	In	11	8,064	0.14%
PM Peak	Out	98	8,064	1.22%

15.3.2 Table 15.1 shows that the greatest impact on the bus network as a result of the Development would be 1.34% which would occur as a result of the arrival trips in the AM peak and equates to approximately on average one additional person per bus. This level of increase in passengers is considered insignificant on the existing bus users.

15.4 Mitigation of Bus Trips

15.4.1 The level of bus trips is not expected to have a significantly adverse impact on the bus network. However, TfL is expected to require contributions towards improving bus services / frequencies as part of the proposed development to accommodate the additional patronage predicted when combined with the overall cumulative developments within the area. This could be secured through a financial contribution to bus services.



15.5 Cumulative Assessment

15.5.1 In consideration of cumulative developments, each of the other cumulative schemes will be expected to have provided appropriate funding towards bus service and frequency enhancements to mitigate their own impacts.



16 IMPACT ASSESSMENT - LONDON UNDERGROUND

16.1 Introduction

16.1.1 This section sets out the number of Underground trips generated by the development and the expected impact and mitigation of these trips.

16.2 Underground trips

- 16.2.1 The proposed development is predicted to generate 316 and 300 two-way London Underground person trips during the AM and PM peak hour respectively. As explained in the trip generation section, some of the development rail trips are expected to use the Underground to get to London Bridge having used one of the other railway stations in London as the main mode. Based on the analysis of the 2011 Census "Location of usual residence and place of work by method of travel to work" it has been found that about 26% of rail trips would terminate at stations other than London Bridge and therefore, 26% of these rail have been added onto the number of Underground trips (161 and 153 in the AM and PM peak hour respectively). As a result, the total number of Underground trips is 457 and 434 two-way trips in the AM and PM peak hour respectively.
- 16.2.2 London Bridge Underground station is served by the Jubilee Line and the Bank branch of the Northern Line and thus the Underground trips will be split between these services. The 2011 Census data: Special Workplace Statistics (SWS), which provides travel to work data, has been used to determine the direction employees will be travelling to and from and which Underground services is most appropriate. The split of the Underground trips is displayed in Table 16.1.

Table 16.1 - Split of Underground Trips

Underground Line	Direction	Arrivals	Departures
Jubilee Line	From Bermondsey to London Bridge	22.70%	0.00%
Westbound	To Southwark from London Bridge	0.00%	22.70%
Jubilee Line	From Southwark to London Bridge	20.30%	0.00%
Eastbound	To Bermondsey from London Bridge	0.00%	20.30%
Northern Line	From Borough to London Bridge	16.10%	0.00%
Northbound	To Bank from London Bridge	0.00%	16.10%
Northern Line	From Bank to London Bridge	40.90%	0.00%
Southbound	To Borough from London Bridge	0.00%	40.90%

16.2.3 In respect of the rail trips that have been added on the underground as a secondary mode, the expected split is as follows and based on the location of the



railways stations relative to London Bridge and available underground connections:

- Jubilee Line to/from Southwark 44.4%; and
- Northern Line to/from Bank 55.6%.

16.3 Impact of Underground trips

16.4 Planning Capacity

16.4.1 Planning capacity figures obtained from TfL indicate that each Jubilee Line train has a planning capacity of 960 passengers. Based on the AM Peak frequency of 30 trains per hour per direction there is a planning capacity of 28,800 passenger per hour per direction (pphd) on the Jubilee Line. With regard to the Northern Line, each train has a planning capacity of 800 passengers and therefore capacity of 20,000 pphd in the northbound direction in the AM peak and 18,400 pphd in the southbound direction. In the PM peak the capacity is 18,400 each direction. The assessment of the Development underground trips on the Jubilee Line and the Northern Line planning capacity is set out in Table 16.2 and Table 16.3.

Table 16.2 - Assessment of Development Jubilee Line trips on Jubilee Line Planning Capacity

Time	Direction	Jubilee Line person trips	Jubilee Line planning capacity (pphd)	% of Jubilee Line network capacity
	Westbound To Southwark	75	28,800	0.26%
AM Peak	Eastbound To Bermondsey	124	28,800	0.43%
DM Dools	Westbound To Southwark	115	28,800	0.40%
PM Peak	Eastbound To Bermondsey	73	28,800	0.25%

16.4.2 The largest impact on the Jubilee Line network would be 0.43% of the planning capacity, due to AM peak arrivals from the west.



Table 16.3 - Assessment of Development Northern Line trips on Northern Line Planning Capacity

Time	Direction	Northern Line person trips	Northern Line planning capacity (pphd)	% of Northern Line network capacity
	Northbound to Bank	60	20,000	0.30%
AM Peak	Southbound to Borough	199	18,400	1.08%
	Northbound to Bank	183	18,400	0.99%
PM Peak	Southbound to Borough	63	18,400	0.34%

16.4.3 It can be seen that the largest impact on the Northern Line network would be 1.08% of the planning capacity, due to AM peak arrivals from the north.

16.5 Demand Capacity

16.5.1 The expected future passenger numbers on the Jubilee Line and the Northern Line for the development opening year have been obtained from TfL in order to establish the impact of the development on the future baseline line flows. This has been undertaken for the AM peak hour when the impact of the proposed development on the underground network is predicted to be greater than during the PM peak.

Table 16.4 - Assessment of Development Northern Line trips on Northern Line Planning Capacity

Branch	Direction	Baseline Planning Capacity (pphd)	Future Baseline Flows 2025	Ratio of Demand to Capacity	Proposed Dev Trips	Future Baseline + Proposed Dev trips	Ratio of Demand to Capacity	% Difference
	From Bermondsey	28,800	24,828	86.21%	68	24,896	86.4%	0.23%
	To Southwark	28,800	24,688	85.72%	7	24,695	85.7%	0.03%
Jubilee Line	From Southwark	28,800	20,313	70.53%	120	20,433	70.9%	0.42%
	To Bermondsey	28,800	21,214	73.66%	4	21,218	73.7%	0.01%
	From Borough	20,000	15,402	77.01%	48	15,450	77.3%	0.24%
Northern Line	To Bank	20,000	18,094	90.47%	12	18,106	90.5%	0.06%
Northern Line	From Bank	18,400	12,243	66.54%	196	12,439	67.6%	1.06%
	To Borough	18,400	6,353	34.53%	3	6,356	34.5%	0.01%



16.5.2 Table 16.4 shows that in respect of the Jubilee Line services, the greatest increase of ratio to flow capacity is 0.42% on inbound services from the west. Regarding the Northern Line, the highest increase of ratio to flow capacity is 1.06% for inbound services from the North.

16.6 Mitigation of the Underground Trips

16.6.1 The predicted increase in Underground trips for the proposed development would not result in any material impact on the Underground network. Additionally, it can be seen that the services would continue to operate within the capacity following the addition of the proposed development trips.



17 IMPACT ASSESSMENT - NATIONAL RAIL

17.1 Introduction

17.1.1 This section sets out the likely impact of the proposed development on National Rail services.

17.2 Rail Trips

17.2.1 The proposed development is predicted to generate 542 two-way rail trips during the AM peak and 515 two-way rail trips during the PM peak. As mentioned previously, based on the SWS Census data, approximately 74% of rail trips would be expected to use London Bridge National Rail Station with 26% of trips using other railways stations within London and then using the Underground. The number of total trips expected to use London Bridge National Rail Station is therefore calculated as 401 and 381 trips in the AM and PM peak respectively.

17.3 Impact of Rail Trips

17.3.1 London Bridge National Rail Station is currently served by 121 trains arriving and departing in the AM Peak with 113 services arriving and departing in the PM peak hour including South-eastern, Southern and Thameslink services. Based on the information provided on each of the train operators' websites, the average capacity of each train has been taken as 980 passengers. This equates to a capacity of 118,588 passengers in each direction in the AM Peak and 115,200 passengers in the PM peak hour. Therefore based on the proposed development rail trips, the impact of on the rail network has been calculated in Table 17.1.

Table 17.1 - Rail Network Impact Assessment

Time and Direction		Proposed Development Rail Trips	Rail Network Planning Capacity (pphd)	% of Rail Network planning capacity	
AM Peak	In	379	118,588	0.32%	
AM Peak	Out	22	118,588	0.02%	
DM Dools	In	38	115,200	0.03%	
PM Peak	Out	343	115,200	0.30%	

17.3.2 Table 17.1 indicates that the greatest impact on the railway network as a result of the proposed scheme would equate to 0.32% of the planning capacity of the line which would occur as a result of the departure trips in the AM Peak towards central London. This level of impact is very low and could be adequately accommodated on the railway network. Therefore, the impact of the proposed development on the railway network would be negligible.



17.4 Mitigation of Rail Trips

17.4.1 The proposed development is not expected to have a significant impact on the capacity of the rail services. Therefore no site specific mitigation is required.

17.5 Cumulative Assessment

17.5.1 All major developments that have been referred to the GLA since July 2010 have been subject to mayoral Community Infrastructure Levy (CIL) payments. Through these contributions, strategically important transport infrastructure within London such as Crossrail will be part funded from developments. Thus the cumulative impacts are mitigated through mayoral CIL financial contribution.



18 IMPACT ASSESSMENT – HIGHWAY NETWORK

18.1.1 This section assesses the impact of the proposed development vehicle trips on the local highway network.

18.2 Impact of Vehicle Trips

18.2.1 A summary of the proposed development vehicle trips per vehicle day during the AM and PM peak hour and across the whole day is set out in Table 18.1.

Table 18.1 - Net change in vehicle trips

Mode		AM Peak		PM Peak			Daily		
моце	In	Out	Total	In	Out	Total	In	Out	Total
Taxi office	2	2	4	2	2	4	16	16	32
Taxi retail	0	0	0	1	1	2	12	12	24
LGVs service yard	2	2	4	2	2	4	76	76	152
LGVs St Thomas Street	0	0	0	0	0	0	-2	-2	-4
HGVs St Thomas Street	0	0	0	0	0	0	20	20	40

Vehicle distribution

<u>Service yard - White Hart Yard</u>

18.2.2 With regard to the service yard trips, all vehicles will approach from the south on Borough High Street and turn right into the yard. In order to exit, all vehicles will turn left out of White Hart Yard to travel south on Borough High Street.

St Thomas Street servicing

18.2.3 Servicing vehicles will approach St Thomas Street from the east when arriving and exit in the westbound direction along St Thomas Street before turning left out onto Borough High Street.

St Thomas Street taxis

- 18.2.4 Whilst St Thomas Street is envisaged to operate one-way for larger vehicles, taxi vehicles would be allowed to enter and exit St Thomas Street from Borough High Street.
- 18.2.5 The proposed routes for different vehicle types for the proposed development are provided in Appendix G.



Vehicle impact

18.2.6 Table 18.2, Table 18.3 and Table 18.4 show the predicted effect these trips would have on the local highway network during the AM, PM peak and across the whole day.

Table 18.2 – Impact of proposed development trips on traffic flows – AM Peak

Link	Assessment Baseline Flows				Percentage Change	
	All vehicles	HGVs	All vehicles	HGVs	All vehicles	HGVs
London Bridge to the North of Tooley Street	1,294	276	1,296	276	0.1%	0.0%
Borough High Street to the south of London Bridge	2,347	673	2,349	673	0.1%	0.0%
St Thomas Street	258	7	263	7	1.7%	0.0%
White Hart Yard	4	1	8	1	100.0%	0.0%
Southwark Street to the east of Southwark Bridge Road	413	56	415	56	0.5%	0.0%
Southwark Street to the west of Southwark Bridge Road	890	87	892	87	0.2%	0.0%
Southwark Bridge Road	759	134	762	134	0.3%	0.0%
Marshalsea Road	763	160	766	160	0.3%	0.0%
Borough Highstreet to the north of Union Road	862	160	867	160	0.6%	0.0%
Long Lane	683	45	684	45	0.1%	0.0%
Tower Bridge Road to the south of Druid Lane	1,392	145	1,392	145	0.0%	0.0%
Tooley Street	537	116	537	116	0.0%	0.0%



Table 18.3 – Impact of proposed development trips on traffic flows – PM Peak

Link	Assessment Baseline Flows		Assessment Baseline Flows + Proposed Development		Percentage Change	
	All vehicles	HGVs	All vehicles	HGVs	All vehicles	HGVs
London Bridge to the North of Tooley Street	1,108	236	1,110	236	0.2%	0.0%
Borough High Street to the south of London Bridge	2,525	572	2,527	572	0.1%	0.0%
St Thomas Street	213	4	220	4	3.1%	0.0%
White Hart Yard	2	1	6	1	200.0%	0.0%
Southwark Street to the east of Southwark Bridge Road	381	34	384	34	0.7%	0.0%
Southwark Street to the west of Southwark Bridge Road	741	72	744	72	0.3%	0.0%
Southwark Bridge Road	623	88	626	88	0.4%	0.0%
Marshalsea Road	755	107	758	107	0.3%	0.0%
Borough Highstreet to the north of Union Road	837	127	843	127	0.7%	0.0%
Long Lane	570	38	571	38	0.1%	0.0%
Tower Bridge Road to the south of Druid Lane	1,160	95	1,160	95	0.0%	0.0%
Tooley Street	460	100	460	100	0.0%	0.0%

Table 18.4 – Impact of proposed development trips on traffic flows – Daily

Link	Assessment Baseline Flows		Assessment Baseline Flows + Proposed Development		Percentage Change	
	All vehicles	HGVs	All vehicles	HGVs	All vehicles	HGVs
London Bridge to the North of Tooley Street	25,427	4,664	25,462	4,666	0.1%	0.0%
Borough High Street to the south of London Bridge	19,661	3,567	19,694	3,567	0.2%	0.0%
St Thomas Street	6,104	567	6,214	608	1.8%	7.2%
White Hart Yard	26	5	178	5	584.6%	0.0%
Southwark Street to the east of Southwark Bridge Road	12,429	1,375	12,485	1,380	0.5%	0.4%
Southwark Street to the west of Southwark Bridge Road	14,887	1,447	14,948	1,457	0.4%	0.7%
Southwark Bridge Road	14,501	1,768	14,605	1,778	0.7%	0.6%
Marshalsea Road	14,319	2,044	14423	2,054	0.7%	0.5%
Borough Highstreet to the north of Union Road	14,361	2,372	14,540	2387	1.2%	0.6%
Long Lane	11,406	756	11,429	761	0.2%	0.7%
Tower Bridge Road to the south of Druid Lane	23,202	1,909	23,211	1,919	0.0%	0.5%
Tooley Street	8,965	1,934	8,967	1,936	0.0%	0.1%

18.2.7 The above tables show that all of the road links would experience change in traffic flows of less than 5% with traffic flows predicted to increase by negligible



amounts. This is with the exception of White Hart Yard where large percentage increase in traffic is predicted. However, this is only in percentage terms and as a result of very low baseline traffic flows on the Yard. The resultant traffic flows would still remain within the environmental capacity thresholds for when pedestrians treat a street as a space to be occupied and not a road.

18.3 Mitigation of vehicle trips

- 18.3.1 On the basis of the impact assessment analysis, it can be seen that the development would have a negligible impact on the local highway network.
- 18.3.2 With regard to White Hart Yard, the mitigation of the additional vehicle trips is being achieved through the proposed management of deliveries to and from the site as part of the DSWMP. As part of this, all deliveries will need to be prebooked and only two slots will be available during the AM and PM peak hour to minimise the impacts during the highway peaks. Additionally, a proportion of servicing will be undertaken overnight (between 12am -5am) to further reduce the number of vehicles during the day. Accordingly, the above measures will limit the number of vehicles being added on White Hart Yard within a single hour avoiding the impact being unacceptable.
- 18.3.3 Additionally, the proposed development proposes substantial public realm improvements including provision of new routes through the site and increasing permeability for pedestrians and cyclists. As part of this, King's Head Yard would be enhanced as a pedestrian route and will operate almost traffic-free. It is considered that this will encourage some pedestrians to divert onto King's Head Yard instead, reducing the already low pedestrian movements on White Hart Yard. This will further mitigate the impact of the additional vehicle movements on White Hart Yard as a result of the proposed development.

18.4 Cumulative Assessment

18.4.1 The cumulative baseline traffic flows have been estimated based on the trip generation set out in each of the committed developments' Transport Assessments which have been obtained from LBS. From the review of the transport reports, it has been found that each of the committed developments proposal involves redeveloping brownfield land whereby the proposed development replaces an existing use. All schemes have been designed to exclude general car parking in order to comply with the current transport



guidance and additionally many of the developments replace sites with car parking provisions. As a result, the majority of the committed developments are reported not to result in additional traffic on the highway network. For those developments where an increase in traffic is predicted the increases are negligible and these have been added to the baseline flows to generate the cumulative baseline flows.

18.4.2 Table 18.5 provides details of the effects of the committed developments in combination with the proposed development on the local highway network.

Table 18.5 – Impact of proposed development trips on traffic flows – Daily

Link		Future Baseline Flows		e Baseline opment	Percentage Difference		
	AM	PM	AM	AM	PM	AM	
London Bridge to the North of Tooley Street	1,294	1,108	1,309	1,120	1.1%	1.0%	
Borough High Street to the south of London Bridge	2,347	2,525	2,362	2,537	0.6%	0.5%	
St Thomas Street	258	213	263	218	1.7%	2.1%	
White Hart Yard	4	2	8	6	100.0%	200.0%	
Southwark Street to the east of Southwark Bridge Road	413	381	431	393	4.4%	3.1%	
Southwark Street to the west of Southwark Bridge Road	890	741	908	753	2.0%	1.6%	
Southwark Bridge Road	759	623	762	626	0.3%	0.4%	
Marshalsea Road	763	755	766	758	0.3%	0.3%	
Borough Highstreet to the north of Union Road	862	837	886	851	2.8%	1.7%	
Long Lane	683	570	684	571	0.1%	0.1%	
Tower Bridge Road to the south of Druid Lane	1392	1160	1,392	1,160	0.0%	0.0%	
Tooley Street	537	460	537	460	0.0%	0.0%	

18.4.3 As can be seen from the above assessment, when the cumulative baseline plus the proposed development traffic flows are compared with the baseline flows, White Hart Yard is predicted to experience large percentage increases in traffic flows which is as the direct result of the proposed development and has been assessed earlier in this section with mitigation measures proposed. This assessment showed that in real terms, the resultant traffic flows on White Hart Yard will continue to be well within the 'low traffic volumes' threshold for when pedestrians treat a street as a space to be occupied and not a road, based on



advice provided within Manual for Streets, the Department for Transport's guidance for lightly-trafficked residential streets. Additionally, the proposed pedestrian and public realm enhancements are expected to result in a decrease in pedestrian movements on White Hart Yard who would be more likely to use King's Head Yard instead.

18.4.4 All other links would experience an increase of traffic of less than 10% during both the AM and PM peak. Therefore, the cumulative effect is assessed as being negligible across the wider road network.



19 IMPACT ASSESSMENT - CONSTRUCTION

19.1.1 An assessment of the anticipated impacts of construction traffic for the proposed development has been undertaken. More detailed demolition and construction information is contained in Chapter 6: Development Programme, Demolition, Deconstruction, Refurbishment and Construction of the Environmental Statement.

19.2 Vehicle Movements

- 19.2.1 Construction and demolition works would generate short-term increases in vehicle movements on the highway in the vicinity of the site. It should also be noted that these increases would not be constant throughout the construction period and consideration has only been given in the assessment to the highest peak frequency of vehicle movements as this gives a worst case assessment.
- 19.2.2 Based on the information provided, there is expected to be a maximum of 44 two-way HGV movements a day during the most intense construction period (piling activities). Based on a ten hour day, the peak hour two-way HGV traffic would be 4 movements (i.e. 2 in, 2 out). This represents a worst case assessment as it looks at only the peak operational periods, at other times of construction traffic movements would be less.

19.3 Construction Vehicle Distribution

19.3.1 All construction vehicles would enter the Site via St Thomas Street from the east. In order to depart, vehicles will travel in the westbound direction on St Thomas Street and turn left onto Borough High Street which is a strategic route and enables connections with other major road links.

19.4 Impact of Construction Vehicles

19.4.1 The predicted increases in traffic flows during construction based on assessment baseline traffic are shown in Tables 19.1, 19.2 and 19.3 for the AM peak, PM peak and 24 hours respectively.



Table 19.1 - AM Peak Percentage on Local Roads Attributed to Construction Traffic

Link	Assessment Baseline Flows		Assessment Baseline Flows + Construction Flows		Percentage Change	
	All vehicles	HGVs	All vehicles	HGVs	All vehicles	HGVs
London Bridge to the North of Tooley Street	1,294	276	1,294	276	0.0%	0.0%
Borough High Street to the south of London Bridge	2,347	673	2,347	673	0.0%	0.0%
St Thomas Street	258	7	262	11	1.7%	62.9%
White Hart Yard	4	1	4	1	0.0%	0.0%
Southwark Street to the east of Southwark Bridge Road	413	56	414	57	0.1%	1.0%
Southwark Street to the west of Southwark Bridge Road	890	87	890	87	0.1%	1.3%
Southwark Bridge Road	759	134	760	135	0.1%	0.8%
Marshalsea Road	763	160	764	161	0.1%	0.7%
Borough Highstreet to the north of Union Road	862	160	864	162	0.2%	1.0%
Long Lane	683	45	683	45	0.1%	1.2%
Tower Bridge Road to the south of Druid Lane	1,392	145	1,392	145	0.1%	0.8%
Tooley Street	537	116	537	116	0.0%	0.2%

Table 19.2 - PM Peak Percentage on Local Roads Attributed to Construction Traffic

Link	Assessment Baseline Flows		Assessment Baseline Flows + Construction Flows		Percentage Change	
	All vehicles	HGVs	All vehicles	HGVs	All vehicles	HGVs
London Bridge to the North of Tooley Street	1,108	236	1,108	236	0.0%	0.0%
Borough High Street to the south of London Bridge	2,525	572	2,525	572	0.0%	0.0%
St Thomas Street	213	4	217	8	2.1%	100.0%
White Hart Yard	2	1	2	1	0.0%	0.0%
Southwark Street to the east of Southwark Bridge Road	381	34	382	35	0.1%	1.6%
Southwark Street to the west of Southwark Bridge Road	741	72	742	73	0.1%	1.5%
Southwark Bridge Road	623	88	624	89	0.2%	1.3%
Marshalsea Road	755	107	756	108	0.1%	1.0%
Borough Highstreet to the north of Union Road	837	127	839	129	0.2%	1.3%
Long Lane	570	38	571	39	0.1%	1.4%
Tower Bridge Road to the south of Druid Lane	1,160	95	1,161	96	0.1%	1.2%
Tooley Street	460	100	460	100	0.0%	0.0%



Table 19.3 - Daily Percentage on Local Roads Attributed to Construction Traffic

Link	Assessment Baseline Flows		Assessment Baseline Flows + Construction Flows		Percentage Change	
	All vehicles	HGVs	All vehicles	HGVs	All vehicles	HGVs
London Bridge to the North of Tooley Street	25,427	4,664	25,429	4,666	0.0%	0.0%
Borough High Street to the south of London Bridge	19,661	3,567	19,661	3,567	0.0%	0.0%
St Thomas Street	6,104	567	6,148	611	0.7%	7.8%
White Hart Yard	26	5	26	5	0.0%	0.0%
Southwark Street to the east of Southwark Bridge Road	12,429	1,375	12,435	1,381	0.0%	0.4%
Southwark Street to the west of Southwark Bridge Road	14,887	1,447	14,898	1,458	0.1%	0.8%
Southwark Bridge Road	14,501	1,768	14,512	1,779	0.1%	0.6%
Marshalsea Road	14,319	2,044	14,330	2,055	0.1%	0.5%
Borough Highstreet to the north of Union Road	14,361	2,372	14,378	2,389	0.1%	0.7%
Long Lane	11,406	756	11,412	762	0.0%	0.7%
Tower Bridge Road to the south of Druid Lane	23,202	1,909	23,213	1,920	0.0%	0.6%
Tooley Street	8,965	1,934	8,965	1,934	0.0%	0.0%

19.4.2 From the above analysis, it can be seen that construction vehicle activity would have a negligible effect on the majority of the surrounding roads, resulting in an increase of less than 10%. The greatest changes in traffic would occur on St Thomas Street which has existing low HGV flows in the AM and PM peak hour. The increase in HGVs would be up to 100% for St Thomas Street in the PM peak. This equates to a major adverse effect, but this is only as a result of the low baseline HGV movements on this road. In real terms, there would only be an increase of 4 HGV movements (which is the equivalent of 2 HGVs) in the AM and PM peak hour which averages an additional 1 HGV vehicle every 15 minutes; this level of increase is not considered significant. It is also noted that St. Thomas Street has been closed to through traffic since 2012 as part of the London Bridge Station redevelopment project resulting in a lower amount of HGV traffic that would otherwise be expected to occur on this road. It is also noted that in respect of the overall traffic flows, the increase in vehicle movements would be less than 10% on all road links and therefore insignificant.

19.5 Pedestrian and cyclists

19.5.1 Potential traffic and transportation related effects could arise causing temporary disruption to road users and pedestrians from vehicles (particularly HGVs) entering and leaving the site. These include footway closure on the southern side



of St Thomas Street outside the site with pedestrians being diverted onto the opposite side of the road.

19.6 Public Transport Users

19.6.1 During the demolition and constructions there would be an increased number of workers in the local area who would use the public transport network. However, based on the proposed working hours which would be from 8am – 6pm, the majority of the construction workers would be travelling outside of the peak periods. Therefore, the impact on the bus, rail and underground network users would be insignificant.

19.7 Mitigation

CEMP/CLP Head of Terms

- 19.7.1 The construction vehicles would be managed in accordance with a Construction Logistics Plan and a Site Environmental Management Plan (SEMP). These documents would be agreed with LBS prior to the commencement of works and are expected to be secured by planning conditions.
- 19.7.2 Other potential effects as a result of construction would be on road surfaces from mud and dirt, as well as temporary footway closure on the southern side of St Thomas Street which would be actively managed in accordance with measures set out in the SEMP and the CLP. These measures would be expected to be incorporated as planning conditions / Section 106 measures and are therefore considered as mitigation measures rather than part of the scheme design, hence their consideration as such within this assessment. These measures are summarised as follows:
 - restricted hours of work;
 - demolition and construction method statements;
 - Considerate Constructors Scheme;
 - management of deliveries and trade contractors;
 - management of noise, vibration and dust; and
 - management of construction waste.



Pedestrian and Cyclist Movement

- 19.7.3 Details on the management of footway closures and routing would be agreed with LBS through the SEMP post-planning and prior to commencement of the Development as part of discharging the expected planning conditions / Section 106 Obligation for the CLP and SEMP.
- 19.7.4 Details on the management of road closures and routeing would also be agreed with LBS through the CLP and SEMP post-planning.

19.8 Cumulative impacts during construction

- 19.8.1 Given that there is an uncertainty over when the various committed developments would commence in the area, the methods of construction that would be employed; the management measures that would be adopted at each site and the periods of peak construction, it is difficult to predict the cumulative impacts of construction activities, particularly where the intensive operations are of short duration.
- 19.8.2 It is anticipated that each site coming forward would be required to develop their own SEMP and therefore agree vehicular numbers and vehicular routes with LBS and TfL. It is therefore considered that on this basis and subject to the implementation of best practice construction traffic management measures, the residual cumulative effects on all users of the local transport network would be negligible.



20 INTERIM TRAVEL PLAN

20.1.1 This section sets out the key principles of a Travel Plan for the proposed development. It is envisaged that a Travel Plan will be secured through a planning condition or an obligation in the S106 agreement.

20.2 Aims and objectives

20.2.1 The key aim of Travel Plan is to set out the strategy for maximising the use of public transport, waling and cycling amongst all occupants of the site. As the proposed development will be car-free, the travel patterns have already been significantly influenced towards the use of sustainable transport to the site. Therefore, the main objective of the Travel Plan is to ensure that the site's location with excellent access to sustainable modes is taken advantage of and the predicted travel patterns are achieved and maintained.

20.3 Measures

20.3.1 A copy of the Travel Plan is included in Appendix H.



21 SUMMARY AND CONCLUSIONS

21.1.1 This Transport Assessment has been prepared in support of the proposed redevelopment at a site known as New City Court, 20 St Thomas Street, London, SE1 9RS within the London Borough of Southwark (LBS).

21.2 Site location

- 21.2.1 The site is located in the London Bridge area covering an area of approximately 0.36 hectares (ha). The site is bounded by St Thomas Street to the north; shops on Borough High Street (A3) to the west; King's Head Yard to the south; and Guy's Hospital buildings to the east. It is currently almost entirely occupied by:
 - Georgian terraced townhouses at Nos. 4, 6, 8, 12, 14 and 16 St Thomas Street;
 - New City Court office building at No. 20 St Thomas Street; and
 - Keats House at Nos. 24 to 26 St Thomas Street.

21.3 Planning policy

21.3.1 The location, design and land uses for the development proposals fully accord with current national, regional and local transport planning policies.

21.4 Development proposals

- 21.4.1 GPE (St Thomas Street) Ltd is seeking to obtain full planning permission and listed building consent for the part demolition, part deconstruction and refurbishment of listed townhouses / façades, and construction of an office-led, mixed-use scheme.
- 21.4.2 The proposed development as described in the planning application form is as follows:

'Comprehensive redevelopment of the site to include demolition of existing 1980s office buildings and erection of a 37-storey building (including ground and mezzanine) of a maximum height of 144m (AOD), restoration and refurbishment of existing listed terrace, and redevelopment of Keats House with retention of existing façade to provide a total of 46,374 sqm of Class B1 office floorspace, 765 sqm of Class A1 retail floorspace, 1,139 sqm of Class A3 retail floorspace, 615 sqm of leisure floorspace (Class D2),



719 sqm hub space (Class B1/D2) and a 825 sqm elevated public garden, associated public realm and highways improvements, new station entrance, cycling parking, car parking, servicing, refuse and plant areas, and all ancillary or associated works.'

- 21.4.3 In terms of access, cars and light goods vehicles will access the basement service area and car park via vehicle lifts provided on White Hart Yard. Two vehicle lifts will be provided, one for entering and one for exiting vehicles. Larger vehicles including refuse collection vehicles will be able to access a ground level delivery and waste management area adjacent to Keats House from a relocated on-street loading bay on St Thomas Street. Motorcycles and couriers will be able to stop on St Thomas Street.
- 21.4.4 Cycle parking at the site will be provided for the various user types on site and will meet the requirements set out in the London Plan, the Draft New London Plan, the Southwark Local Plan Saved Policies, the Core Strategy and the Draft New Southwark Plan.
- 21.4.5 The development is proposed to be car-free with the exception of two accessible parking bays at basement level for the use of blue badge holders.
- 21.4.6 The pedestrian realm will be improved throughout, with increased permeability between King's Head Yard and St Thomas Street. The main Tower will have a pedestrian entrance from New Yard which is one of the two yards created by the public realm proposals within the site. The Yard will be for pedestrian use only and will link with St Thomas Street through the proposed St Thomas Square.
- 21.4.7 Outside of the site's red line boundary there is a proposal to open up the rear of the London Bridge Underground station building at ground level to provide a new exit directly into the site's largest public space (King's Head Square). This is supported by TfL and London Underground.

Accessibility

- 21.4.8 The site has a PTAL of 6b indicating an excellent level of accessibility being in close proximity to London Bridge Underground and National Rail Station and several bus routes.
- 21.4.9 The site is located in an area with an established network of footways and pedestrian facilities. Pedestrian accessibility to the site, in the context of the



surrounding area, is very good. In addition, the proposed development will deliver significant improvements to pedestrian connectivity by public realm enhancements.

21.4.10 The site is located in close proximity to established cycle routes including Cycle Superhighways.

21.5 Development impact

- 21.5.1 The proposed development would result in additional trips on the surrounding transport network. As the proposed development will be car-free (other than 2 disabled bays) the majority of the trips in terms of staff travel are forecast to be undertaken on foot and by public transport. The impact of these trips has been assessed in the context of the existing and future capacity of the local public transport services. It has been demonstrated that the impact on the surrounding public transport network would be negligible.
- 21.5.2 The additional pedestrian trips are also considered to have a negligible impact given the improvements to the pedestrian network including a new entry/exit to London Bridge Underground Station directly from the site's new public square.
- 21.5.3 The proposed development will attract additional servicing and taxi trips compared to the existing situation. An impact assessment analysis has been undertaken which shows that these trips would have a negligible impact on the local highway network.
- 21.5.4 With regard to White Hart Yard which will provide access to the site's service yard, mitigation of the additional vehicle trips will be achieved through the proposed management of deliveries to and from the site as part of the DSMP. As part of this, all deliveries will need to be pre-booked and only two slots will be available during the AM and PM peak hour to minimise the impacts during the highway peaks. Additionally, a proportion of servicing will be undertaken overnight (between 12am -5am) to further reduce the number of vehicles during the day. Accordingly, the above measures will limit the number of vehicles being added on White Hart Yard within a single hour avoiding the impact being unacceptable.



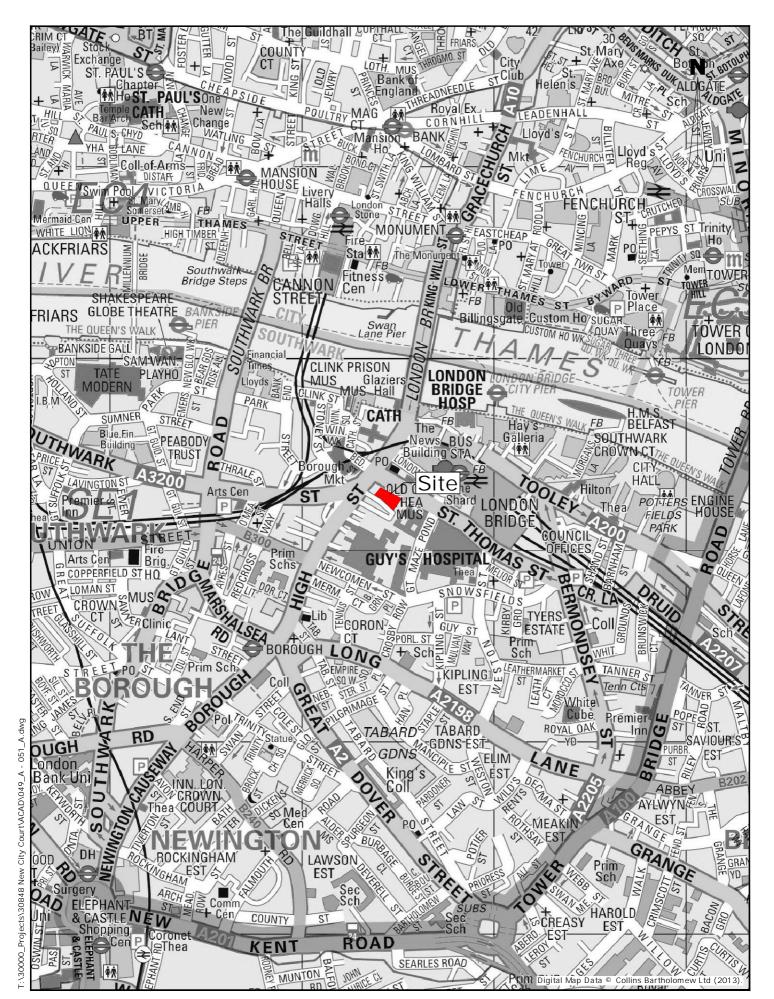
21.6 Travel Plan

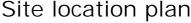
21.6.1 The proposed development will operate a Workplace Travel Plan. The key aim of Travel Plan is to set out the strategy for maximising the use of public transport, waling and cycling amongst all occupants of the site. As the proposed development will be car-free, the travel patterns have already been significantly influenced towards the use of sustainable transport to the site.



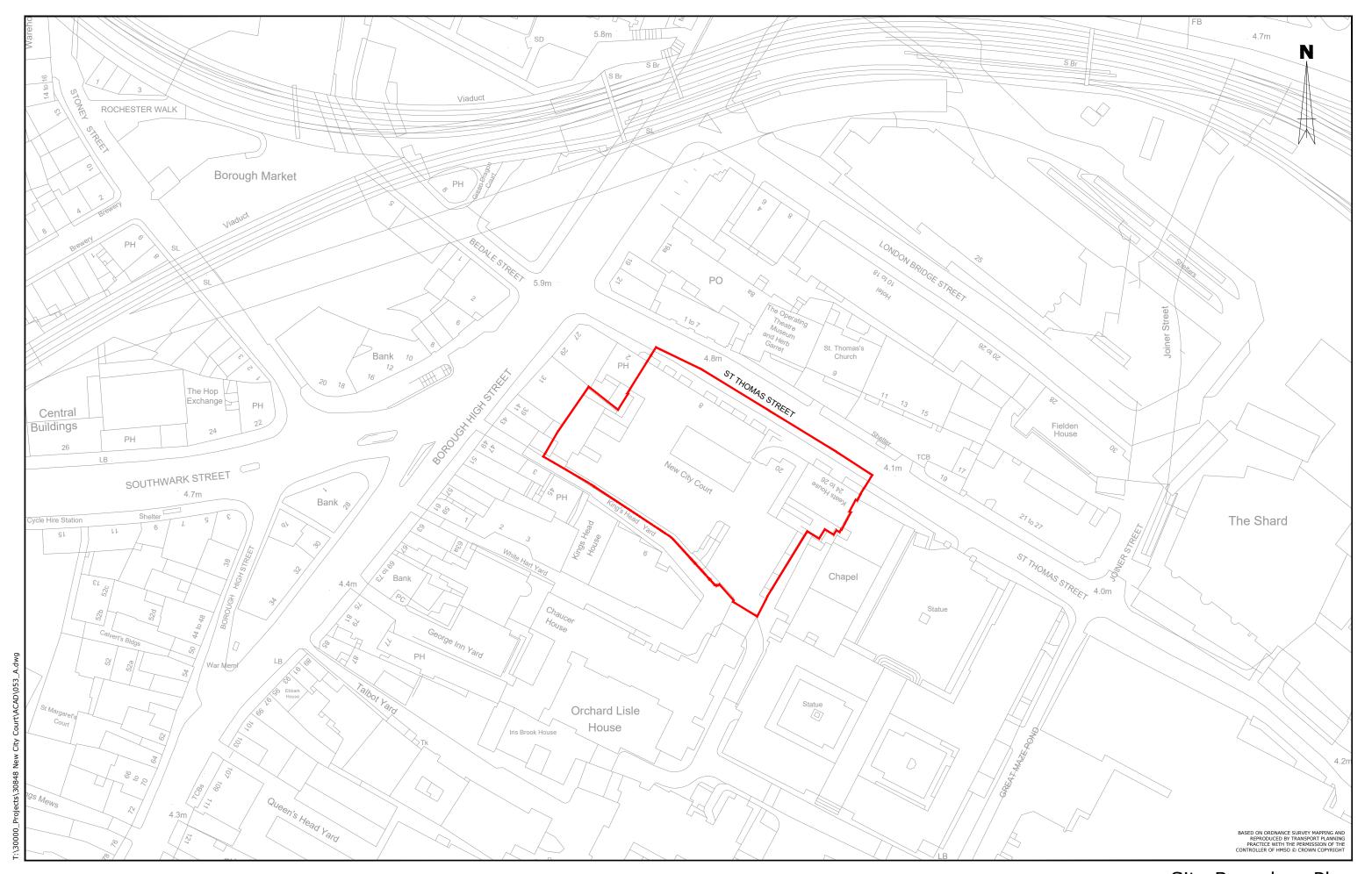
Figures



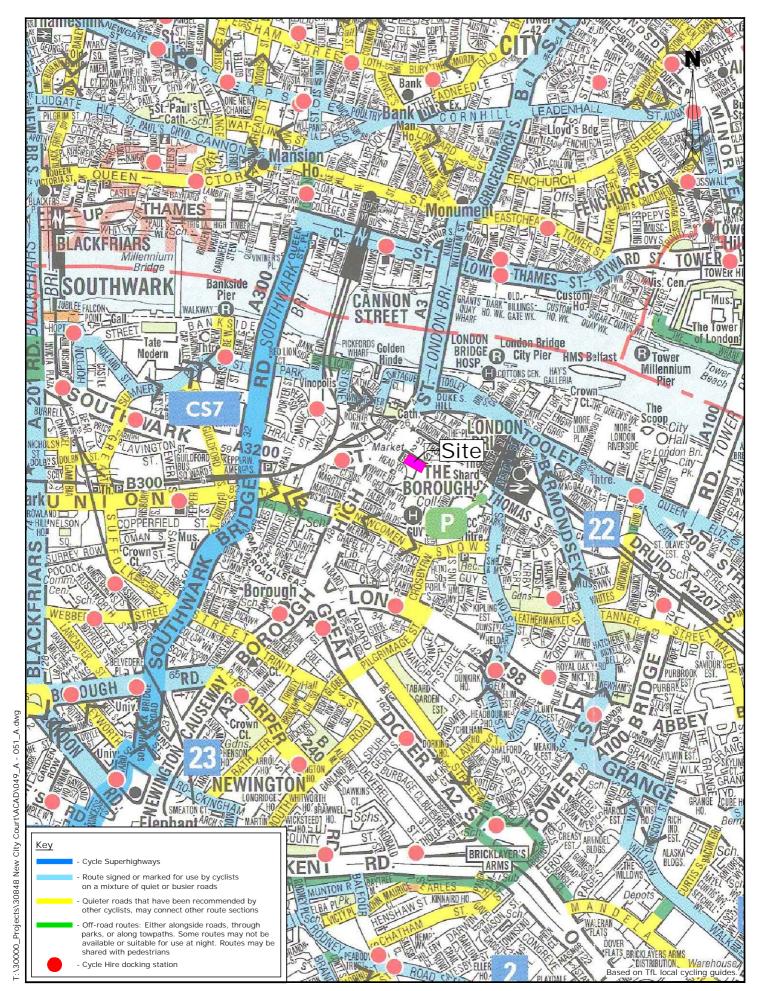










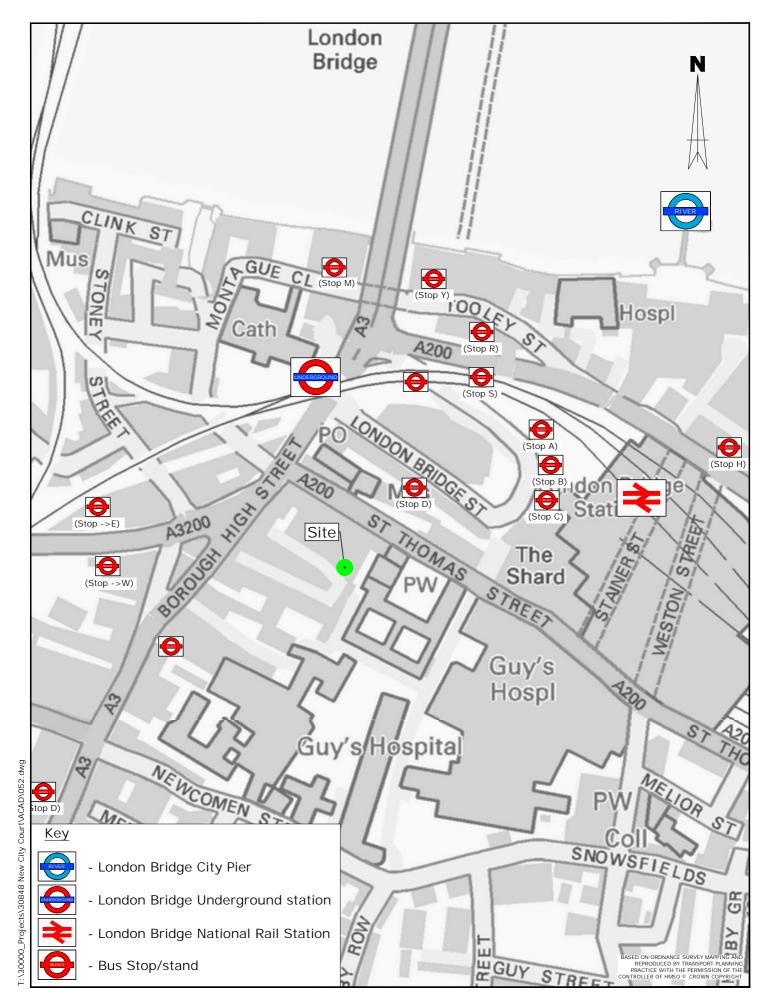




Local cycle network



Local bus network





Public Transport Access

Appendices



Appendix A

PERS Audit





CLIENT PROJECT REPORT

London Bridge, PERS Assessment

Summary Report CPR2583

M Gupta and C Lodge

Report details

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1 Introduction

1.1 Background

Transport Research Laboratory (TRL) was commissioned by Transport Planning Practice Ltd. to carry out a PERS audit within the London Borough of Southwark immediately south of London Bridge and around London Bridge Station in November 2018. This audit is being conducted to assess the provision for pedestrians in the local area.

The audit covered the area between London Bridge and Borough High Street / Southwark Street. Local roads and road crossings which allow access to and from the London Bridge station were assessed along with bus stops which are located along these routes. In addition to this, walking routes to London Bridge Station and The Queen's Walk along the Thames were assessed.

1.2 Objectives

The objectives for the PERS assessment were to:

- Undertake pedestrian environment assessments of the area surrounding the site, to assess its suitability, comfort and safety.
- Prepare a summary report which presents the findings of the audit and assesses the baseline situation.

1.3 Document Purpose

The purpose of this document is to report the key findings from the PERS study and to provide a baseline of how pedestrians are currently provided for within the study area, focusing on the areas and components identified by the audit as being critical for the safe and efficient movement of all types of pedestrians. This report highlights the key issues and the potential areas for improvement.

1.4 Document Outline

This document is structured as follows.

- Chapter 2 Describes the site location and the study area.
- Chapter 3 Outlines the key findings of the PERS audit for each component type.
- Chapter 4 Captures the key recommendations from the site visit.
- Appendix A Outlines the components assessed.
- Appendix B Sets out the methodology used and the relevant parameter weightings.



2 Audit Area

2.1 Introduction

The study area is located within the London Borough of Southwark. It includes the area immediately south of London Bridge and around London Bridge railway station. The area encompasses the footways and crossings which lead to and from London Bridge station, Borough Market and the local bus stops which service the areas.

The extent of the audit area is shown in Figure 2-1.

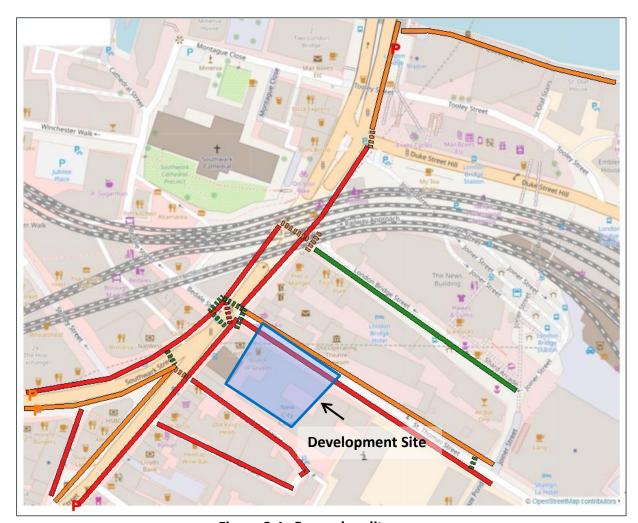


Figure 2-1: General audit area



3 Summary of PERS assessment findings

3.1 Introduction

This section outlines the key findings of the PERS assessment for each component type, focusing on the main issues and areas of opportunity for improving provision for pedestrians within the streetscape environment. The component types audited for the study were:

- Thirteen links
- Eleven crossings
- Four public transport waiting areas (PTWAs)

For each component audited, the following information is provided:

- 1. An overview of performance for the components as a whole,
- 2. A summary of performance of individual parameters for the components.

Appendix A provides a list of component types reviewed as part of the PERS audits, along with their unique identification code. The audits were carried out on 6th November, 2018. The weather was cloudy and dry. The AM peak movements were observed by the audit leader.

3.2 Priority assigned to components

The study area was focused on the components used to access the new development site from a variety of different locations. Given the large study area identified, we have selected the most important components for assessment.

As such all the elements across the site were given 'Strategic' importance. This means they are held to a higher standard within the assessment of their performance. Practically this means a component will have to score higher to move from a red to amber RAG rating, and so on.

For more information on priority see sections B.6 and B.7 in Appendix B.



3.3 Links

3.3.1 Link Overall Scores

A total of thirteen links were identified to be audited as part of the PERS study. Reference codes are used in this report and a full list of the codes can be found in Appendix A.

All of the links were identified as having 'strategic' priority as they form critical routes to access the Development site. Table 3-1 shows the number of links classified as red, amber or green.

RAG rating	No. of Links (% of total)			
RED	7 (54%)			
AMBER	5 (38%)			
GREEN	1 (8%)			

Table 3-1: Total RAG scores for Links

Over half the links achieved a red rating which indicates a poor level of provision for a significant number of links in the audit area. This is in part due to the stricter performance required of the 'strategic' priority assigned to the routes, which means that consistent issues with uneven surfacing and effective width impacted on these routes.

Table 3-2 shows the total scores for the links which were audited while Figure 3-1 provides the numeric score and associated rating along with the locations within the audit area.

Score & Ref Name RAG White Hart Yard (Pedestrian link) -13 L7 King's Head Yard (Pedestrian link) L6 Borough High Street – South Side, west of St. Thomas Street +10 L1 L5 Southwark Street – North Side, West of London Bridge Street +26 Borough High Street – connecting to Southwark Street +33 Borough High Street, east side, between St. Thomas Street and Duke Hill L11 +34 Street (Tooley Street) L8 St. Thomas Street – west side +38 Borough High Street - North Side, west of Southwark High Street till L2 +45 Southwark War Memorial Borough High Street, between Duke Hill Street (Tooley Street) and The L12 +51 Queen's Walk Southwark Street – south side L4 +54 St. Thomas Street – east side +54 L13 The Queen's Walk (Pedestrian link) +63 L10 London Bridge Street – both sides +89

Table 3-2: Link overall score and RAG Ratings



The table shows that:

- One link scored negatively overall (-11 and lower)
- Two links scored an average mark overall (-10 to +10)
- The remaining ten links scored positively overall (+11 and higher)

The Overall Score RAG Rating is shown in Figure 3-1 which details the location of links.

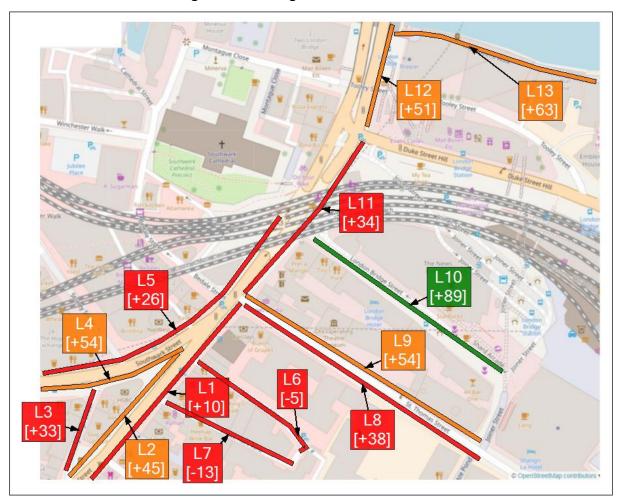


Figure 3-1: Link RAG Rating and overall score

3.3.2 Links Parameter Scoring Review

Figure 3-2 provides a comparative breakdown of the parameter scores for each link while Table 3-3 displays the individual link un-weighted score with accompanying RAG status to provide an overview of the performance, scores range from -3 to +3.



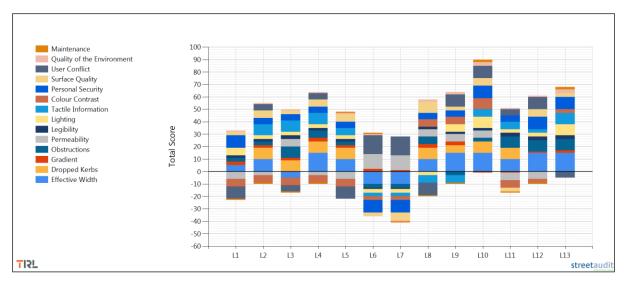


Figure 3-2: Parameter scores for each Link

Table 3-3: Unweighted parameter scores for Links

ID	Effective Width	Dropped Kerbs	Gradient	Obstructions	Permeability	Legibility	Lighting	Tactile Information	Colour Contrast	Personal Security	Surface Quality	User Conflict	Quality of the Environment	Maintenance
L1	0	N/A	+2	0	-2	+1	+1	N/A	-2	+1	0	-2	0	-1
L2	+1	+2	+1	0	-1	+1	0	+2	-2	0	+1	0	0	-1
L3	-1	+2	+1	+2	+1	+2	0	+2	-2	0	0	-1	0	-1
L4	+2	+2	+2	+1	-1	+1	0	+2	-2	0	+1	0	0	-1
L5	+1	+2	+1	0	-2	+1	0	+1	-2	0	+1	-2	0	0
L6	-2	N/A	+1	-1	+3	-1	-1	-1	-1	-2	-1	+2	0	0
L7	-2	N/A	0	-1	+3	-1	-1	-1	-1	-2	-2	+2	-1	-1
L8	+1	+2	+2	+1	+1	+1	-1	-2	+1	0	+2	-2	+1	-1
L9	+2	+1	+2	-1	+1	+1	+1	-2	+1	0	0	+1	+1	-1
L10	+2	+2	-1	0	+1	+1	+2	+1	+2	+1	+1	+1	+2	+1
L11	+1	+2	-1	+2	-2	+2	0	+1	-2	0	-1	0	0	-1
L12	+2	N/A	0	+2	-2	+2	0	0	-1	+1	+1	+1	0	-1
L13	+2	N/A	+1	+2	N/A	+2	+2	+2	0	+1	0	-1	+2	+1

The consistently worst scoring parameters were:

- **Maintenance** Areas of the footway were neglected with built up staining of the surfaces and poor maintenance of infrastructure and surfacing materials.
- **User Conflict** Narrow or restricted sections of footway heightened user conflict due to the high pedestrian flows along most links assessed.
- Colour contrast There was a general lack of colour contrast used to highlight space for users and to aid navigation. Poor maintenance also limited the impact of contrasting materials where they were used.



- Tactile Information Tactile information was absent along some links where it was required at busy side roads or crossings. In other locations the existing tactile paving was poorly maintained or aligned.
- Permeability Due to the high flows of motorised traffic and the high capacity of
 most roads in the audit area informal crossings were risky and restricted to able
 bodied adults.

The consistently best performing parameters were:

- **Dropped kerbs** provision across the site was good in general with high capacity square profile kerbs which were well installed and maintained, and were flush with the carriageway.
- Gradient gradients in the built environment were mostly well accounted for with formal rest points and the camber and crossfall required for drainage didn't impact on accessibility.

3.4 Crossings

3.4.1 Crossing Overall Scores

A total of eleven crossings were identified to be audited as part of the PERS study. All of the crossings were identified to be 'strategic' priority due to their importance in navigating the local environment. Table 3-4 shows the number of crossings classified as red, amber or green and as a percentage of all the crossings.

Table 3-4: Total RAG scores for Crossings

RAG rating	No. of Crossings (% of total)
RED	1 (9%)
AMBER	4 (36%)
GREEN	6 (55%)

The majority of crossings received a green or an amber RAG rating which indicates generally acceptable or good provision for most of the site.

Table 3-5 shows the total scores for the crossings which were audited while Figure 3-3 provides the numeric score and associated RAG rating.



Table 3-5: Crossing overall score and RAG Ratings

Ref	Name	Score & RAG
C 7	Diagonal Crossing over Borough High Street from Barclays Bank to Borough market hall	+16
C10	Over Duke Hill Street (Tooley Street)	+35
C9	Over London Bridge Street	+38
C2	Over Borough High Street	+48
C8	Over Borough High Street (from Green Dragon Court to London Bridge Street)	+57
C11	Lower end of St. Thomas Street	+65
C1	Over Southwark Street	+68
C6	Over Borough High Street (East Side from St. Thomas Street to Bedale Street)	+69
C4	Over Bedale Street	+74
C5	Over St. Thomas Street	+74
С3	Over Borough High Street (West Side from St. Thomas St to Bedale Street)	+75

The table shows that:

- No crossings scored negatively overall (-11 and lower)
- No crossings scored an average mark overall (-10 to +10)
- All eleven crossings scored positively overall (+11 and higher)

The overall score RAG rating is shown in Figure 3-3 which details the location of crossings.



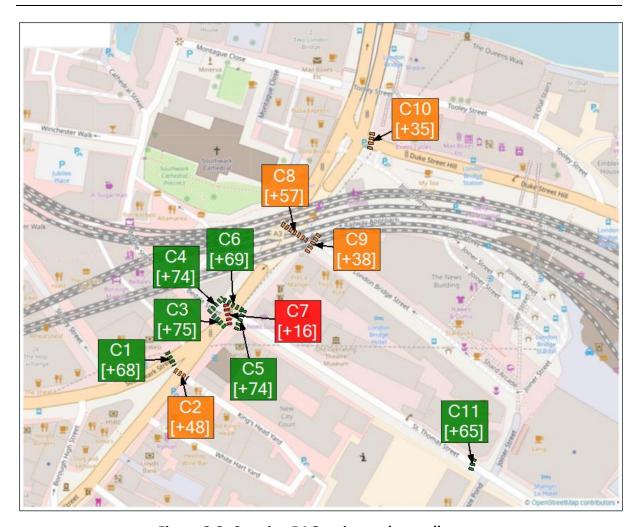


Figure 3-3: Crossing RAG rating and overall score

3.4.2 Crossing Parameter Score Review

Figure 3-4 shows the parameter scores 'stacked' for each crossing assessed within the audit area while Table 3-6 displays the individual crossing un-weighted score with accompanying RAG status.



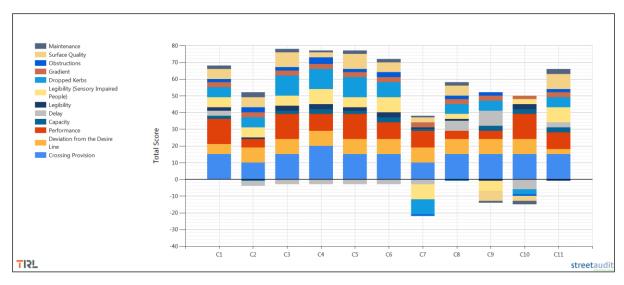


Figure 3-4: Parameter Scores for each Crossing

Table 3-6: Unweighted parameter scores for Crossings

ID	Crossing Provision	Deviation from the Desire Line	Performance	Capacity	Delay	Legibility	Legibility (Sensory Impaired People)	Dropped Kerbs	Gradient	Obstructions	Surface Quality	Maintenance
C1	+2	+1	+2	+1	0	+1	+1	+1	+2	+1	+1	+1
C2	+1	+2	0	-1	-1	0	+1	+1	+2	+2	+1	+2
C3	+2	+2	+2	+1	-1	+2	+1	+3	+2	+1	+2	+1
C4	+3	+2	+1	+2	-1	+2	+2	+3	+2	+3	0	0
C5	+2	+2	+2	+1	-1	+1	+1	+3	+2	+1	+2	+1
C6	+2	+2	+1	+2	-1	+2	+2	+2	+2	+2	+1	+1
C7	+1	+2	+1	0	-1	0	-3	-3	+2	-1	0	0
C8	+2	+2	0	-1	+1	0	0	+1	+2	+1	+1	+1
C 9	+2	+2	0	+2	+2	-1	-2	+1	+2	+1	-2	-1
C10	+2	+2	+2	+2	-2	+2	0	-1	+1	-1	-1	-2
C11	+2	0	+1	+2	0	-1	+2	+1	+2	+1	+2	+2

The consistently worst scoring parameters were:

 Delay – Most of the crossing scored badly for Delay as pedestrians had to wait for over a minute at a time for a pedestrian green phase. This resulted in pedestrians crossing the road as and when they identified a gap in the traffic, with some pedestrians running across the carriageway on seeing traffic approaching.

Crossing 7 has scored consistently low on various parameters as the crossing has no tactile paving provision or dropped kerbs and hence it is not apparent that a crossing is present. The signal post for the crossing is lost amongst other crossing infrastructure.



However, overall crossing provision was positive across the site with good quality and appropriate crossings provided for the environment and observed flows. The overall performance of crossings was good and all were well aligned to the desire lines.



3.5 Public Transport Waiting Areas

3.5.1 Public Transport Waiting Areas Overall Scores

Four bus stops were audited within the study area. Reference codes are used in this report and a full list of the codes can be found in Appendix A. All of the Public Transport Waiting Areas (PTWAs) were identified to be 'strategic'.

The number of PTWAs classified as red, amber or green is shown in Table 3-7.

Table 3-7: Total RAG scores for PTWAs

RAG rating	No. of PT Waiting Areas (% of total)
RED	2 (50%)
AMBER	2 (50%)
GREEN	0 (0%)

There is a mixed level of provision for PTWAs, with an equal number of red and amber ratings. Table 3-8 provides the numeric scores for the PTWAs and associated RAG rating.

Table 3-8: PTWA overall score and RAG Ratings

Ref	Name	Score & RAG
PT1	Southwark Street (towards Bricklayers Arms or Elephant & Castle)	-44
PT4	London Bridge Borough High Street (Stop Y)	-5
PT2	The Hop Exchange (towards Tower Bridge, Monument)	+43
PT3	The Hop Exchange (towards Old Tower or Waterloo)	+49

The table shows that:

- One PTWA scored negatively overall (-11 and lower)
- One PTWAs scored an average mark overall (-10 to +10)
- The remaining two PTWAs scored positively overall (+11 and higher)

The Overall Score RAG Rating is also shown in Figure 3-5 which details the location of PTWAs.





Figure 3-5: PTWA RAG ratings and overall score

3.5.2 Public Transport Waiting Areas Parameter Review

Figure 3-6 shows the parameter scores 'stacked' for each PTWA assessed within the audit area. Finally, Table 3-9 shows the ratings given to each of the studied parameters for the PTWAs to allow ease of reference and comparison, scores range from -3 to +3.



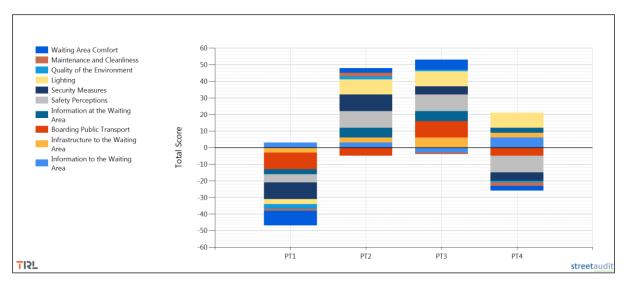


Figure 3-6: Parameter Scores for each PTWA

Table 3-9: Parameter RAG Ratings for PTWA

ID	Information to the Waiting Area	Infrastructure to the Waiting Area	Boarding Public Transport	Information at the Waiting Area	Safety Perceptions	Security Measures	Lighting	Quality of the Environment	Maintenance and Cleanliness	Waiting Area Comfort
PT1	0	-1	-2	-1	-1	-2	-1	-3	-1	-3
PT2	0	0	-1	+1	+1	+1	+2	+1	+1	0
PT3	-1	+1	+1	+1	+1	0	+2	0	-1	+1
PT4	+1	0	-1	0	-2	-1	+2	-1	-2	-1

The quality of the PTWAs varied between bus stops; there were few trends that can be generalised across the site.

- Boarding Public Transport three out of four bus stops received a negative rating as there were no raised kerbs. The buses generally stopped away from the footway, which meant pedestrians having to step down on the carriageway and then move on to the footway/waiting area. The Access/Egress point was obstructed at PT4, where buses usually stopped behind the bus stop waiting area, passengers had to squeeze and walk behind the glass panel before boarding the bus. At PT2, a parking bay was present right after the bus stop bay, which led to bus drivers stopping in the middle of the carriageway and hence the passengers having to board or egress from the bus via the carriageway.
- **Security measures** in general there was a lack of formal CCTV provision covering the bus stops.



- Maintenance and Cleanliness three out of four bus stops scored negatively on this parameter as there was littering around the waiting area, with some graffiti on the waiting area glass panels, with no visible attempt to clean the same.
- Quality of the environment this received mixed scores, a number of the bus stops are positioned very close to major roads which lowers the quality of the environment considerably through air and noise pollution.
- Waiting Area Comfort PT1 didn't have any bus stop waiting area. Additionally, the footway was quite busy with high pedestrian volumes, causing conflict between pedestrians and passengers waiting for the bus.



4 Recommendations

This section summarises our recommendations for improvements in the area based on the observations made by our audit team.

These observations are made from the perspective of improving pedestrian provision, TRL makes no comment as to how easily such remedial measures may be implemented or if they are cost efficient.

This section captures both headline recommendations for the short and long term future of the components audited and 'quick wins' which are aimed at easy short term improvements.

4.1 Link improvement recommendations

Table 4-1: Link Quick Wins

ID	Link Name	Quick Wins
L1	Borough High Street – South Side, west of St. Thomas Street	 Enhanced street cleaning along the link Remove litter and gum stains from the link
L2	Borough High Street – North Side, west of Southwark High St till Southwark War Memorial	 Enhanced street cleaning along the link Remove litter and gum stains from the link
L3	Borough High Street – connecting to Southwark Street	 Enhanced street cleaning along the link Remove litter and gum stains from the link
L4	Southwark Street – south side	 A-board and goods-on-footway enforcement to reduce obstructions Enhanced street cleaning along the link Remove litter and gum stains from the link
L5	Southwark Street – North Side, West of London Bridge Street	 Enhanced street cleaning along the link Remove litter and gum stains from the link
L6	King's Head Yard (Pedestrian link)	 Enhanced street cleaning along the link Remove litter and gum stains from the link
L7	White Hart Yard (Pedestrian link)	 Enhanced street cleaning along the link Remove litter and gum stains from the link Resurface footway along sections with trip hazards
L8	St. Thomas Street – west side	 Enhanced street cleaning along the link Install new tactile paving at side/access roads - correct colour and layout Remove litter and gum stains from the link



L9	St. Thomas Street – east side	 Enhanced street cleaning along the link Install new tactile paving at side/access roads - correct colour and layout Remove litter and gum stains from the link
L10	London Bridge Street – both sides	Enhanced street cleaning along the link
L11	Borough High Street, east side, between St. Thomas Street and Duke Hill Street (Tooley Street)	 Enhanced street cleaning along the link Remove litter and gum stains from the link Resurface footway along sections with trip hazards
L12	Borough High Street, between Duke Hill Street (Tooley Street) and The Queen's Walk	 Enhanced street cleaning along the link Remove litter and gum stains from the link Resurface footway along sections with trip hazards
L13	The Queen's Walk (Pedestrian link)	Enhanced street cleaning along the linkResurface footway along sections with trip hazards

Table 4-2: Link headline recommendations

ID	Short Term	Long Term
L1	• N/A	Widen footway and remove obstructions
L2	• N/A	Realign some street furniture which is a minor obstruction along the link
L3	Improve lighting maintenance	Widen footway
L4	• N/A	Improve frequency of lighting
L5	• N/A	Improve frequency of lighting
L6 & L7	Improve lighting maintenance	Improve footway width or implement a shared space.
L8	• N/A	 Widen footway – at western end of the link Improve frequency of lighting
L9	• N/A	• N/A
L10	• N/A	• N/A
L11	• N/A	Resurface footway with modern



ID	Short Term	Long Term
		materials.
L12	 Install tactile paving to warn of steps along the link 	• N/A
L13	• N/A	 Widen the footway where possible at pinch points.



4.2 Crossing improvement recommendations

Table 4-3: Crossing quick wins

ID	Crossing Name	Quick Wins
C1	Over Southwark Street	 Improve existing tactile paving so that it has correct colour and layout Remove litter and gum stains from the crossing
C2	Over Borough High Street	 Improve existing tactile paving so that it has correct colour and layout Remove litter and gum stains from the crossing
С3	Over Borough High Street (West Side from St. Thomas St to Bedale Street)	Install new tactile paving - correct colour and layout
C4	Over Bedale Street	 Remove litter and gum stains from the crossing Resurface crossing waiting areas with remove trip hazards
C6	Over Borough High Street (East Side from St. Thomas Street to Bedale Street)	Install new tactile paving - correct colour and layout
С7	Diagonal Crossing over Borough High Street from Barclays Bank to Borough Market Hall	 Highlight crossing area and markings Install new dropped kerbs that are flush and aligned Install new tactile paving - correct colour and layout
С8	Over Borough High Street (from Green Dragon Court to London Bridge Street)	Install new tactile paving - correct colour and layout
С9	Over London Bridge Street	 Improve existing dropped kerbs so that they are flush and aligned Improve existing tactile paving so that it has correct colour and layout Install new tactile paving - correct colour and layout Remove litter and gum stains from the crossing Resurface crossing area at sections with ponding Resurface crossing waiting areas with remove



		trip hazards
C10	Over Duke Hill Street (Tooley Street)	 Improve existing dropped kerbs so that they are flush and aligned Remove graffiti from infrastructure at the crossing Remove litter and gum stains from the crossing Resurface crossing waiting areas with remove trip hazards
C11	Lower end of St. Thomas Street	Highlight crossing area and markings

Table 4-4: Crossing headline recommendations

ID	Short Term	Long Term
C1	 Bin on Southwark Street is quite close to the rotating cone, should be relocated to provide greater separation Improve the colour contrast of tactile paving 	Change geometry of central refuge island to improve alignment of desire lines and increase capacity
C2	 Improve the colour contrast of tactile paving 	Improve alignment at the crossing;Increase capacity of the central refuge island
C3	• N/A	Signal phasing might be reviewed. Instead of having an all pedestrian phase with over 100 seconds of red; could a second green phase for pedestrians be included or the timings altered to reduce delay
C4	 Provide recessed service chamber cover with tactile paving inset 	Signal phasing might be reviewed. Instead of having an all pedestrian phase with over 100 seconds of red; could a second green phase be added for pedestrians be included or the timings altered to reduce delay
C5	Stud Markings should be repainted	 Signal phasing might be reviewed. Instead of having an all pedestrian phase with over 100 seconds of red; could a second green phase for pedestrians be included or the timings altered to reduce delay
C6	• N/A	Signal phasing might be reviewed. Instead of having an all pedestrian phase with over 100



ID		Short Term		Long Term
				seconds of red; could a second green phase for pedestrians be included or the timings altered to reduce delay.
С7	•	Crossing waiting area should be demarcated Provide rotating cones on push buttons	•	Signal phasing might be reviewed. Instead of having an all pedestrian phase with over 100 seconds of red; could a second green phase be included for pedestrians or the timings altered to reduce delay
C8	•	N/A	•	Increase capacity of central refuge area which has a depth of about 0.75 m. at present. If increasing depth is not possible, then it can be widened.
С9	•	N/A	•	Improve surface quality near kerbs to reduce ponding
C10	•	Maintenance required on footway – remove graffiti, clear the litter	•	Signal phasing should be reviewed to reduce the red time for pedestrians which at present is around 110 seconds.
	•	Repair broken footway tiles		
C11	•	N/A	•	Pedestrian green phase can be extended in time based on high pedestrian volumes and low traffic volumes observed on the day.

4.3 PTWA improvement recommendations

Table 4-5: PTWA quick wins

ID	PT Waiting Area Name	Quick Wins
PT1	Southwark Street (towards Bricklayers Arms or Elephant & Castle)	 Enhanced street cleaning around the waiting area Provide local area walking maps at waiting area Provide up-to-date bus timetable information at waiting area
PT2	The Hop Exchange (towards Tower Bridge, Monument)	 Provide local area walking maps at waiting area Remove graffiti from infrastructure at waiting area
РТ3	The Hop Exchange (towards Old Tower or Waterloo)	 Enhanced street cleaning around the waiting area Provide local area walking maps at waiting area Remove graffiti from infrastructure at waiting



			area
PT4	London Bridge Borough High Street (Stop Y)	•	Enhanced street cleaning around the waiting area Remove graffiti from infrastructure at waiting area

Table 4-6: PTWA headline recommendations

ID	Short Term	Long Term
	Provide a litter bin	Provide Shelter at the bus stop
PT1	Provide real time information at the waiting area	 Provide a formal crossing point close to the waiting area
	 Provide real time information at the waiting area 	 Provide a formal crossing point close to the waiting area
PT2	Provide litter bin near the bus shelter	 Consider moving the parking bay away from the bus stop bay to allow busses to fully align with the kerb.
РТ3	• N/A	Provide CCTV surveillance
PT4	Provide real time information at the waiting area	Provide CCTV surveillance
P14	Provide litter bin near the bus shelter	



Appendix A Component List

Component Code	Component Name
	Links
L1	Borough High Street – South Side, west of St. Thomas Street
L2	Borough High Street – North Side, west of Southwark High Street till
	Southwark War Memorial
L3	Borough High Street – connecting to Southwark Street
L4	Southwark Street – south side
L5	Southwark Street – North Side, West of London Bridge Street
L6	King's Head Yard (Pedestrian link)
L7	White Hart Yard (Pedestrian link)
L8	St. Thomas Street – west side
L9	St. Thomas Street – east side
L10	London Bridge Street – both sides
L11	Borough High street, east side, between St. Thomas Street and Duke Hill Street (Tooley Street)
L12	Borough High Street, between Duke Hill Street (Tooley Street) and The Queen's walk
L13	The Queen's Walk (Pedestrian link)
	Crossings
C1	Over Southwark Street
C2	Over Borough High Street
C3	Over Borough High Street (West Side from St. Thomas Street to Bedale Street)
C4	Over Bedale Street
C5	Over St. Thomas Street
C6	Over Borough High Street (East Side from St. Thomas Street to Bedale Street)
C7	Diagonal Crossing over Borough High Street from Barclays Bank to Borough Market Hall
C8	Over Borough High Street (from Green Dragon Court to London Bridge Street)
C9	Over London Bridge Street
C10	Over Duke Hill Street (Tooley Street)
C11	Lower end of St. Thomas Street
	PT Waiting Areas
PT1	Southwark Street
PT2	The Hop Exchange (towards Tower Bridge, Monument)
PT3	The Hop Exchange (towards Old Tower or Waterloo)
PT4	London Bridge Borough High Street (Stop Y)



Appendix B Audit Methodologies

B.1 PERS Audit Methodology

PERS is a street audit methodology, combining on-street assessments conducted by trained auditors with a software data analysis and graphical tool for presenting results. The PERS methodology provides a holistic and cost-effective way for reviewing all types of pedestrian space and identifying where improvements are most needed. A PERS review is based upon the following two key principles:

- That the quality of the pedestrian environment may be evaluated according to the degree to which it meets pedestrians' needs; and
- That in evaluating the degree to which pedestrians' needs are met by the environment, the objective should be to satisfy as many people as possible, with the 'standard' pedestrian being considered to be towards the vulnerable end of the spectrum such as pedestrians with mobility problems or sensory impairments.

PERS recognises the needs of pedestrians in both undertaking a journey on foot and as people using spaces in the public realm for leisure and non-transport based activities. PERS auditors consider the extent to which the environment under consideration provides easy, convenient and pleasant conditions for all users. The overall aim in applying PERS is to seek to provide an optimal pedestrian environment for all users.

More specifically, a PERS audit identifies various components that make up the pedestrian environment, which include:

- Links sections of footways and paths;
- Crossings both those formally provided and along points where people are seen to cross informally;
- Routes A way that links a trip origin and a trip destination, for example from a public transport interchange to a tourist attraction;
- Public Transport Waiting Areas (PTWAs)— such as bus stops and taxi ranks;
- Interchange Spaces outdoor spaces where pedestrians move between different transport modes.

Auditors assess and grade components within the pedestrian environment within each component type based on a standardised, evidence-based methodology. During the audit, the components are individually scored against a range of parameters. The scores for each parameter can be weighted and aggregated to give an overall RAG (Red, Amber, Green) rating for the component. Additionally, comments and photographs of the components are recorded for inclusion within the report.



B.2 Definition of the study area

The first key step in a PERS audit is to ensure that the boundary of the study area is clearly defined with any key objectives for the review of the study area established. The study area was defined and agreed with Transport Planning Practice ltd.

B.3 Desktop identification of links, crossings, routes and spaces

The second stage of the audit process is to use mapping to initially indicate the likely links, crossings, routes, public transport waiting areas, interchange spaces and public spaces in the audit area. This assists with referencing the site pre-audit and to evaluate the resources required for the audit. Such subdivision may need to be adapted and amended during the audit; however this initial preparation as a mapping exercise will assist on site particularly when multiple teams are auditing an area.

B.4 On-street evaluation

Having undertaken the necessary preparatory work in stages 1 and 2, the on-street audit can be undertaken. For each review framework, a review form is available for manual entry on street. Each framework consists of a number of parameters requiring evaluation.

Each review form requires the auditor to score and comment on each parameter which is summed to create an overall score for each link, crossing, route, waiting area or space. Parameters should be scored from -3 to +3, where +3 is the highest score and -3 the lowest. For a parameter to score +3 it would need to be exemplary and of a standard to be identified as best practice. O represents the average and N/A is used when a parameter is considered not relevant. The scores should reflect the level of service to the user with extensive comments made to support each score provided and to highlight key issues.



B.5 Parameter weightings

The PERS parameter weightings were developed on the basis of extensive research and as such are designed to best reflect pedestrian priorities within the streetscape environment. However, the methodology allows for the weighting factors applied to each parameter to be adjusted to allow for a more targeted assessment, in order to place emphasis on specific elements that are of relevance to a particular study or type of pedestrian or cycling environment. Default weightings have been used in the analysis of the PERS audit data collected on site. The default weightings are banded into the following categories:

Baseline: of general importance to all pedestrians (B)

High Significance: of particular importance to some pedestrians (H)

Critical: of major significance to a majority of pedestrians (C)

In the default settings, these groups are weighted at 1, 3 and 5 respectively for PERS, the weighting factor acting as a multiplier. Table B-1 shows the weighting bands for each PERS parameter.



Table B-1: weight bands and default weightings for each parameter

Link review			Crossing review			Route review		
Factor	Weight Band	Default Weighting	Factor	Weight Band	Default Weighting	Factor	Weight Band	Default Weighting
Effective Width	С	5	Crossing provisions	С	5	Directness	С	5
Dropped kerbs	Н	3	Deviation from the desire line	Н	3	Permeability	Н	3
Gradient	В	1	Performance	С	5	Road Safety	С	5
Obstructions	Н	3	Capacity	В	1	Personal Security	С	5
Permeability	Н	3	Delay	Н	3	Legibility	Н	3
Legibility	В	1	Legibility	В	1	Rest points	В	1
Lighting	Н	3	Legibility for sensory impaired people	Н	3	Quality of the environment	В	1
Tactile information	Н	3	Dropped kerbs	Н	3	Link and crossing audits	С	5
Colour contrast	Н	3	Gradient	В	1			
Personal security	С	5	Obstructions	В	1			
Surface quality	Н	3	Surface quality	Н	3			
User Conflict	С	5						
Quality of the environment	В	1						
Maintenance	В	1						
Public Transport Waiting areas	revie	w	Interchange space review			Public space review		
Factor	Weight Band	Default Weighting	Factor	Weight Band	Default Weighting	Factor	Weight Band	Default Weighting
Information to the waiting area	Н	3	Moving between modes	С	5	Moving in the space	С	5
Infrastructure to the waiting area	Н	3	Identifying where to go	Н	3	Interpreting the space	Н	3
Boarding public transport	С	5	Personal safety	С	5	Personal safety	С	5
Information at the waiting area	Н	3	Feeling comfortable	Н	3	Feeling comfortable	Н	3
Safety perceptions	С	5	Quality of the environment	В	1	Sense of place	Н	3
Security measures	С	5	Maintenance	В	1	Opportunity for activity	В	1
Lighting	Н	3	Link and crossing audits	С	5	Link and crossing audits	С	5
Quality of the environment	В	1	Route audits	С	5			
Maintenance and cleanliness	В	1	PT waiting area audits	С	5			
Waiting area comfort	Н	3						1



B.6 Strategic or local facility

As part of the PERS audit process consideration is given to whether the facility is of strategic or local importance within the pedestrian environment. For example, it may be considered appropriate to place greater strategic importance on a link or crossing on a High Street compared with a link on a residential road outside a main town centre. This designation is designed to assist in analysis, particularly when evaluating the gap between current performance and necessary performance.

This designation is distinct from the land-use surrounding it, for example a link that traverses a residential area may perform a strategic function if it functions as a main route to a public transport interchange; accordingly it may require higher levels of lighting etc. than would ordinarily be reasonably expected in a residential area.

The same review process is performed by the auditors and the same scoring system. However, the street audit software will weigh the strategic facility scores for each parameter at a lower banding to a local facility, which means that strategic facilities need to score higher to achieve an adequate overall assessment.

B.7 Overall performance and Red, Amber and Green Rating (RAG)

The PERS software rates the performance of a facility into three bands, colour coded as Red, Amber and Green (RAG). These performance bands are calculated for each individual review parameter and for the aggregate performance of a facility. Within a scheme, green represents good or very good provision, amber represents average provision with potentially some features that give cause for concern and red represents a facility or aspect that presents significant cause for concern. This relates to the scoring scale as detailed in Table B-3 for both local and strategic scores.

Strategic Point on **RAG Band Local Point on Scale RAG Band** Scale +3 Green +3 Green +2 Green +2 Green +1 Amber +1 Green 0 Amber 0 **Amber** -1 -1 Red Amber -2 -2 Red Red -3 -3 Red Red

Table B-3: RAG Bands for parameter

With regard to overall scores for a facility, the RAG system is applied to a percentage of the total achievable score, for example to attain a Green Rating for a strategic facility the score would need to be within 28% of the highest possible score, to obtain an Amber Rating the facility would need to score within the next 15% of the overall score and for a Red Rating the facility would score within the lowest 57% of the overall achievable score. Therefore, using this system for a strategic facility will result in some low positive scoring facilities attaining a Red Rating. The bands are detailed in Table B-4 for both local and strategic facilities.



Table B-4: RAG Bands for overall scores

Strategic RAG	RAG Band	Local RAG	RAG Band
Percentage		Percentage	
Highest 28%	Green	Highest 42%	Green
15%	Amber	28%	Amber
Lowest 57%	Red	Lowest 30%	Red

London Bridge, PERS Assessment



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Appendix B

Collision and accident report



Date: 07 NOV 2018 14:06 Stick Diagram

Page: 1 of 1 (summary)



Borough High Street j/w Duke Street Hill & St Thomas Street GIS Area Collisions: 3Y to 28 Feb 2018 (provisional)

Summary of Accidents Selected

Site Reference and Description (zero accident counts shown in bold)	Date Period	Accidents
MD01 NODE 296 (BOROUGH HIGH STREET/DUKE STREET HILL)	36 MTS TO FEB-2018	17
MD02 GIS AREA B08_StThomas_St (P)	36 MTS TO FEB-2018	38

The description of how the accident occurred and the contributory factors are the reporting officer's opinion at the time of reporting and may not be the result of extensive investigation

Stick Diagram

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MD01 NODE 296 (BO	ROUGH HIGH STE	REET/DUKE STRE	ET HILL)					36 M	S TO FEB-2018 S	ORTED BY DATI
	1	2	3	4	5	6	7	8	9	10
Accident Reference	0115MM70481	0115CP00257	0115MM70688	0115MM70869	0115MM70991	0116MM70246	48160097955	0116MM70721	01160026377	01160028110
Day	WEDNESDAY	WEDNESDAY	FRIDAY	SATURDAY	THURSDAY	FRIDAY	FRIDAY	SATURDAY	MONDAY	THURSDAY
Date	01/04/2015	01/07/2015	10/07/2015	12/09/2015	19/11/2015	29/01/2016	22/07/2016	23/07/2016	10/10/2016	20/10/2016
Time	18:00	06:15	17:45	20:00	16:45	12:32	19:00	01:32	19:50	21:55
Light Conditions	LIGHT	LIGHT	LIGHT	DARK	LIGHT	LIGHT	LIGHT	DARK	DARK	DARK
Road Surface	DRY	DRY	DRY	DRY	DRY	DRY	DRY	DRY	DRY	DRY
Severity	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT
Conflict										
Pedestrian Location	0					X	50M			X
Contributory	405 V001 A	999 C001 A	405 V001 A	405 V002 A	405 V002 A	405 V001 B	801 C002 A	406 V002 A		802 C001 A
Factors	802 C001 A		904 V001 B	602 V002 A		802 C002 A	802 C002 A			806 C001 A
(* denotes pre 2005)	808 C001 A					808 C002 A	803 C002 A			
Easting/Northing	532780 180310	532770 180340	532790 180300	532770 180300	532770 180320	532780 180310	532780 180320	532770 180300	532775 180326	532770 180310

Pedestrian	6	35 %
Wet	4	24 %
Dark	5	29 %

Severity / Months To	12 02/2016	12 02/2017	12 02/2018	Total	Pct
Fatal	0	0	0	0	0.0 %
Serious	0	0	0	0	0.0 %
Slight	6	6	5	17	100.0 %
Total	6	6	5	17	
Pct	35.3 %	35.3 %	29.4 %		



Stick Diagram

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MD01 NODE 296 (BOI	ROUGH HIGH STE	REET/DUKE STRE	ET HILL)					36 MTS TO FEB-2018 SORTED BY DATE
	11	12	13	14	15	16	17	
Accident Reference	48160127395	01160006204	48170227053	48170225351	01170060209	01170079377	48170261365	
Day	SATURDAY	SATURDAY	FRIDAY	WEDNESDAY	THURSDAY	WEDNESDAY	WEDNESDAY	
Date	05/11/2016	10/12/2016	25/08/2017	30/08/2017	21/09/2017	20/12/2017	20/12/2017	
Time	15:35	14:40	15:30	15:28	17:40	18:00	18:00	
Light Conditions	LIGHT	LIGHT	LIGHT	LIGHT	LIGHT	DARK	LIGHT	
Road Surface	DRY	WET	DRY	WET	WET	WET	DRY	
Severity	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	
Conflict								
Pedestrian Location	50M			X				
Contributory	405 V001 B	808 C001 B	602 V002 B	804 C001 A	801 U00C A		301 V001 B	
Factors (* denotes pre 2005)	805 C001 A 808 C001 A			601 V001 B 602 V001 B				
(808 C001 A			602 V001 B				
Easting/Northing	532770 180320	532767 180308	532770 180330	532780 180320	532790 180310	532767 180309	532780 180340	
Lasting/Northing	332110 100320	332707 100306	332110 100330	332700 100320	332190 100310	332707 100309	332700 100340	

Stick Diagram

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MD02 GIS AREA B08_	_StThomas_St (P)							36 M	TS TO FEB-2018 S	ORTED BY DATE
	1	2	3	4	5	6	7	8	9	10
Accident Reference	0115MM70276	0115MM70357	0115MM70389	0115MM70545	0115MM70540	0115MM79019	0115MM79021	0115MM71135	0115MM70980	0115MM70989
Day	FRIDAY	SATURDAY	TUESDAY	FRIDAY	FRIDAY	FRIDAY	FRIDAY	WEDNESDAY	THURSDAY	FRIDAY
Date	03/04/2015	25/04/2015	28/04/2015	19/06/2015	03/07/2015	18/09/2015	25/09/2015	07/10/2015	22/10/2015	27/11/2015
Time	13:15	12:23	10:15	12:00	10:20	10:56	08:51	11:25	19:20	17:03
Light Conditions	LIGHT	LIGHT	LIGHT	LIGHT	LIGHT	LIGHT	LIGHT	LIGHT	DARK	DARK
Road Surface	DRY	DRY	DRY	DRY	DRY	DRY	DRY	DRY	DRY	DRY
Severity	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SERIOUS	SLIGHT	SLIGHT	SLIGHT
Conflict										
Pedestrian Location						50M	50M			50M
Contributory Factors (* denotes pre 2005)	405 V001 A 602 V001 A 710 V001 A 602 V002 A	405 V001 A 403 V001 A	405 V001 A 403 V001 A 109 V001 A	405 V002 A 308 V002 A	405 V002 A 403 V002 A	808 C001 A 802 C001 A	801 C001 A 802 C001 A	306 V001 B 406 V001 A 505 V001 B	403 V001 B 406 V002 B 407 V002 A 507 V001 B	802 C001 A 808 C001 A
Easting/Northing	532590 180070	532680 180200	532700 180210	532650 180160	532720 180250	532700 180220	532540 180140	532690 180200	532690 180200	532630 180160

Pedestrian	12	32 %
Wet	5	13 %
Dark	11	29 %

Severity / Months To	12 02/2016	12 02/2017	12 02/2018	Total	Pct
Fatal	0	0	0	0	0.0 %
Serious	1	1	2	4	10.5 %
Slight	12	5	17	34	89.5 %
Total	13	6	19	38	
Pct	34.2 %	15.8 %	50.0 %		



Stick Diagram

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MD02 GIS AREA B08_	_StThomas_St (P)							36 M ⁻	TS TO FEB-2018 S	ORTED BY DATE
	11	12	13	14	15	16	17	18	19	20
Accident Reference	0116MM70288	0116MM70500	0116MM70329	0116MM71007	0116MM70746	01160001265	01160002476	01170017993	01170018603	01170022058
Day	FRIDAY	WEDNESDAY	THURSDAY	FRIDAY	MONDAY	FRIDAY	SUNDAY	MONDAY	WEDNESDAY	WEDNESDAY
Date	01/01/2016	13/01/2016	14/01/2016	12/08/2016	22/08/2016	11/11/2016	20/11/2016	13/02/2017	15/02/2017	01/03/2017
Time	05:30	22:15	17:55	18:12	11:41	04:05	00:01	08:10	07:35	13:20
Light Conditions	DARK	DARK	LIGHT	LIGHT	LIGHT	DARK	DARK	LIGHT	LIGHT	LIGHT
Road Surface	DRY	DRY	DRY	DRY	DRY	DRY	WET	DRY	WET	DRY
Severity	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SERIOUS	SERIOUS
Conflict										
Pedestrian Location				0			0			0
Contributory Factors (* denotes pre 2005)	405 V002 A 602 V002 A	405 V002 A 407 V002 A	308 V001 A 408 V002 A		301 V002 A 602 V002 A	405 V002 B 602 V002 B	802 C001 A	405 V001 B 405 V002 B	403 V001 B 701 V001 A	802 C001 A 803 C001 A
Easting/Northing	532710 180190	532740 180170	532690 180200	532630 180130	532690 180200	532730 180250	532570 180150	532697 180201	532650 180150	532580 180070

Stick Diagram

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MD02 GIS AREA B08_	_StThomas_St (P)							36 M ⁻	TS TO FEB-2018 S	ORTED BY DATE
	21	22	23	24	25	26	27	28	29	30
Accident Reference	01170025409	01170027240	01170027737	01170030957	01170031393	01170036898	01170046571	01170051689	01170052282	01170064585
Day	WEDNESDAY	FRIDAY	FRIDAY	FRIDAY	MONDAY	FRIDAY	WEDNESDAY	WEDNESDAY	SUNDAY	SUNDAY
Date	15/03/2017	17/03/2017	24/03/2017	07/04/2017	10/04/2017	12/05/2017	05/07/2017	02/08/2017	06/08/2017	15/10/2017
Time	12:00	10:16	09:15	12:16	07:45	05:10	00:35	09:30	04:40	18:35
Light Conditions	LIGHT	LIGHT	LIGHT	LIGHT	LIGHT	LIGHT	DARK	LIGHT	LIGHT	DARK
Road Surface	DRY	DRY	DRY	DRY	DRY	WET	DRY	DRY	DRY	DRY
Severity	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT
Conflict										
Pedestrian Location					0		X			
Contributory	405 V002 A		301 V002 B	701 V001 A	307 V001 B	405 V002 A	802 C001 A	405 V002 B	403 V002 B	406 V001 A
Factors (* denotes pre 2005)			405 V002 B		999 V001 B	406 V002 A	806 C001 A 809 C001 B		509 V002 B 410 V002 B	
(,							809 C001 B		410 V002 B	
Faction (No. of this of	F00047 4004F0	500040 400450	F20720 4000F0	F00000 400400	F20500 400450	F20000 400440	F220F0 4004C0	500540 400440	F20F70 4000F0	520500 400440
Easting/Northing	532647 180159	532640 180150	532730 180250	532660 180160	532580 180150	532620 180149	532650 180160	532540 180140	532570 180050	532560 180140

Stick Diagram

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MD02 GIS AREA B08_	_StThomas_St (P)							36 M
	31	32	33	34	35	36	37	38
Accident Reference	01170064815	01170066485	01170067139	01170069779	01170072894	01170078445	01180082943	01180092193
Day	TUESDAY	WEDNESDAY	MONDAY	MONDAY	FRIDAY	SATURDAY	THURSDAY	FRIDAY
Date	17/10/2017	25/10/2017	30/10/2017	13/11/2017	24/11/2017	16/12/2017	11/01/2018	23/02/2018
Time	10:19	16:40	09:20	15:45	07:15	17:33	09:56	16:45
Light Conditions	LIGHT	LIGHT	LIGHT	DARK	DARK	DARK	LIGHT	LIGHT
Road Surface	DRY	DRY	DRY	DRY	DRY	WET	WET	DRY
Severity	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SLIGHT	SERIOUS	SLIGHT	SLIGHT
Conflict								
Pedestrian Location	X				50M	0	0	
Contributory	803 C001 B	410 V002 A	404 V001 B	405 V001 A	601 V001 B	802 C001 A		305 V002 A
Factors	000 0001 B	10 7002 7	308 V002 B	405 V002 A	307 V001 B	809 C001 A		710 V002 A
(* denotes pre 2005)				406 V002 A		808 C001 A		
Easting/Northing	532690 180200	532610 180150	532680 180190	532570 180040	532590 180080	532570 180050	532720 180190	532690 180200

Page: 1 of 1 (summary)



Borough High Street j/w Duke Street Hill & St Thomas Street GIS Area Collisions: 3Y to 28 Feb 2018 (provisional)

Summary of Accidents Selected							
Site Reference and Description (zero accident counts shown in bold)	Date Period	Accidents					
MD01 NODE 296 (BOROUGH HIGH STREET/DUKE STREET HILL)	36 MTS TO FEB-2018	17					
MD02 GIS AREA B08_StThomas_St (P)	36 MTS TO FEB-2018	38					

The description of how the accident occurred and the contributory factors are the reporting officer's opinion at the time of reporting and may not be the result of extensive investigation

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MD01 NODE 296 (BOROUGH HIGH STREET/DUKE STREET HILL)				36 MTS T	O FEB-2018 SORTED BY DAT
1 0115MM70481 WED 01/04/15 18:00 LIGHT DUKE STREET HILL J/W BO	ROUGH HIGH STREET			08 NODE 296	532780 / 180310
POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CV V1 TURNED LEFT AND COLLIDED WITH PED IN CARRIAGEWAY	NY CROSSROADS A	JTO SIG	PEDN PHASE AT ATS		
CASUALTY 001 (001) (54 Yrs - F SW16) SLIGHT PEDESTRIAN		UI	NKNOWN		
VEHICLE 001 (000) PEDAL CYCLE (42 Yrs - M DA5) BT - NOT APPLICABLE	TURNING LEFT	N TO SE FRONT HI	T FIRST		JCT CLEARED
V001 A 405 (FAILED TO LOOK PROPERLY) C001 A 808 (CARELESS/RECKLESS/IN A HURRY)	C001 A	802 (FAILED TO	LOOK PROPERLY)		
2 0115CP00257 WED 01/07/15 06:15 LIGHT BOROUGH HIGH STREET J/	W TOOLEY STREET			08 NODE 296	532770 / 180340
POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CV PASSENGER CASUALTY TRIPS WHILE BOARDING BUS - [TRIPPED WHILST E		JTO SIG	PEDN PHASE AT ATS		
CASUALTY 001 (001) (49 Yrs - F SE17) SLIGHT PASSENGER	BOARDING PSV				
VEHICLE 001 (000) BUS/COACH (52 Yrs - M ME1) BT - NEGATIVE	PARKED	P TO P DID NOT II	JNY PART OF WORK MPACT		JCT CLEARED
C001 A 999 (OTHER FACTOR)			BUS L	ANE	
3 0115MM70688 FRI 10/07/15 17:45 LIGHT DUKE ST HILL J/W KING WIL	LIAM ST			08 NODE 296	532790 / 180300
POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CV PASSENGER OF V1 OPENED DOOR AND HIT PASSING V2	NY T/STAG JUN A	JTO SIG	PEDN PHASE AT ATS		
CASUALTY 001 (002) (37 Yrs - M SE15) SLIGHT DRIVER/RIDER					
VEHICLE 001 (002) TAXI (41 Yrs - M E10) BT - NEGATIVE	PARKED	P TO P O/S HIT FI	JNY PART OF WORK RST		JCT CLEARED
VEHICLE 002 (001) PEDAL CYCLE (37 Yrs - M SE15) BT - NOT APPLICABLE	OVERTAKE STAT VEH O	/S W TO E FRONT HI	T FIRST		JCT CLEARED
2	HIT OPEN DOOR				
V001 A 405 (FAILED TO LOOK PROPERLY)	V001 B	904 (VEHICLE D	OOR OPENED OR CLOSED	NEGLIGENTLY)	

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MD01 NODE 296 (BOROUGH HIGH STREET/DUKE STREET HILL)				36 MTS T	O FEB-2018	SORTED BY DAT
0115MM70869 SAT 12/09/15 20:00 DARK BOROUGH HIGH STREET J/M	/ DUKE STREET HILL			08 NODE 296		532770 / 180300
OLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CW	Y T/STAG JUN AU	ΓO SIG	PEDN PHASE AT ATS			
2 HAS TURNED RIGHT ACROSS THE PATH OF ONCOMING V1						
CASUALTY 001 (001) (37 Yrs - M SW16) SLIGHT DRIVER/RIDER						
/EHICLE 001 (002) PEDAL CYCLE (37 Yrs - M SW16)	GOING AHEAD OTHER	NTOS			JCT MID	
BT - NOT APPLICABLE		BACK HIT F	TRST			
/EHICLE 002 (001) CAR (52 Yrs - M CO2)	TURNING RIGHT	STOE			JCT MID	
BT - NEGATIVE		FRONT HIT	FIRST			
002 A 405 (FAILED TO LOOK PROPERLY)	V002 A 60)2 (CARELESS/	RECKLESS/IN A HURRY)			
0115MM70991 THU 19/11/15 16:45 LIGHT BOROUGH HIGH STREET J.W.	/ DUKE STREET HILL			08 NODE 296		532770 / 180320
OLICE - OVER COU ROAD-DRY WEATHER-FINE DUAL CWY	T/STAG JUN AU	ΓO SIG	PEDN PHASE AT ATS			
2 TURNED LEFT AND REAR SWUNG OUT AND COLLIDED WITH STAT V1						
CASUALTY 001 (001) (48 Yrs - M SE13) SLIGHT DRIVER/RIDER						
/EHICLE 001 (002) M/C > 500CC (48 Yrs - M SE13)	GOING AHEAD HELD UP	N TO S			JCT MID	
BT - DRV NOT CONTACTED		N/S HIT FIR	ST			
/EHICLE 002 (001) BUS/COACH (? Yrs - M UNKN)	TURNING LEFT	N TO SE			JCT MID	
BT - DRV NOT CONTACTED		O/S HIT FIR	ST			
002 A 405 (FAILED TO LOOK PROPERLY)						
0116MM70246 FRI 29/01/16 12:32 LIGHT DUKE STREET HILL J/W BOR	OUGH HIGH STREET			08 NODE 296		532780 / 180310
	Y T/STAG JUN AU	ro sig	PEDN PHASE AT ATS			
ED STEPPED OUT INTO THE PATH OF V1						
CASUALTY 001 (001) (34 Yrs - M NN6) SLIGHT DRIVER/RIDER						
CASUALTY 002 (001) (53 Yrs - M SE17) SLIGHT PEDESTRIAN	CROSSING ROAD ON PED		BOUND FROM DRIVER	S N/SIDE		
/EHICLE 001 (000) M/C 50-125CC (34 Yrs - M NN6) BT - NEGATIVE	TURNING LEFT	N TO E FRONT HIT	FIRST		JCT MID	
001 B 405 (FAILED TO LOOK PROPERLY)	C002 A 8	02 (FAILED TO	LOOK PROPERLY)			
002 A 808 (CARELESS/RECKLESS/IN A HURRY)						

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MD01 NODE 296 (BOROUGH HIGH STREET/DUKE STREET HILL)	1000		36 MTS TO FEB-201	
7 48160097955 FRI 22/07/16 19:00 LIGHT LONDON BRIDGE A3 TOOLEY STREET A			08 NODE 296	532780 / 180320
POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CWY T/STA	AG JUN AUTO SIG	PEDN PHASE AT ATS		
PED CAS CROSSES ROAD INFRONT OF STATIONARY BUS AND INTO PATH OF VEH 1				
CASUALTY 001 (001) (24 Yrs - M SE15) SLIGHT DRIVER/RIDER	LO DOAD WITHIN FOM VI	NO W POLINIP FROM PRIVERO	NODE	
, , , , , , , , , , , , , , , , , , , ,		NG W BOUND FROM DRIVERS		
VEHICLE 001 (000) PEDAL CYCLE (24 Yrs - M SE15) OVERTA BT - NOT APPLICABLE	KE STAT VEH O/S N T FRO	OS COMM TO/FROM WOR ONT HIT FIRST	K JCT APP	
C002 A 801 (CROSSED ROAD MASKED BY STATIONARY OR PARKED VEHICLE)	C002 A 802 (FAIL	.ED TO LOOK PROPERLY)		
C002 A 803 (FAILED TO JUDGE VEHICLE'S PATH OR SPEED)				
8 0116MM70721 SAT 23/07/16 01:32 DARK BOROUGH HIGH ST J/W DUKE HILL ST			08 NODE 296	532770 / 180300
POLICE - OVER COU ROAD-DRY WEATHER-FINE DUAL CWY T/STA	AG JUN AUTO SIG	PEDN PHASE AT ATS		
V2 HIT REAR OF V1 AT RED ATS				
CASUALTY 001 (001) (59 Yrs - M EN1) SLIGHT DRIVER/RIDER				
(**) ** (**)	HEAD OTHER S TO		JCT MID	
BT - NEGATIVE SKID/OVER	BAC	CK HIT FIRST		
VEHICLE 002 (001) CAR (? Yrs - M UNKN) GOING A	HEAD OTHER ST	ON	JCT MID	
BT - DRV NOT CONTACTED	FRO	ONT HIT FIRST		
V002 A 406 (FAILED TO JUDGE OTHER PERSON'S PATH OR SPEED)				
9 01160026377 MON 10/10/16 19:50 DARK TOOLEY STREET J/W LONDON BRIDGE			08 NODE 296	532775 / 180326
SELF COMPLETION ROAD-DRY WEATHER-FINE SINGLE CWY CROS		PEDN PHASE AT ATS		
PASSENGER IN V2 HAS OPENED CAR DOOR ONTO PATH OF ONCOMING CYCLIST CAUS	SING COLLISION.			
CASUALTY 001 (001) (45 Yrs - M KT2) SLIGHT DRIVER/RIDER				
VEHICLE 001 (000) M/C 50-125CC (45 Yrs - M KT2) OVERTA	KING NEARSIDE N T	OS	JCT APP	
BT - DRV NOT CONTACTED OVERTURN		ONT HIT FIRST		
HIT OPEI				
,	NHEAD HELD UP N T		JCT APP	
BT - DRV NOT CONTACTED	N/S	HIT FIRST		

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MD01 NODE 296 (BOROUGH HIGH STREET/DUKE STREET HILL)			36 MTS T	O FEB-2018 SORTED BY DATE
10 01160028110 THU 20/10/16 21:55 DARK TOOLEY STREET J/W BOROU	IGH HIGH STREET		08 NODE 296	532770 / 180310
POLICE - AT SCENE ROAD-DRY WEATHER-FINE DUAL CWY	CROSSROADS AUTO	SIG PEDN PHASE AT	ATS	
PEDESTRIAN HAS STEPPED OUT INTO PATH OF V1 AS IT'S MOVED OFF FROM	ΛATS.			
CASUALTY 001 (001) (21 Yrs - F SE13) SLIGHT PEDESTRIAN	CROSSING ROAD ON PED X	ING N BOUND FROM DRI	/ERS N/SIDE	
VEHICLE 001 (000) CAR (46 Yrs - M SE2)	MOVING OFF	E TO W COMM TO/FROM	WORK	JCT MID
BT - NEGATIVE		FRONT HIT FIRST		
C001 A 802 (FAILED TO LOOK PROPERLY)	C001 A 806	(IMPAIRED BY ALCOHOL)		
AA AAACAA 27205 CAT OSIAA IACA 525 LIGUT LONDON DDIDGE IAM DUIKE C	YTDEET LIII I		00 NODE 000	F22770 / 400200
11 48160127395 SAT 05/11/16 15:35 LIGHT LONDON BRIDGE J/W DUKE S POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CWY		SIG PEDN PHASE AT A	08 NODE 296	532770 / 180320
PED CAS RUNS INTO ROAD INFRONT OF VEH 1 (BUS)	f 1/STAG JUN AUTO	SIG PEDIN PHASE AT	415	
` ,		NAVINO E DOUND EDOMADO	(EDO NIOIDE	
CASUALTY 001 (001) (42 Yrs - F X-UK) SLIGHT PEDESTRIAN		M XING E BOUND FROM DRI		
VEHICLE 001 (000) BUS/COACH (54 Yrs - M SE27)	MOVING OFF	S TO N JNY PART OF WC	RK	JCT CLEARED
BT - NOT REQUESTED		FRONT HIT FIRST		
VOOA D 405 (FAILED TO LOOK DRODERLY)	C004 A 805	(DANICEDOLIS ACTION IN CARRI		· · ·
V001 B 405 (FAILED TO LOOK PROPERLY)	C001 A 805	(DANGEROUS ACTION IN CARRIA	GEWAY (EG PLAYING)))
C001 A 808 (CARELESS/RECKLESS/IN A HURRY)				
12 01160006204 SAT 10/12/16 14:40 LIGHT LONDON BRIDGE J/W TOOLE	Y STREET		08 NODE 296	532767 / 180308
POLICE - AT SCENE ROAD-WET RAINING SINGLE CWY	Y MULTI JUN AUTO	SIG PEDN PHASE AT	ATS	
NOT KNOWN HOW COLLISION OCCURRED				
CASUALTY 001 (001) (68 Yrs - F NN17) SLIGHT PASSENGER	STANDING ON PSV			
VEHICLE 001 (000) BUS/COACH (36 Yrs - M SE15)	OVERTAKING NEARSIDE	N TO SE JNY PART OF WO	RK	ENTERING MAIN RD
BT - NOT REQUESTED		DID NOT IMPACT		
			BUS LANE	
C001 B 808 (CARELESS/RECKLESS/IN A HURRY)				

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MD01 NODE 296 (BOROUGH HIGH STREET/DUKE STREET HILL)				36 MTS 1	TO FEB-2018 SORTED BY D
3 48170227053 FRI 25/08/17 15:30 LIGHT LONDON BRIDGE A3 J	/W TOOLEY STREET			08 NODE 296	532770 / 1803
OLICE - AT SCENE ROAD-DRY WEATHER-FINE SING	LE CWY T/STAG JUN AU	JTO SIG	PEDN PHASE AT ATS		
EH 2 CUTS INFRONT OF VEH 1 CAUSING VEH 1 TO BRAKE HEAVILY A	ND PASSENGERS TO HURT THEM	MSELVES			
CASUALTY 001 (001) (34 Yrs - F UNKN) SLIGHT PASSENGER	SEATED ON PSV				
CASUALTY 002 (001) (2 Yrs - M UNKN) SLIGHT PASSENGER	SEATED ON PSV				
CASUALTY 003 (001) (48 Yrs - M UNKN) SLIGHT PASSENGER	SEATED ON PSV				
/EHICLE 001 (000) BUS/COACH (23 Yrs - M UNKN)	MOVING OFF	STON	JNY PART OF WORK		JCT CLEARED
BT - NOT REQUESTED		DID NOT IN	MPACT		
'EHICLE 002 (000) GDS =< 3.5T (99 Yrs - U UNKN) BT - NOT REQUESTED	CHANGE LANE TO LEFT	S TO N DID NOT IN	JNY PART OF WORK		JCT CLEARED
BI - NOT REQUESTED		יוו ויטאו טוט	VIFACI		
000 B 000 (0ABELE00/BEO//LE00/IN A LILIBBY)					
UUZ B 602 (CARELESS/RECKLESS/IN A HURRY)					
002 B 602 (CARELESS/RECKLESS/IN A HURRY)					
002 B 602 (CARELESS/RECKLESS/IN A HURRY) 4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL J/	W LONDON BRIDGE A3			08 NODE 296	532780 / 1803
4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL JA		JTO SIG	PEDN PHASE AT ATS		532780 / 1803
4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL JA		JTO SIG	PEDN PHASE AT ATS		532780 / 1803
4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL JA OLICE - AT SCENE ROAD-WET WEATHER-FINE SING	LE CWY T/STAG JUN AU		PEDN PHASE AT ATS		532780 / 1803
4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL JA OLICE - AT SCENE ROAD-WET WEATHER-FINE SING ED CAS CROSSES INFRONT OF VEH 1 CASUALTY 001 (001) (69 Yrs - M UNKN) SLIGHT PEDESTRIAN	LE CWY T/STAG JUN AU			S N/SIDE	532780 / 1803 JCT CLEARED
4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL JA OLICE - AT SCENE ROAD-WET WEATHER-FINE SING ED CAS CROSSES INFRONT OF VEH 1 CASUALTY 001 (001) (69 Yrs - M UNKN) SLIGHT PEDESTRIAN	LE CWY T/STAG JUN AU	D XING N	BOUND FROM DRIVER JNY PART OF WORK	S N/SIDE	
4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL JA OLICE - AT SCENE ROAD-WET WEATHER-FINE SING ED CAS CROSSES INFRONT OF VEH 1 CASUALTY 001 (001) (69 Yrs - M UNKN) SLIGHT PEDESTRIAN /EHICLE 001 (000) PEDAL CYCLE (40 Yrs - M UNKN) BT - NOT APPLICABLE	LE CWY T/STAG JUN AU CROSSING ROAD ON PEI GOING AHEAD OTHER	D XING N W TO E FRONT HIT	BOUND FROM DRIVER JNY PART OF WORK T FIRST	S N/SIDE	
4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL JA OLICE - AT SCENE ROAD-WET WEATHER-FINE SING ED CAS CROSSES INFRONT OF VEH 1 CASUALTY 001 (001) (69 Yrs - M UNKN) SLIGHT PEDESTRIAN (EHICLE 001 (000) PEDAL CYCLE (40 Yrs - M UNKN) BT - NOT APPLICABLE	LE CWY T/STAG JUN AU CROSSING ROAD ON PEI GOING AHEAD OTHER	D XING N W TO E	BOUND FROM DRIVER JNY PART OF WORK T FIRST	S N/SIDE	
4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL JA OLICE - AT SCENE ROAD-WET WEATHER-FINE SING ED CAS CROSSES INFRONT OF VEH 1 CASUALTY 001 (001) (69 Yrs - M UNKN) SLIGHT PEDESTRIAN VEHICLE 001 (000) PEDAL CYCLE (40 Yrs - M UNKN) BT - NOT APPLICABLE	LE CWY T/STAG JUN AU CROSSING ROAD ON PEI GOING AHEAD OTHER	D XING N W TO E FRONT HIT	BOUND FROM DRIVER JNY PART OF WORK T FIRST	S N/SIDE	
4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL JA OLICE - AT SCENE ROAD-WET WEATHER-FINE SING ED CAS CROSSES INFRONT OF VEH 1 CASUALTY 001 (001) (69 Yrs - M UNKN) SLIGHT PEDESTRIAN /EHICLE 001 (000) PEDAL CYCLE (40 Yrs - M UNKN)	ELE CWY T/STAG JUN AU CROSSING ROAD ON PEI GOING AHEAD OTHER V001 B 6	D XING N W TO E FRONT HIT	BOUND FROM DRIVER JNY PART OF WORK T FIRST	S N/SIDE	
4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL JA OLICE - AT SCENE ROAD-WET WEATHER-FINE SING ED CAS CROSSES INFRONT OF VEH 1 CASUALTY 001 (001) (69 Yrs - M UNKN) SLIGHT PEDESTRIAN (EHICLE 001 (000) PEDAL CYCLE (40 Yrs - M UNKN) BT - NOT APPLICABLE 001 A 804 (WRONG USE OF PEDESTRIAN CROSSING FACILITY) 001 B 602 (CARELESS/RECKLESS/IN A HURRY) 5 01170060209 THU 21/09/17 17:40 LIGHT TOOLEY STREET J/W	CROSSING ROAD ON PEI GOING AHEAD OTHER V001 B 6	D XING N W TO E FRONT HIT	BOUND FROM DRIVER JNY PART OF WORK T FIRST	S N/SIDE 08 NODE 296	JCT CLEARED
4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL JA OLICE - AT SCENE ROAD-WET WEATHER-FINE SING ED CAS CROSSES INFRONT OF VEH 1 CASUALTY 001 (001) (69 Yrs - M UNKN) SLIGHT PEDESTRIAN (EHICLE 001 (000) PEDAL CYCLE (40 Yrs - M UNKN) BT - NOT APPLICABLE 001 A 804 (WRONG USE OF PEDESTRIAN CROSSING FACILITY) 001 B 602 (CARELESS/RECKLESS/IN A HURRY) 5 01170060209 THU 21/09/17 17:40 LIGHT TOOLEY STREET JAW OLICE - AT SCENE ROAD-WET RAINING DUAL	CROSSING ROAD ON PEI GOING AHEAD OTHER V001 B 6	D XING N W TO E FRONT HIT	BOUND FROM DRIVER JNY PART OF WORK T FIRST VE DRIVING)	S N/SIDE 08 NODE 296	JCT CLEARED
4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL JA OLICE - AT SCENE ROAD-WET WEATHER-FINE SING ED CAS CROSSES INFRONT OF VEH 1 CASUALTY 001 (001) (69 Yrs - M UNKN) SLIGHT PEDESTRIAN //EHICLE 001 (000) PEDAL CYCLE (40 Yrs - M UNKN) BT - NOT APPLICABLE //O01 A 804 (WRONG USE OF PEDESTRIAN CROSSING FACILITY) //O01 B 602 (CARELESS/RECKLESS/IN A HURRY)	CROSSING ROAD ON PEI GOING AHEAD OTHER V001 B 6 LONDON BRIDGE CWY OTHER JUN AL	D XING N W TO E FRONT HIT	BOUND FROM DRIVER JNY PART OF WORK T FIRST VE DRIVING)	S N/SIDE 08 NODE 296	JCT CLEARED
4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL JACOLICE - AT SCENE ROAD-WET WEATHER-FINE SING ED CAS CROSSES INFRONT OF VEH 1 CASUALTY 001 (001) (69 Yrs - M UNKN) SLIGHT PEDESTRIAN FEHICLE 001 (000) PEDAL CYCLE (40 Yrs - M UNKN) BT - NOT APPLICABLE 001 A 804 (WRONG USE OF PEDESTRIAN CROSSING FACILITY) 001 B 602 (CARELESS/RECKLESS/IN A HURRY) 5 01170060209 THU 21/09/17 17:40 LIGHT TOOLEY STREET JACOLICE - AT SCENE ROAD-WET RAINING DUAL OT KNOWN HOW COLLISION OCCURRED	CROSSING ROAD ON PEI GOING AHEAD OTHER V001 B 6 LONDON BRIDGE CWY OTHER JUN AL	D XING N W TO E FRONT HIT	BOUND FROM DRIVER JNY PART OF WORK T FIRST VE DRIVING)	S N/SIDE 08 NODE 296	JCT CLEARED
4 48170225351 WED 30/08/17 15:28 LIGHT DUKE STREET HILL JACOLICE - AT SCENE ROAD-WET WEATHER-FINE SING ED CAS CROSSES INFRONT OF VEH 1 CASUALTY 001 (001) (69 Yrs - M UNKN) SLIGHT PEDESTRIAN EHICLE 001 (000) PEDAL CYCLE (40 Yrs - M UNKN) BT - NOT APPLICABLE 001 A 804 (WRONG USE OF PEDESTRIAN CROSSING FACILITY) 001 B 602 (CARELESS/RECKLESS/IN A HURRY) 5 01170060209 THU 21/09/17 17:40 LIGHT TOOLEY STREET JACOLICE - AT SCENE ROAD-WET RAINING DUAL OT KNOWN HOW COLLISION OCCURRED CASUALTY 001 (001) (56 Yrs - M SE24) SLIGHT DRIVER/RIDE	CROSSING ROAD ON PEI GOING AHEAD OTHER V001 B 6 LONDON BRIDGE CWY OTHER JUN AU	D XING N W TO E FRONT HIT 601 (AGGRESSI	BOUND FROM DRIVER JNY PART OF WORK T FIRST VE DRIVING) PEDN PHASE AT ATS COMM TO/FROM WO	S N/SIDE 08 NODE 296	JCT CLEARED 532790 / 1803

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Borough High Street j/w Duke Street Hill & St Thomas Street GIS Area Collisions: 3Y to 28 Feb 2018 (provisional)

MD01 NODE 296 (BOROUGH HIGH	STREET/DUKE STREET HIL	.L)				36 MTS	TO FEB-2018 SORTED BY DATE
16 01170079377 WED 20/12/17	18:00 DARK TOOLEY STRE	EET J/W LONDON	BRIDGE			08 NODE 296	532767 / 180309
SELF COMPLETION ROAD-WET	WEATHER-FINE	UNKNOWN	T/STAG JUN	UNKNOWN (S/R)	UNKNOWN (S/R)	UNKN	OWN (S/R)
NOT KNOWN HOW COLLISION OC	CURRED						
CASUALTY 001 (001) (38 Yrs - M	SE14) SLIGHT DRIV	ER/RIDER					
VEHICLE 001 (000) PEDAL CY	CLE (38 Yrs - M SE14)	UNKNOWN (S/FL	JNKNOWN (S/R)	U(TO U(COMM TO/FROM	1 WORK	UNKNOWN (S/R)
BT - NOT A	PPLICABLE	UNKNOW	/N (S/R)	BACK HIT F	IRST		
UNKNOWN	I (S/R)	ι	JNKNOWN (S/R)	UNKNOWN	(S/R)	UNKNOWN (S/R)	
VEHICLE 002 (000) TAXI	(? Yrs - U)	ι	JNKNOWN (S/R)	U(TO U(UNKNOWN (S/R)
BT - DRV N	IOT CONTACTED	UNKNOW	/N (S/R)	FRONT HIT	FIRST		
UNKNOWN	I (S/R)	ι	JNKNOWN (S/R)	UNKNOWN	(S/R)	UNKNOWN (S/R)	
17 48170261365 WED 20/12/17	18:00 LIGHT LONDON BRID	OGE A3 J/W TOOLE	EY STREET			08 NODE 296	532780 / 180340
POLICE - OVER COU ROAD-DRY	WEATHER-FINE	SINGLE CWY	T/STAG JUN	AUTO SIG	PEDN PHASE AT	ATS	
VEH 1 COMES OUT OF SIDE STREE	ET INTO PATH OF VEH 2						
CASUALTY 001 (002) (38 Yrs - M	UNKN) SLIGHT DRIV	ER/RIDER					
VEHICLE 001 (000) TAXI	(45 Yrs - M UNKN)	7	TURNING RIGHT	E TO N	JNY PART OF W	ORK	JCT MID
BT - NOT F	REQUESTED			O/S HIT FIR	ST		
VEHICLE 002 (000) PEDAL CY	CLE (38 Yrs - M UNKN)	(GOING AHEAD OTHE	R NTOS	COMM TO/FROM	1 WORK	JCT MID
BT - NOT A	PPLICABLE			FRONT HIT	FIRST		

V001 B 301 (DISOBEYED AUTOMATIC TRAFFIC SIGNAL)

End of Accidents for MD01 NODE 296 (BOROUGH HIGH STREET/DUKE STREET HILL)

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MD02 GIS AREA B08_StThomas_St (P)		36 MTS TO FEB-2018	SORTED BY DATE
1 0115MM70276 FRI 03/04/15 13:15 LIGHT BOROUGH HIGH STREET 30M SW J.W TALBOT YARD)	08 LINK 271-286	532590 / 180070
	GIVE WAY/UNCONT NO XING FACILITY IN	I 50M	
V2 OVERTOOK V1 AS V1 TURNED RIGHT			
CASUALTY 001 (002) (40 Yrs - M SW4) SLIGHT DRIVER/RIDER			
VEHICLE 001 (002) CAR (37 Yrs - F N5) TURNING RIGHT	NE TO N	JCT MID	
BT - NOT REQUESTED	O/S HIT FIRST		
VEHICLE 002 (001) PEDAL CYCLE (40 Yrs - M SW4) OVERTAKE MOVE VEH	HO/S NE TO SW	JCT MID	
BT - NOT APPLICABLE	FRONT HIT FIRST		
V001 A 405 (FAILED TO LOOK PROPERLY) V001 A	602 (CARELESS/RECKLESS/IN A HURRY	·)	
V001 A 710 (VISION AFFECTED - VEHICLE BLIND SPOT) V002 A	602 (CARELESS/RECKLESS/IN A HURRY	()	
2 0115MM70357 SAT 25/04/15 12:23 LIGHT BOROUGH HIGH ST J/W BEDALE ST		08 NODE 294	532680 / 180200
	AUTO SIG NO XING FACILITY IN	I 50M	
V1 TURNED RIGHT AND GOT HIT BY V2			
CASUALTY 001 (002) (49 Yrs - M BR1) SLIGHT DRIVER/RIDER			
VEHICLE 001 (002) TAXI (70 Yrs - M CM13) TURNING RIGHT	N TO NW JNY PART OF WORK	JCT MID	
BT - NEGATIVE	N/S HIT FIRST		
VEHICLE 002 (001) M/C > 500CC (49 Yrs - M BR1) GOING AHEAD OTHER	R STON	JCT MID	
BT - NEGATIVE	FRONT HIT FIRST		
V001 A 405 (FAILED TO LOOK PROPERLY) V001 A	403 (POOR TURN OR MANOEUVRE)		

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MD02 GIS AREA B08_StThomas_St (P)			36 MTS TO FEB-2018	SORTED BY DATE
3 0115MM70389 TUE 28/04/15 10:15 LIGHT BOROUGH HIGH ST J/W ST THOMAS S	ST		08 NODE 294	532700 / 180210
POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CWY T/ST	ΓAG JUN AUTH P	PERSON NO XING FACILITY IN 5	OM OTH AUTH PER	
			OTHER OBJECT I	N CWY
POLICE OFFICER WAS DIRECTING TRAFFIC AROUND BROKEN DOWN VEHICLE. V1 MC	OVED OFF AND HIT STA	ATIONARY V2		
CASUALTY 001 (002) (? Yrs - M UNKN) SLIGHT DRIVER/RIDER				
VEHICLE 001 (002) GDS => 7.5T (29 Yrs - M SW12) MOVIN	G OFF N	N TO S	JCT APP	
BT - NEGATIVE	F	FRONT HIT FIRST		
VEHICLE 002 (001) M/C 125-500CC (? Yrs - M UNKN) GOING	AHEAD HELD UP	N TO S JNY PART OF WORK	JCT APP	
BT - DRV NOT CONTACTED	E	BACK HIT FIRST		
Wood A 405 (FAILED TO LOOK PROPERLY)	\\(\text{0.04} \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	2000 TUDN OD MANOELINGE)		
V001 A 405 (FAILED TO LOOK PROPERLY)	V001 A 403 (P	POOR TURN OR MANOEUVRE)		
V001 A 109 (ANIMAL OR OBJECT IN CARRIAGEWAY)				
4 0115MM70545 FRI 19/06/15 12:00 LIGHT BOROUGH HIGH ST J/W SOUTHWARK	ST		08 NODE 286	532650 / 180160
POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CWY T/ST	ΓAG JUN AUTO S	SIG PEDN PHASE AT ATS		
V2 HIT THE REAR OF V1, CAUSING RIDER TO FALL				
CASUALTY 001 (001) (26 Yrs - M SE1) SLIGHT DRIVER/RIDER				
VEHICLE 001 (002) PEDAL CYCLE (26 Yrs - M SE1) GOING	AHEAD OTHER	S TO N	JCT MID	
BT - NOT APPLICABLE	E	BACK HIT FIRST		
VEHICLE 002 (001) GDS =< 3.5T (? Yrs - M RM14) OVERT	AKE MOVE VEH O/S	S TO N JNY PART OF WORK	JCT MID	
BT - NEGATIVE	F	FRONT HIT FIRST		
V002 A 405 (FAILED TO LOOK PROPERLY)	V002 A 308 (F	FOLLOWING TOO CLOSE)		

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MD02 GIS AREA B08_StThomas_St (P)				36 MTS TO	FEB-2018 SORTED BY DATE
5 0115MM70540 FRI 03/07/15 10:20 LIGHT BOROUGH HIGH ST J/W LON				08 LINK 294-296	532720 / 180250
POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CW V2 ROLLED FORWARD AND HIT STATIONARY V1	Y T/STAG JUN AUT	O SIG	PEDN PHASE AT ATS		
	GOING AHEAD HELD UP	STON	JNY PART OF WORK		JCT APP
VEHICLE 001 (002) TAXI (55 Yrs - M SG13) BT - NEGATIVE	GOING AREAD RELD UP	BACK HIT FI			JCT APP
51 1125/11V2		D/(0/(1/1/1/1/1/1/1/1/1/1/1/1/1/1/1/1/1/1			
VEHICLE 002 (001) TAXI (41 Yrs - M NW1)	MOVING OFF	STON	JNY PART OF WORK		JCT APP
BT - NEGATIVE		FRONT HIT F	FIRST		
V002 A 405 (FAILED TO LOOK PROPERLY)	V002 A 401	(DOOD THIDN	OR MANOEUVRE)		
V002 A 403 (FAILED TO LOOK PROPERLY)	V002 A 40.	O (FOOK TOKIN	OR MANOEUVRE)		
6 0115MM79019 FRI 18/09/15 10:56 LIGHT BOROUGH HIGH STREET J/M				08 NODE 294	532700 / 180220
	Y CROSSROADS AUT	O SIG	PEDN PHASE AT ATS		
PED WAS USING HER MOBILE PHONE & WALKED INTO DOORS OF V1	CDOCCING DOAD WITHIN	OM VINO CE I		C N/CIDE	
CASUALTY 001 (001) (17 Yrs - F N14) SLIGHT PEDESTRIAN	CROSSING ROAD WITHIN S				IOT OLEADED
VEHICLE 001 (000) BUS/COACH (47 Yrs - M SE9) BT - NEGATIVE	MOVING OFF	N/S HIT FIRS	JNY PART OF WORK		JCT CLEARED
DI NEOMINE		14/01/11/11/10	,,		
C001 A 808 (CARELESS/RECKLESS/IN A HURRY)	C001 A 802	2 (FAILED TO LO	OOK PROPERLY)		
7 0115MM79021 FRI 25/09/15 08:51 LIGHT NFL, SOUTHWARK STREET, 6	60M W J/W BOROUGH HIGH S	STREET		08 LINK 284-286	532540 / 180140
POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CW	Y NO JUN IN 20M		PELICAN OR SIMILAR		
RV1 WAS OVERTAKING STAT V'S ON THEIR OFFSIDE AS PED, DECIDED TO C	ROSS BETWEN STAT V'S CA	USING COLLISI	ON		
CASUALTY 001 (001) (44 Yrs - M BR6) SERIOUS DRIVER/RIDER					
CASUALTY 002 (001) (40 Yrs - F NP10) SERIOUS PEDESTRIAN	CROSSING ROAD WITHIN S			S N/SIDE MSK	
VEHICLE 001 (000) M/C > 500CC (44 Yrs - M BR6) BT - NOT PROVD (MEDCL REASONS)	OVERTAKE STAT VEH O/S	W TO E FRONT HIT F	JNY PART OF WORK		
C001 A 801 (CROSSED ROAD MASKED BY STATIONARY OR PARKED VEHIC	LE) C001 A 802	2 (FAILED TO LO	OOK PROPERLY)		

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MD02 GIS AREA B08_StThomas_St (P)			36 MTS TO FEB-2018 SORTED BY DATE
8 0115MM71135 WED 07/10/15 11:25 LIGHT BOROUGH HIGH	STREET J/W BEDALE STREET		08 NODE 294 532690 / 180200
POLICE - AT SCENE ROAD-DRY WEATHER-FINE	SINGLE CWY T/STAG JUN	AUTO SIG PEDN PHASE AT ATS	
V1 HIT REAR OF V2			
CASUALTY 001 (001) (51 Yrs - M BR2) SLIGHT DRIVER	/RIDER		
VEHICLE 001 (002) M/C 125-500CC (51 Yrs - M BR2)	TURNING RIGHT	NE TO NW	JCT APP
BT - DRV NOT CONTACTED		FRONT HIT FIRST	
VEHICLE 002 (001) GDS 3.5-7.5T (50 Yrs - M OX14) BT - NOT REQUESTED	TURNING RIGHT	NE TO NW JNY PART OF WORK BACK HIT FIRST	JCT MID
V001 B 306 (EXCEEDING SPEED LIMIT)	V001	A 406 (FAILED TO JUDGE OTHER PERSON'S	S PATH OR SPEED)
V001 B 505 (ILLNESS OR DISABILITY, MENTAL OR PHYSICAL)			,
9 0115MM70980 THU 22/10/15 19:20 DARK BOROUGH HIGH	STREET J/W ST THOMAS STREET		08 NODE 294 532690 / 180200
POLICE - AT SCENE ROAD-DRY WEATHER-FINE	SINGLE CWY T/STAG JUN	AUTO SIG PEDN PHASE AT ATS	
V2 TURNED LEFT AND COLLIDED WITH PASSING CYCLIST V1			
CASUALTY 001 (001) (23 Yrs - M N7) SLIGHT DRIVER	/RIDER		
VEHICLE 001 (002) PEDAL CYCLE (23 Yrs - M N7)	GOING AHEAD OTH		JCT CLEARED
BT - NOT APPLICABLE		N/S HIT FIRST	
VEHICLE 002 (001) CAR (? Yrs - M UNKN)	TURNING LEFT	SE TO SW	JCT CLEARED
BT - NOT REQUESTED		FRONT HIT FIRST	
V001 B 403 (POOR TURN OR MANOEUVRE)	V002	B 406 (FAILED TO JUDGE OTHER PERSON'S	S PATH OR SPEED)
V002 A 407 (PASSING TOO CLOSE TO CYCLIST, HORSE RIDER	OR PEDESTRIAN) V001	B 507 (CYCLIST WEARING DARK CLOTHING	AT NIGHT)
10 0115MM70989 FRI 27/11/15 17:03 DARK SOUTHWARK ST	REET J.W STONEY STREET		08 NODE 286 532630 / 180160
POLICE - AT SCENE ROAD-DRY WEATHER-FINE	DUAL CWY T/STAG JUN	GIVE WAY/UNCONT PEDN PHASE AT ATS	
PED STEPPED OUT INTO THE SIDE OF V1			
CASUALTY 001 (001) (? Yrs - M UNKN) SLIGHT PEDES	RIAN CROSSING ROAD W	TITHIN 50M XING SE BOUND FROM DRIVERS	S N/SIDE
VEHICLE 001 (000) CAR (67 Yrs - M EC12)	GOING AHEAD OTHI		JCT APP
BT - NEGATIVE		N/S HIT FIRST	
		A 808 (CARELESS/RECKLESS/IN A HURRY)	

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Borough high Street JW Duke Street hill & St Thomas Street G	o Area Comsions: or to	201 CB 2010 (provisional)		
MD02 GIS AREA B08_StThomas_St (P)			36 MTS TO FEB-2018 SOR	RTED BY DATI
11 0116MM70288 FRI 01/01/16 05:30 DARK ST THOMAS STREET J/W BO POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CW V2 REVERSED ACROSS CARRIAGEWAY AND COLLIDED WITH V1		O SIG PEDN PHASE AT ATS		710 / 180190
CASUALTY 001 (001) (26 Yrs - F SE5) SLIGHT DRIVER/RIDER				
VEHICLE 001 (002) PEDAL CYCLE (26 Yrs - F SE5) BT - NOT APPLICABLE	GOING AHEAD OTHER	NW TO SE O/S HIT FIRST	JCT CLEARED)
VEHICLE 002 (001) CAR (? Yrs - F UNKN) BT - NOT REQUESTED	REVERSING	SE TO NE BACK HIT FIRST	JCT CLEARED	•
V002 A 405 (FAILED TO LOOK PROPERLY)	V002 A 602	2 (CARELESS/RECKLESS/IN A HURRY	′)	
12 0116MM70500 WED 13/01/16 22:15 DARK NFL ST THOMAS STREET 63 POLICE - OVER COU ROAD-DRY WEATHER-FINE SINGLE CW V2 PULLED INTO V1'S LANE AND HIT V1	M SE J/W BOROUGH HIGH ST YY NO JUN IN 20M	REET NO XING FACILITY IN		740 / 180170
CASUALTY 001 (001) (21 Yrs - M SE15) SLIGHT DRIVER/RIDER				
VEHICLE 001 (002) PEDAL CYCLE (21 Yrs - M SE15) BT - NOT APPLICABLE	GOING AHEAD OTHER	NW TO SE O/S HIT FIRST		
VEHICLE 002 (001) CAR (? Yrs - M) BT - DRV NOT CONTACTED	CHANGE LANE TO LEFT	NW TO SE N/S HIT FIRST		
V002 A 405 (FAILED TO LOOK PROPERLY)	V002 A 407	7 (PASSING TOO CLOSE TO CYCLIST	, HORSE RIDER OR PEDESTRIAN)	
13 0116MM70329 THU 14/01/16 17:55 LIGHT BOROUGH HIGH STREET J/V POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CW V2 BROKE SHARPLY CAUSING V1 TO HIT THE REAR OF V2	_	O SIG PEDN PHASE AT ATS		690 / 180200
CASUALTY 001 (001) (27 Yrs - M E17) SLIGHT DRIVER/RIDER				
VEHICLE 001 (002) PEDAL CYCLE (27 Yrs - M E17) BT - NOT APPLICABLE	GOING AHEAD OTHER	NE TO SW FRONT HIT FIRST	JCT MID	
VEHICLE 002 (001) CAR (36 Yrs - M SE17) BT - NOT REQUESTED	MOVING OFF	NE TO SW BACK HIT FIRST	JCT MID	
V001 A 308 (FOLLOWING TOO CLOSE)	V002 A 408	3 (SUDDEN BRAKING)		

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LITH WALL DILL OF			B-2018 SORTED BY DATI
UTHWARK ST		08 NODE 286	532630 / 180130
		N 50M	
CROSSING ROAD (NOT ON	XING) E BOUND FROM DRIVE	RS N/SIDE MSK	
GOING AHEAD OTHER	STON	JC	T MID
	FRONT HIT FIRST		
W ST THOMAS STREET		08 NODE 294	532690 / 180200
	O SIG PEDN PHASE AT AT	S	
TURNING LEFT	SE TO SW	JC	T MID
	O/S HIT FIRST		
GOING AHEAD OTHER		JC	T MID
	FRONT HIT FIRST		
V002 A 602	(CARELESS/RECKLESS/IN A HURRY	()	
J/W BOROUGH HIGH STREET		08 LINK 294-296	532730 / 180250
Y MULTI JUN AUTO	O SIG PEDN PHASE AT AT	S	
FRONT SEAT			
GOING AHEAD HELD UP	N TO S	JC	T APP
	BACK HIT FIRST		
GOING AHEAD HELD UP	N TO S	JC	T APP
	FRONT HIT FIRST		
V002 B 602	(CARELESS/RECKLESS/IN A HURRY	()	
\	WY CROSSROADS GIVE ED TO LOOK BOTH WAYS BEFO CROSSING ROAD (NOT ON GOING AHEAD OTHER WY THOMAS STREET WY T/STAG JUN AUTO TURNING LEFT GOING AHEAD OTHER V002 A 602 J/W BOROUGH HIGH STREET Y MULTI JUN AUTO FRONT SEAT GOING AHEAD HELD UP GOING AHEAD HELD UP	WY CROSSROADS GIVE WAY/UNCONT NO XING FACILITY II ED TO LOOK BOTH WAYS BEFORE CROSSING ROAD) CROSSING ROAD (NOT ON XING) E BOUND FROM DRIVE GOING AHEAD OTHER S TO N FRONT HIT FIRST WY T/STAG JUN AUTO SIG PEDN PHASE AT ATS TURNING LEFT SE TO SW O/S HIT FIRST GOING AHEAD OTHER NE TO SW FRONT HIT FIRST V002 A 602 (CARELESS/RECKLESS/IN A HURRY JW BOROUGH HIGH STREET Y MULTI JUN AUTO SIG PEDN PHASE AT ATS FRONT SEAT GOING AHEAD HELD UP N TO S BACK HIT FIRST GOING AHEAD HELD UP N TO S FRONT HIT FIRST	WY CROSSROADS GIVE WAY/UNCONT NO XING FACILITY IN 50M ED TO LOOK BOTH WAYS BEFORE CROSSING ROAD) CROSSING ROAD (NOT ON XING) E BOUND FROM DRIVERS N/SIDE MSK GOING AHEAD OTHER S TO N FRONT HIT FIRST WY T/STAG JUN AUTO SIG PEDN PHASE AT ATS TURNING LEFT SE TO SW O/S HIT FIRST V002 A 602 (CARELESS/RECKLESS/IN A HURRY) JW BOROUGH HIGH STREET Y MULTI JUN AUTO SIG PEDN PHASE AT ATS FRONT SEAT GOING AHEAD HELD UP N TO S BACK HIT FIRST JC GOING AHEAD HELD UP N TO S BACK HIT FIRST JC GOING AHEAD HELD UP N TO S BACK HIT FIRST

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MD02 GIS AREA B08_StThomas_St (P)	36 MTS TO FEB-2018 SORTED BY DATE
17 01160002476 SUN 20/11/16 00:01 DARK SOUTHWARK STREET J/W BOROUGH HIGH STREET	08 LINK 284-286 532570 / 180150
POLICE - AT SCENE ROAD-WET RAINING SINGLE CWY T/STAG JUN GIVE WAY/UNCONT ZEBRA	OTH AUTH PER
NOT KNOWN HOW COLLISION OCCURRED	
CASUALTY 001 (001) (29 Yrs - F SW18) SLIGHT PEDESTRIAN CROSSING ROAD (NOT ON XING) UNKNOWN	
VEHICLE 001 (000) CAR (50 Yrs - M N22) TURNING LEFT S TO NW	ENTERING MAIN RD
BT - NOT REQUESTED FRONT HIT FIRST	
COOM A DOO (FAILED TO LOOK DRODER) VI	
C001 A 802 (FAILED TO LOOK PROPERLY)	
18 01170017993 MON 13/02/17 08:10 LIGHT BOROUGH HIGH STREET J/W ST THOMAS STREET	08 NODE 294 532697 / 180201
POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CWY T/STAG JUN GIVE WAY/UNCONT NO XING F	ACILITY IN 50M
NOT KNOWN HOW COLLISION OCCURRED	
CASUALTY 001 (002) (35 Yrs - F E16) SLIGHT DRIVER/RIDER	
VEHICLE 001 (000) CAR (26 Yrs - M ME16) TURNING LEFT N TO S JNY PART	OF WORK LEAVING MAIN RD
BT - NOT REQUESTED BACK HIT FIRST	
	05.W05.K
VEHICLE 002 (000) PEDAL CYCLE (35 Yrs - F E16) GOING AHEAD HELD UP N TO S JNY PART	OF WORK JCT APP
BT - NOT APPLICABLE FRONT HIT FIRST	
V001 B 405 (FAILED TO LOOK PROPERLY) V002 B 405 (FAILED TO LOOK PROPE	RLY)
40 0447044000 WED 45/09/47 07 05 HOUT DODOUGH HIGH OTDEST IM COUTHWARK OTDEST	00 NODE 000 F000E0 / 4004E0
19 01170018603 WED 15/02/17 07:35 LIGHT BOROUGH HIGH STREET J/W SOUTHWARK STREET POLICE - AT SCENE ROAD-WET WEATHER-FINE SINGLE CWY T/STAG JUN AUTO SIG PEDN PHA	08 NODE 286 532650 / 180150
NOT KNOWN HOW COLLISION OCCURRED	SEATATS
	(TD 0.1.1.1.0 D) (
(10.10)	/FROM WORK JCT MID
BT - NOT REQUESTED SKIDDED FRONT HIT FIRST	
V001 B 403 (POOR TURN OR MANOEUVRE) V001 A 701 (VISION AFFECTED - STA	TIONARY OR PARKED VEHICLE(S))
,	- (-1)

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MD02 GIS AREA B08_StThomas_St (P)	36 MTS TO FEB-2018 SORTED BY DATE
20 01170022058 WED 01/03/17 13:20 LIGHT BOROUGH HIGH STREET J/W TALBOT ROAD	08 LINK 271-286 532580 / 180070
POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CWY T/STAG JUN GIVE WAY/UNCONT NO XING FACILITY	N 50M
NOT KNOWN HOW COLLISION OCCURRED	
CASUALTY 001 (001) (42 Yrs - F SE13) SERIOUS PEDESTRIAN CROSSING ROAD (NOT ON XING) W BOUND FROM DRIV	RS N/SIDE MSK
VEHICLE 001 (000) GDS 3.5-7.5T (38 Yrs - M RM10) GOING AHEAD OTHER N TO S JNY PART OF WO BT - NEGATIVE FRONT HIT FIRST	C JCT CLEARED
	FOREIGN REG LHD
C001 A 802 (FAILED TO LOOK PROPERLY) C001 A 803 (FAILED TO JUDGE VEHICLE'S PA	H OR SPEED)
21 01170025409 WED 15/03/17 12:00 LIGHT SOUTHWARK STREET 0M E OF J/W BOROUGH HIGH STREET	08 NODE 286 532647 / 180159
POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CWY OTHER JUN AUTH PERSON NO XING FACILITY NOT KNOWN HOW COLLISION OCCURRED	N 50M
CASUALTY 001 (001) (29 Yrs - F SE1) SLIGHT DRIVER/RIDER	
VEHICLE 001 (000) PEDAL CYCLE (29 Yrs - F SE1) GOING AHEAD OTHER E TO W JNY PART OF WO BT - NOT APPLICABLE FRONT HIT FIRST	C JCT CLEARED
HIT OPEN DOOR	
VEHICLE 002 (000) CAR (56 Yrs - M SW10) SLOWING OR STOPPING P TO P	JCT CLEARED
BT - NOT REQUESTED DID NOT IMPACT	OTWAY.
V002 A 405 (FAILED TO LOOK PROPERLY)	OTWAY
22 01170027240 FRI 17/03/17 10:16 LIGHT BOROUGH HIGH STREET J/W SOUTHWARK STREET	08 NODE 286 532640 / 180150
SELF COMPLETION ROAD-DRY WEATHER-UNKNOWN SINGLE CWY T/STAG JUN UNKNOWN (S/R) UNKNOWN (S/R) UNKNOWN (S/R)	UNKNOWN (S/R) UNKNOWN (S/R)
NOT KNOWN HOW COLLISION OCCURRED	
CASUALTY 001 (002) (24 Yrs - M SE5) SLIGHT DRIVER/RIDER	
VEHICLE 001 (000) GDS =< 3.5T (52 Yrs - M AL10) UNKNOWN (S/FTURNING LEFT U(TO U(N/S HIT FIRST UNKNOWN (S/R) BT - DRV NOT CONTACTED UNKNOWN (S/R) N/S HIT FIRST UNKNOWN (S/R)	JCT APP
VEHICLE 002 (000) PEDAL CYCLE (24 Yrs - M SE5) GOING AHEAD OTHER U(TO U(BT - NOT APPLICABLE O/S HIT FIRST	UNKNOWN (S/R)

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MD02 GIS AREA B08_StThomas_St (P)			36 MTS TC	FEB-2018 SORTED BY DATE
23 01170027737 FRI 24/03/17 09:15 LIGHT LONDON BRIDGE STREET SE	E1 J/W BOROUGH HIGH STRE	ET SE1	08 LINK 294-296	532730 / 180250
	T/STAG JUN AUTO		}	
NOT KNOWN HOW COLLISION OCCURRED				
CASUALTY 001 (002) (26 Yrs - M E11) SLIGHT DRIVER/RIDER				
VEHICLE 001 (000) TAXI (60 Yrs - M N1)	TURNING RIGHT	E TO N JNY PART OF WORK		JCT MID
BT - NOT REQUESTED		FRONT HIT FIRST		
VEHICLE 002 (000) PEDAL CYCLE (26 Yrs - M E11)	GOING AHEAD OTHER	NTOS		JCT APP
BT - NOT REQUESTED		FRONT HIT FIRST		
V002 B 301 (DISOBEYED AUTOMATIC TRAFFIC SIGNAL)	V002 B 405	(FAILED TO LOOK PROPERLY)		
24 01170030957 FRI 07/04/17 12:16 LIGHT BOROUGH HIGH STREET J/M	V SOUTHWARK STREET		08 NODE 286	532660 / 180160
POLICE - AT SCENE ROAD-DRY WEATHER-FINE DUAL CWY	MULTI JUN AUTO) SIG ZEBRA		
NOT KNOWN HOW COLLISION OCCURRED				
CASUALTY 001 (002) (26 Yrs - M ME17) SLIGHT DRIVER/RIDER				
VEHICLE 001 (000) GDS =< 3.5T (48 Yrs - M HA22)	U-TURNING	W TO E JNY PART OF WORK		JCT APP
BT - NOT REQUESTED		N/S HIT FIRST		
VEHICLE 002 (000) PEDAL CYCLE (26 Yrs - M ME17)	OVERTAKE STAT VEH O/S	N TO S		JCT CLEARED
BT - NOT REQUESTED OVER		FRONT HIT FIRST		
V001 A 701 (VISION AFFECTED - STATIONARY OR PARKED VEHICLE(S))				
25 01170031393 MON 10/04/17 07:45 LIGHT SOUTHWARK STREET J/W S	TONEY STREET		08 LINK 284-286	532580 / 180150
POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CW	/Y T/STAG JUN GIVE	WAY/UNCONT NO XING FACILITY IN	50M	
NOT KNOWN HOW COLLISION OCCURRED				
CASUALTY 001 (001) (39 Yrs - F SE1) SLIGHT PEDESTRIAN	ON FOOTPATH - VERGE	W BOUND		
VEHICLE 001 (000) OTH MOT VEH (31 Yrs - M E17) BT - NOT REQUESTED	REVERSING	E TO W JNY PART OF WORK DID NOT IMPACT		JCT CLEARED
V001 B 307 (TRAVELLING TOO FAST FOR CONDITIONS)	V001 B 999	(OTHER FACTOR)		

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bolough riight street yw buke street filli & st filonias street six	Alea Comsions. 31 to	20 1 eb 20 10 (provisional)	
MD02 GIS AREA B08_StThomas_St (P)		36 MTS	TO FEB-2018 SORTED BY DATE
26 01170036898 FRI 12/05/17 05:10 LIGHT BOROUGH HIGH STREET J/W	SOUTHWARK STREET	08 NODE 286	532620 / 180149
POLICE - AT SCENE ROAD-WET RAINING SINGLE CWY	Y MULTI JUN AUTO	O SIG PEDN PHASE AT ATS	
NOT KNOWN HOW COLLISION OCCURRED			
CASUALTY 001 (001) (37 Yrs - M SE5) SLIGHT DRIVER/RIDER			
VEHICLE 001 (000) M/C 50-125CC (37 Yrs - M SE5)	SLOWING OR STOPPING	S TO N COMM TO/FROM WORK	JCT APP
BT - NOT REQUESTED		BACK HIT FIRST	
VEHICLE 002 (000) CAR (38 Yrs - M E8)	GOING AHEAD OTHER	STON	JCT APP
BT - DRV NOT CONTACTED		FRONT HIT FIRST	
V/200 A 405 (EAN ED TO LOCK/ DDCDEDLV)	\/000 A 400	. (EAU ED TO JUDOE OTHER REPOONIG DATH OR ORE	
V002 A 405 (FAILED TO LOOK PROPERLY)	V002 A 406	6 (FAILED TO JUDGE OTHER PERSON'S PATH OR SPE	=D)
27 01170046571 WED 05/07/17 00:35 DARK SOUTHWARK STREET 20M N	OF J/W BOROUGH HIGH ST	REET 08 NODE 286	532650 / 180160
POLICE - AT SCENE ROAD-DRY WEATHER-FINE DUAL CWY	MULTI JUN AUTO	O SIG PELICAN OR SIMILAR	
NOT KNOWN HOW COLLISION OCCURRED			
CASUALTY 001 (001) (67 Yrs - F SE5) SLIGHT PEDESTRIAN	CROSSING ROAD ON PED	XING SE BOUND FROM DRIVERS O/SIDE	
VEHICLE 001 (000) CAR (26 Yrs - M N16)	MOVING OFF	N TO S COMM TO/FROM WORK	JCT CLEARED
BT - NOT REQUESTED		FRONT HIT FIRST	
		BUS LANE	
C001 A 802 (FAILED TO LOOK PROPERLY)	C001 A 806	6 (IMPAIRED BY ALCOHOL)	
C001 B 809 (PEDESTRIAN WEARING DARK CLOTHING AT NIGHT)			
28 01170051689 WED 02/08/17 09:30 LIGHT SOUTHWARK STREET 30M S	OF J/W BOROUGH HIGH STR	REET THE NEAREST CLAS 08 LINK 284-29	36 532540 / 180140
	Y NO JUN IN 20M	NO XING FACILITY IN 50M	
NOT KNOWN HOW COLLISION OCCURRED			
CASUALTY 001 (001) (37 Yrs - M SE16) SLIGHT DRIVER/RIDER			
VEHICLE 001 (000) PEDAL CYCLE (37 Yrs - M SE16)	GOING AHEAD OTHER	W TO E	
BT - NOT REQUESTED		DID NOT IMPACT	
VEHICLE 002 (000) GDS =< 3.5T (? Yrs - U)	PARKED	P TO P	
BT - DRV NOT CONTACTED		O/S HIT FIRST	
V/200 D 405 (EAN ED TO LOCK/ DDCDEDLV)			
V002 B 405 (FAILED TO LOOK PROPERLY)			

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Borough High Street j/w Duke Street Hill & St Thomas Street GIS Area Collisions: 3Y to 28 Feb 2018 (provisional)

Borough riigh Street Jw Buke Street riin & St Thomas	- Circle Old Area Completions. 31 to 2			
MD02 GIS AREA B08_StThomas_St (P)			36 MTS TO FEB-2018	SORTED BY DATE
29 01170052282 SUN 06/08/17 04:40 LIGHT BOROUGH HIGH	STREET 50M S OF J/W UNION STREET TH	E NEAREST CLASSIFI 08	LINK 271-286	532570 / 180050
POLICE - AT SCENE ROAD-DRY WEATHER-FINE	DUAL CWY NO JUN IN 20M	NO XING FACILITY IN 50M		
NOT KNOWN HOW COLLISION OCCURRED				
CASUALTY 001 (001) (42 Yrs - M E1) SLIGHT DRIVER/	/RIDER			
CASUALTY 002 (002) (22 Yrs - M SW9) SLIGHT DRIVER/	/RIDER			
CASUALTY 003 (002) (22 Yrs - M SE24) SLIGHT PASSEN	GER FRONT SEAT			
VEHICLE 001 (000) TAXI (42 Yrs - M E1)	GOING AHEAD RIGHT BEND	SW TO NE JNY PART OF WORK		
BT - NOT REQUESTED		FRONT HIT FIRST		
VEHIOLE		NE TO OW		
VEHICLE 002 (000) CAR (22 Yrs - M SW9) BT - NOT REQUESTED	GOING AHEAD LEFT BEND	FRONT HIT FIRST		
LEFT CWY CROSS CENT/RES		HIT LAMP POST		
V002 B 403 (POOR TURN OR MANOEUVRE)	V002 R 509	(DISTRACTION IN VEHICLE)		
V002 B 410 (LOSS OF CONTROL)	V002 B 000	(SIGHOLOHOH IN VEHICLE)		
30 01170064585 SUN 15/10/17 18:35 DARK SOUTHWARK ST	REET 48M S OF J/W BOROUGH HIGH STRE	EET 08	LINK 284-286	532560 / 180140
POLICE - AT SCENE ROAD-DRY WEATHER-FINE	SINGLE CWY NO JUN IN 20M	NO XING FACILITY IN 50M		
NOT KNOWN HOW COLLISION OCCURRED				
CASUALTY 001 (002) (23 Yrs - M SW9) SLIGHT DRIVER/	RIDER .			
VEHICLE 001 (000) TAXI (30 Yrs - M E2)	U-TURNING	E TO W COMM TO/FROM WORK		
BT - NOT REQUESTED		O/S HIT FIRST		
VEHIOLE	OVEDTAKE MOVE VEH OV	E TO W NIV BART OF WORK		
VEHICLE 002 (000) PEDAL CYCLE (23 Yrs - M SW9) BT - NOT APPLICABLE	OVERTAKE MOVE VEH O/S	E TO W JNY PART OF WORK O/S HIT FIRST		
BT - NOT APPLICABLE		U/S HIT FIRST		
V001 A 406 (FAILED TO JUDGE OTHER PERSON'S PATH OR SPE	EED)			
31 01170064815 TUE 17/10/17 10:19 LIGHT SAINT THOMAS S	STREET J/W BOROUGH HIGH STREET	08	NODE 294	532690 / 180200
	SINGLE CWY T/STAG JUN AUTO			002000 7 .00200
NOT KNOWN HOW COLLISION OCCURRED				
CASUALTY 001 (001) (53 Yrs - F SE5) SLIGHT PEDEST	RIAN CROSSING ROAD ON PED X	NG N BOUND FROM DRIVERS N/S	SIDE	
VEHICLE 001 (000) PEDAL CYCLE (25 Yrs - M N16)	TURNING LEFT	NTOE	JCT APP	
BT - NOT APPLICABLE	TOMANO LET I	FRONT HIT FIRST	JOI AIT	
_ :				
C001 B 803 (FAILED TO JUDGE VEHICLE'S PATH OR SPEED)				

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Borough High Street j/w Duke Street Hill & St Thomas Street GIS Area Collisions: 3Y to 28 Feb 2018 (provisional)

MD02 GIS AREA B08_StThomas_St (P)		36 MTS TO FEB-2	018 SORTED BY DATE
32 01170066485 WED 25/10/17 16:40 LIGHT SOUTHWARK STREET J/W STONEY STREET		08 NODE 286	532610 / 180150
	E WAY/UNCONT PELICAN OR SIMILAF	₹	
NOT KNOWN HOW COLLISION OCCURRED			
CASUALTY 001 (002) (41 Yrs - F E17) SLIGHT DRIVER/RIDER			
VEHICLE 001 (000) TAXI (48 Yrs - M SL2) GOING AHEAD HELD UP BT - NOT REQUESTED	W TO E JNY PART OF WORK N/S HIT FIRST	JCT AI	PP
VEHICLE 002 (000) PEDAL CYCLE (41 Yrs - F E17) OVERTAKING NEARSIDE	W TO E	JCT AI	PP
BT - NOT APPLICABLE	FRONT HIT FIRST		
V002 A 410 (LOSS OF CONTROL) 33 01170067139 MON 30/10/17 09:20 LIGHT BOROUGH HIGH STREET 55M S OF J/W ST THOMAS STR	CCT	08 LINK 286-294	532680 / 180190
POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CWY NO JUN IN 20M NOT KNOWN HOW COLLISION OCCURRED	PEDN PHASE AT ATS		5320 <u>0</u> 0 / 100190
CASUALTY 001 (002) (39 Yrs - M SE16) SLIGHT DRIVER/RIDER			
VEHICLE 001 (000) GDS => 7.5T (30 Yrs - M DA1) U-TURNING BT - NOT REQUESTED	N TO S JNY PART OF WORK O/S HIT FIRST		
VEHICLE 002 (000) PEDAL CYCLE (39 Yrs - M SE16) OVERTAKE MOVE VEH 0/9 BT - NOT APPLICABLE	S N TO S FRONT HIT FIRST		
V001 B 404 (FAILED TO SIGNAL/ MISLEADING SIGNAL) V002 B 30	8 (FOLLOWING TOO CLOSE)		

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Borough High Street j/w Duke Street Hill & St Thomas Street GIS Area Collisions: 3Y to 28 Feb 2018 (provisional)

MD02 GIS AREA B08_StThomas_St (P)		36 MTS TO FEB-	2018 SORTED BY DATE
34 01170069779 MON 13/11/17 15:45 DARK BOROUGH HIGH STREET 70N	M N NEWCOMEN ST	08 LINK 271-286	532570 / 180040
POLICE - AT SCENE ROAD-DRY WEATHER-FINE DUAL CWY	NO JUN IN 20M	NO XING FACILITY IN 50M	
NOT KNOWN HOW COLLISION OCCURRED			
CASUALTY 001 (001) (22 Yrs - F SE15) SLIGHT DRIVER/RIDER			
VEHICLE 001 (000) M/C 50-125CC (22 Yrs - F SE15)	GOING AHEAD OTHER	STON	
BT - NOT REQUESTED		BACK HIT FIRST	
VEHICLE 002 (000) TAXI (26 Yrs - M RM07)	GOING AHEAD OTHER	STON	
BT - NOT REQUESTED		FRONT HIT FIRST	
V001 A 405 (FAILED TO LOOK PROPERLY)	V002 A	405 (FAILED TO LOOK PROPERLY)	
V002 A 406 (FAILED TO JUDGE OTHER PERSON'S PATH OR SPEED)	V002 /	TO (I MEED TO EGONT NOT ENET)	
35 01170072894 FRI 24/11/17 07:15 DARK BOROUGH HIGH STREET 50N			532590 / 180080
	Y NO JUN IN 20M	PELICAN OR SIMILAR	
NOT KNOWN HOW COLLISION OCCURRED			
CASUALTY 001 (001) (58 Yrs - M SE22) SLIGHT DRIVER/RIDER CASUALTY 002 (001) (22 Yrs - M SE11) SLIGHT PEDESTRIAN	CDOCCINIC DOAD WITH	N FOM VINC IN POLIND FROM DRIVERS O/SIDE MSV	
		N 50M XING W BOUND FROM DRIVERS O/SIDE MSK	
VEHICLE 001 (000) PEDAL CYCLE (58 Yrs - M SE22)	GOING AHEAD OTHER	S TO N	
BT - NOT APPLICABLE		FRONT HIT FIRST	
V001 B 601 (AGGRESSIVE DRIVING)	V001 B	307 (TRAVELLING TOO FAST FOR CONDITIONS)	
36 01170078445 SAT 16/12/17 17:33 DARK BOROUGH HIGH STREET 100	OM N OF J/W UNION STREE	T 08 LINK 271-286	532570 / 180050
POLICE - AT SCENE ROAD-WET RAINING SINGLE CW	Y NO JUN IN 20M	NO XING FACILITY IN 50M	
NOT KNOWN HOW COLLISION OCCURRED			
CASUALTY 001 (001) (33 Yrs - M LA2) SERIOUS PEDESTRIAN	CROSSING ROAD (NOT	ON XING) E BOUND FROM DRIVERS N/SIDE	
VEHICLE 001 (000) TAXI (73 Yrs - M IG6)	GOING AHEAD OTHER	S TO N JNY PART OF WORK	
BT - NEGATIVE		N/S HIT FIRST	
COOA A 8002 (FAILED TO LOOK DRODERLY)	C004 A	DOG (DEDECTRIAN) WEARING DARK OF OTHING AT MICHT	
C001 A 802 (FAILED TO LOOK PROPERLY) C001 A 808 (CARELESS/RECKLESS/IN A HURRY)	COUT A	809 (PEDESTRIAN WEARING DARK CLOTHING AT NIGHT)	
OUT A OUG (OARLEGO/REORLEGO/IN A HORKI)			

Page: 20 of 20

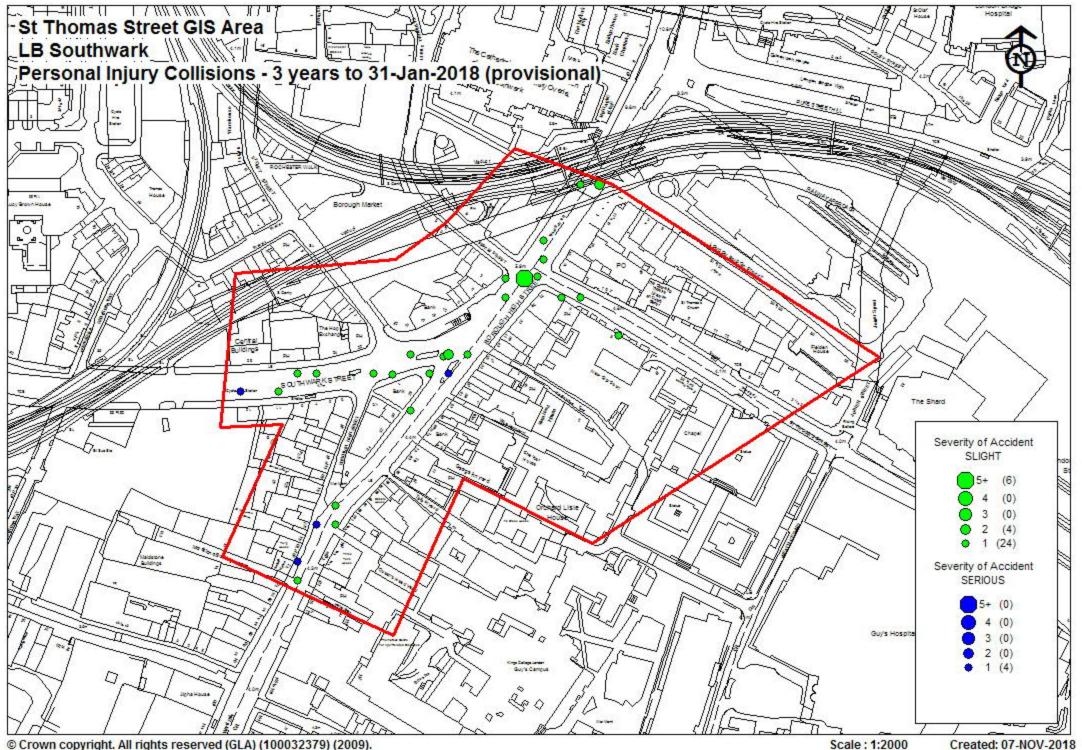


Borough High Street j/w Duke Street Hill & St Thomas Street GIS Area Collisions: 3Y to 28 Feb 2018 (provisional)

MD02 GIS AREA B08_StThomas_St (P)				36 MTS TO	D FEB-2018 SORTED BY DATE
37 01180082943 THU 11/01/18 09:56 LIGHT SAINT THOMAS STREET J/W B	OROUGH HIGH ST			08 NODE 294	532720 / 180190
SELF COMPLETION ROAD-WET RAINING UNKNOWN	T/STAG JUN UNKN	NOWN (S/R)	UNKNOWN (S/R)	UNKNO	WN (S/R)
NOT KNOWN HOW COLLISION OCCURRED					
CASUALTY 001 (001) (29 Yrs - M E17) SLIGHT PEDESTRIAN	ON FOOTPATH - VERGE	STAN	NDING		
VEHICLE 001 (000) CAR (44 Yrs - M IG1) UNKNOWN (S/F	REVERSING	U(TO U(JNY PART OF WORK		UNKNOWN (S/R)
BT - DRV NOT CONTACTED UNKNOV	NN (S/R)	UNKNOWN (S	S/R)		
UNKNOWN (S/R)	UNKNOWN (S/R)	UNKNOWN (S	S/R) UNK	(NOWN (S/R)	
38 01180092193 FRI 23/02/18 16:45 LIGHT BOROUGH HIGH STREET J/W S	ST THOMAS STREET			08 NODE 294	532690 / 180200
POLICE - AT SCENE ROAD-DRY WEATHER-FINE SINGLE CWY	CROSSROADS AUTO) SIG	PEDN PHASE AT ATS	;	
NOT KNOWN HOW COLLISION OCCURRED					
CASUALTY 001 (001) (43 Yrs - M TW14) SLIGHT DRIVER/RIDER					
CASUALTY 002 (002) (22 Yrs - F HP9) SLIGHT PASSENGER	BACK SEAT				
VEHICLE 001 (000) TAXI (43 Yrs - M TW14)	GOING AHEAD OTHER	NTOS	JNY PART OF WORK		JCT CLEARED
BT - NOT REQUESTED		FRONT HIT F	IRST		
(=====)	U-TURNING	N TO N	JNY PART OF WORK		JCT CLEARED
BT - NOT REQUESTED SKIDDED)	BACK HIT FIR	RST		
V002 A 305 (ILLEGAL TURN OR DIRECTION OF TRAVEL)	V002 A 710	(VISION AFFEC	CTED - VEHICLE BLIND	SPOT)	

End of Accidents for MD02 GIS AREA B08_StThomas_St (P)

End of Report



Appendix C

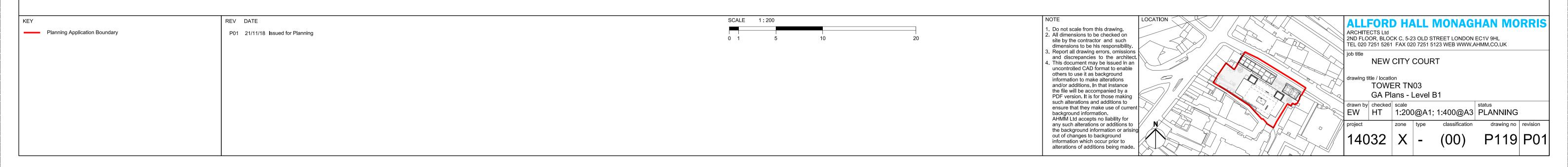
Ground floor and basement plans





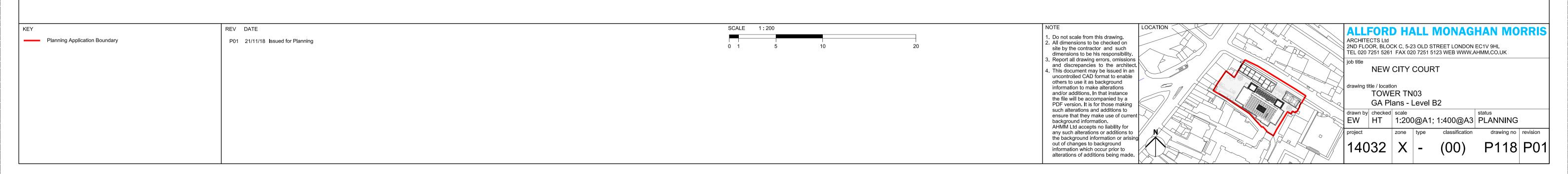










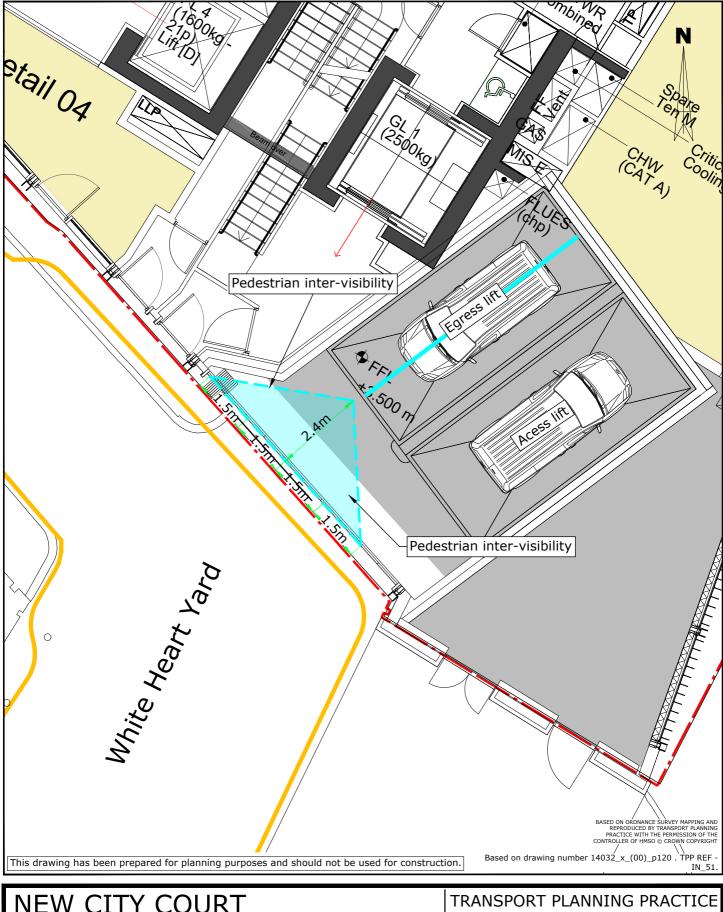


Appendix D

Lift access drawing







NEW CITY COURT

T:\30000 Projects\30848 New City Court\ACAD\048 B.dwg

Ground Floor layout Pedestrian inter-visibility splay at vehicle lift

DRAWN BY CHECKED SCALE @ A4 1:100

06/11/18 LD MS 70 Cowcross Street London, EC1M 6EL

t: 020 7608 0008 w: www.tppweb.co.uk DRAWING NUMBER

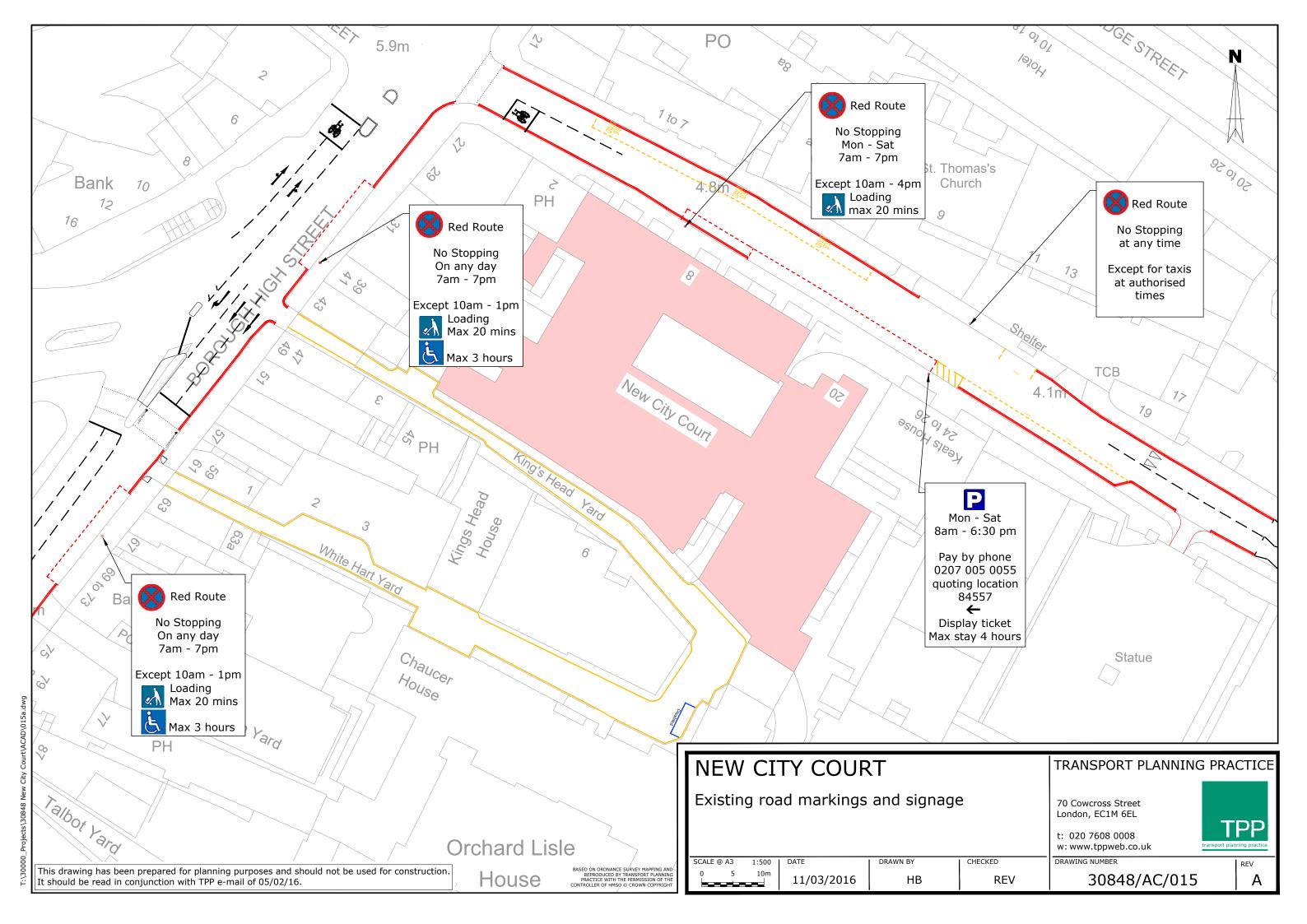
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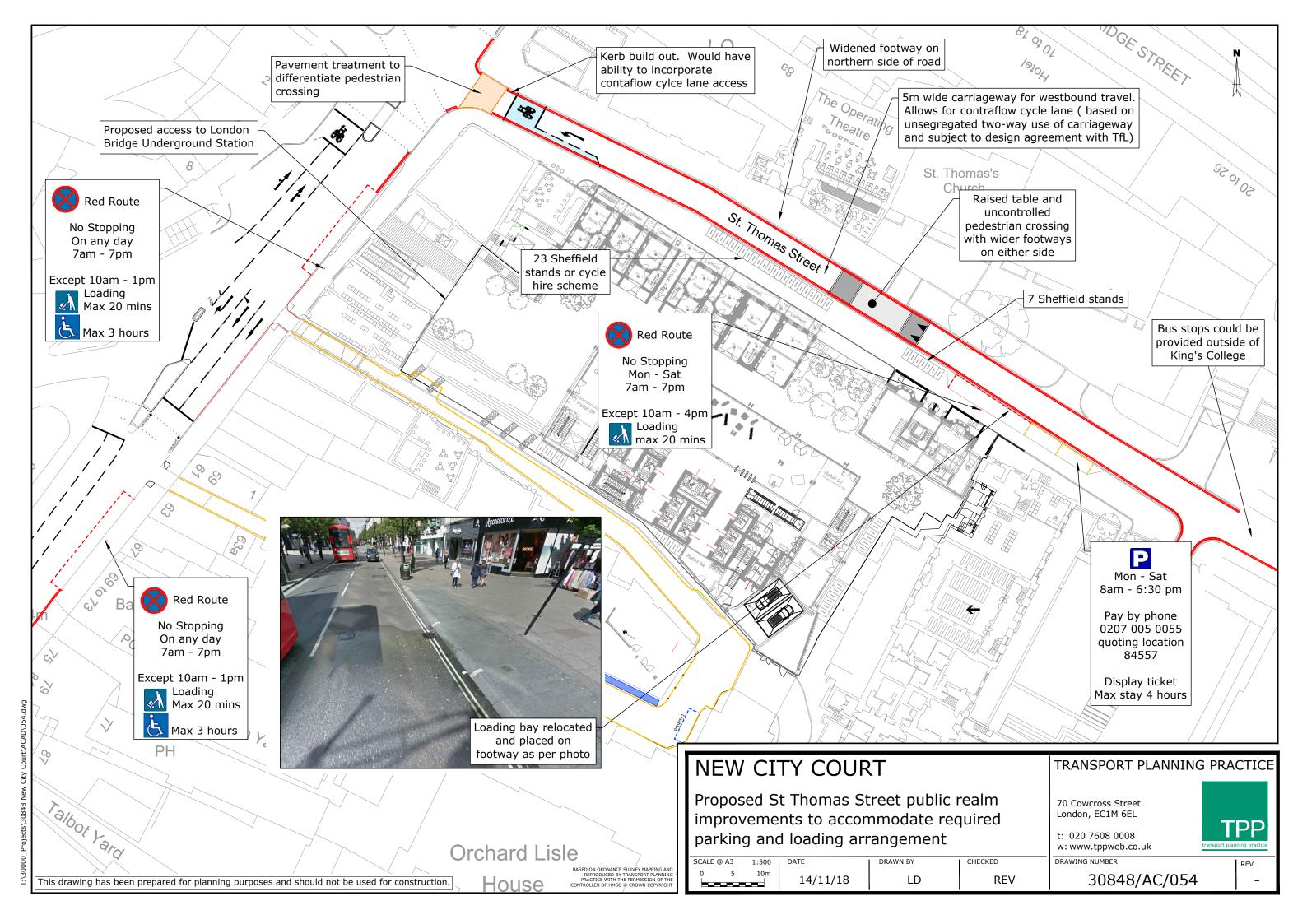
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Appendix E

Public Realm drawings





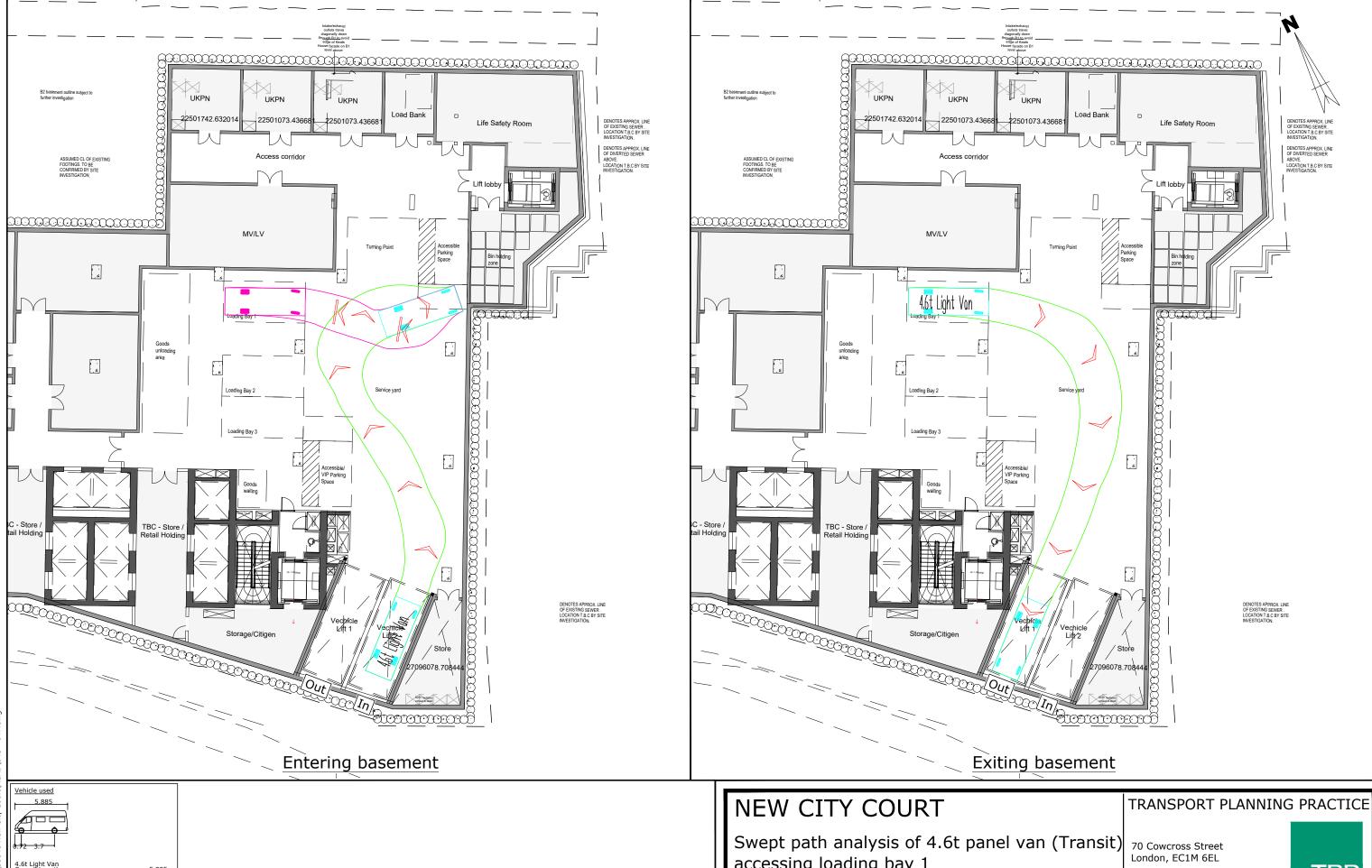


Appendix F

Swept path analysis – Service yard and St Thomas Street bay







accessing loading bay 1

03/08/18

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SCALE @ A3

Based on drawing number 14032_SK_0788_Rev C. TPP REF

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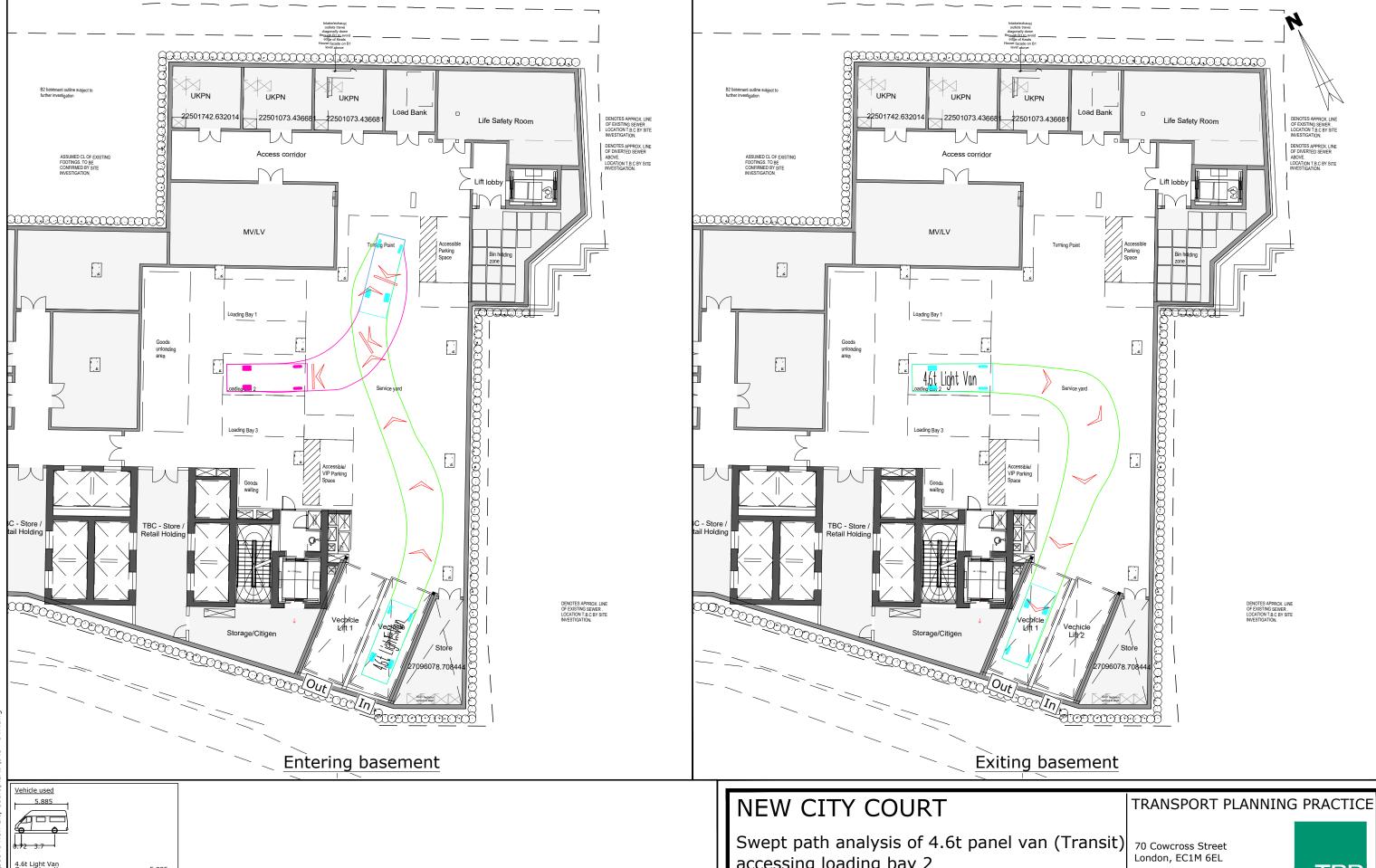
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Based on drawing number 14032_SK_0788_Rev C. TPP REF

accessing loading bay 2

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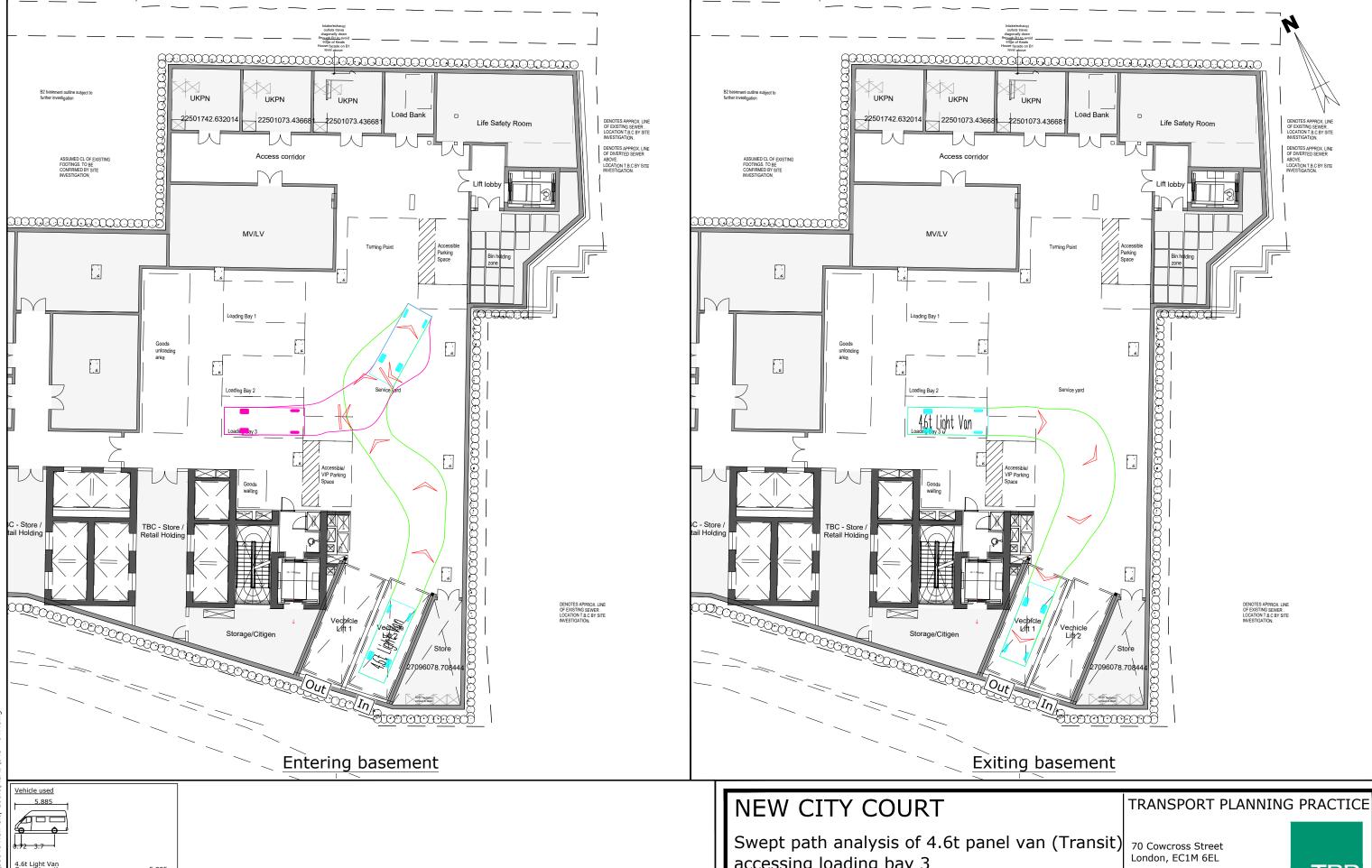
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t: 020 7608 0008 w: www.tppweb.co.uk transport planning practice

30848/AC/044



accessing loading bay 3

03/08/18

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SCALE @ A3

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	n analysis of disabled parl	_		t: 020 7608 0008	PP
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Large Car (2006)
Overall Length
Overall Body Height
Overall Body Height
Is Min Body Ground Clearance
Max Track Width
Lock to Lock Time
Kerb to Kerb Turning Radius

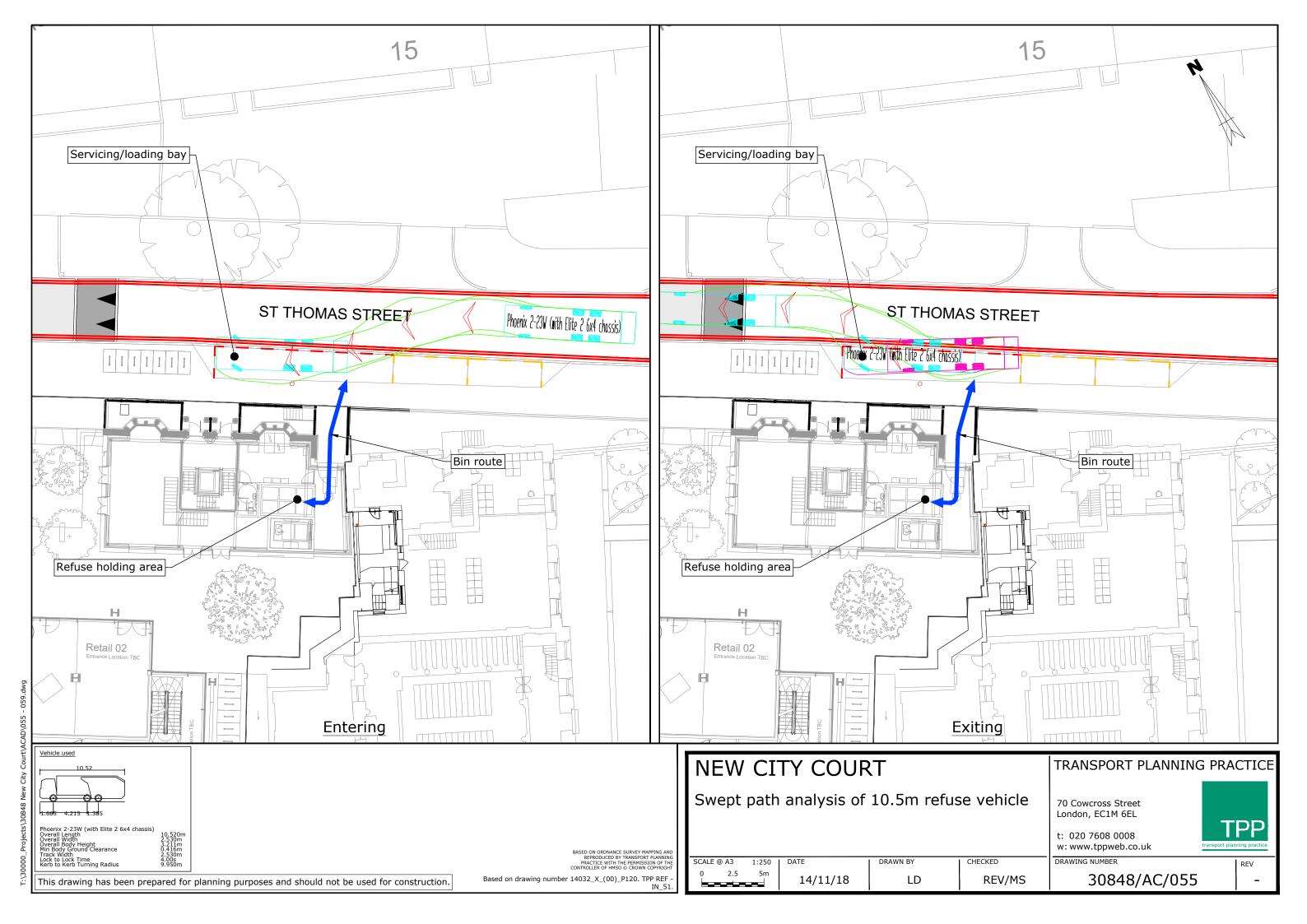
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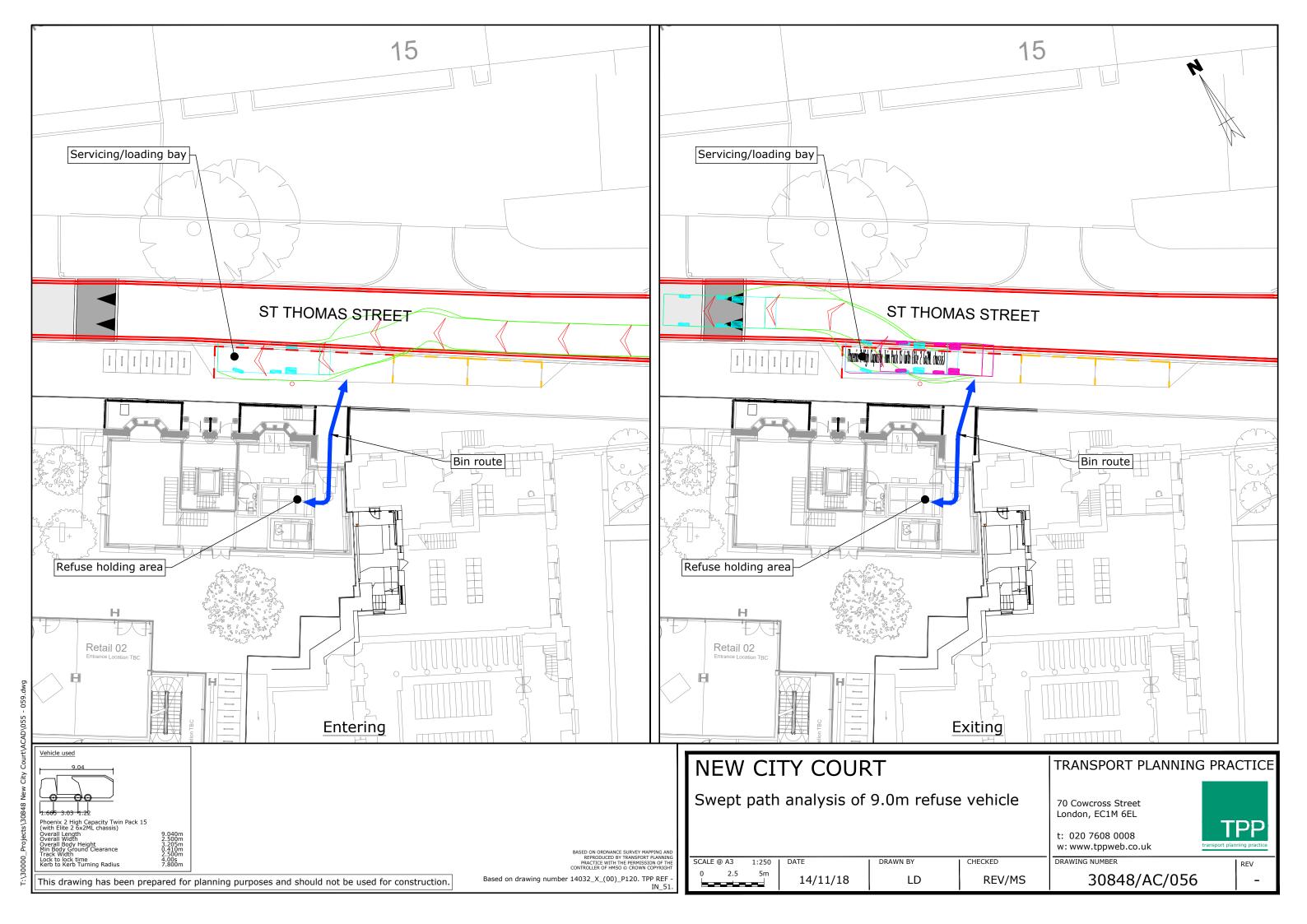
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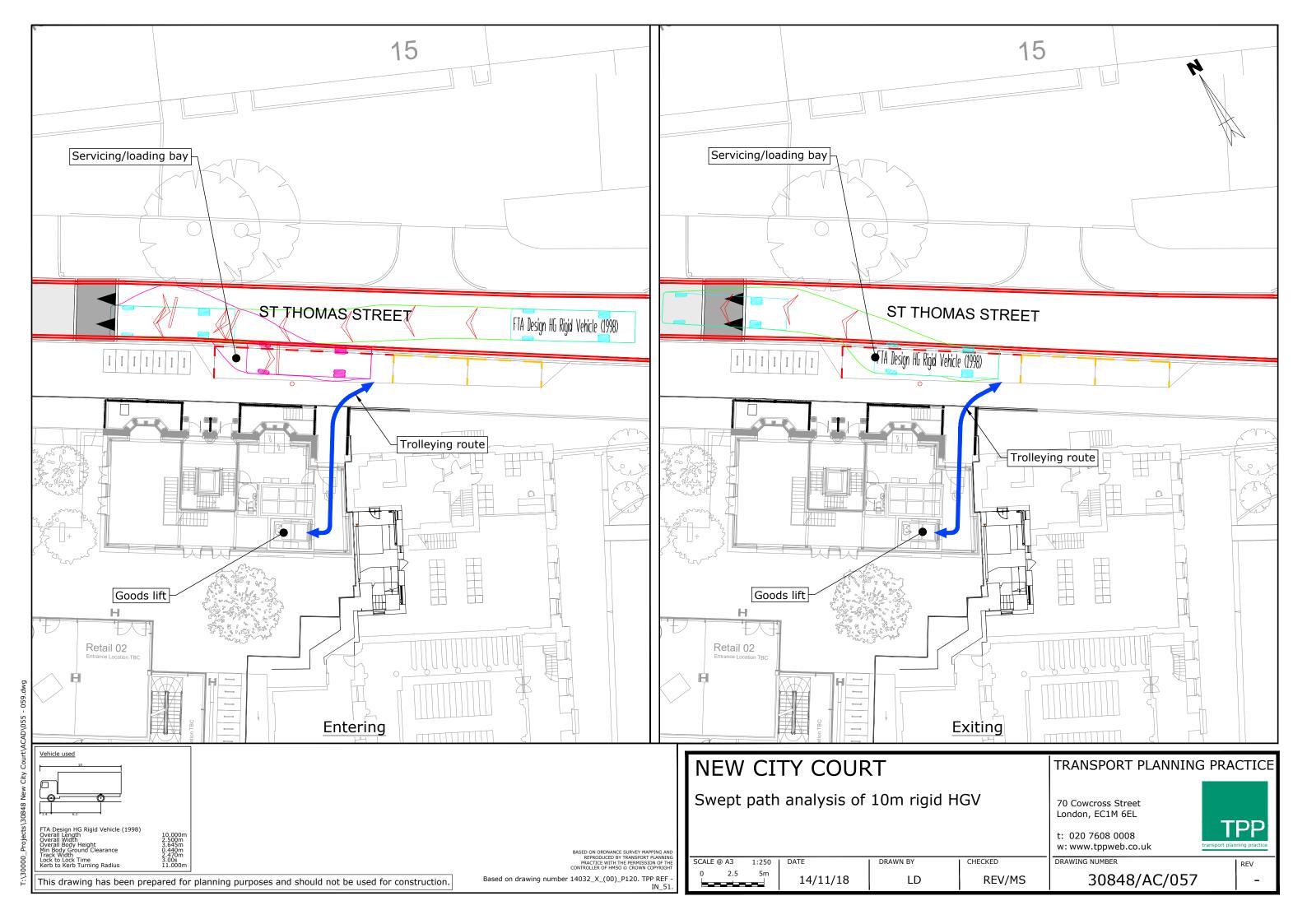
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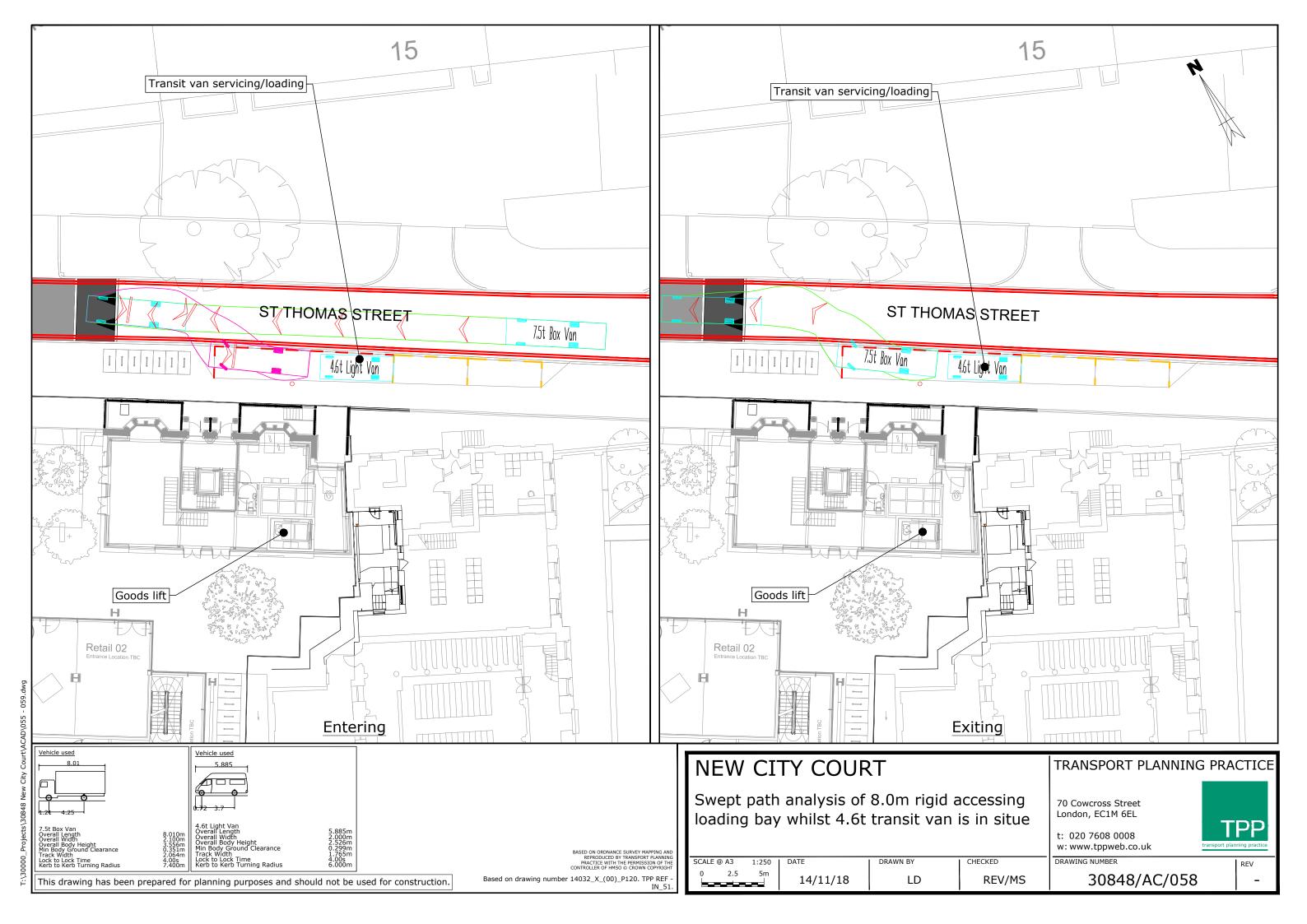
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NEW CITY COURT			TRANSPORT PLANNING PRACTICE		
	analysis of lisabled park	_		70 Cowcross Street London, EC1M 6EL t: 020 7608 0008 w: www.tppweb.co.uk	TPP
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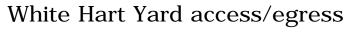


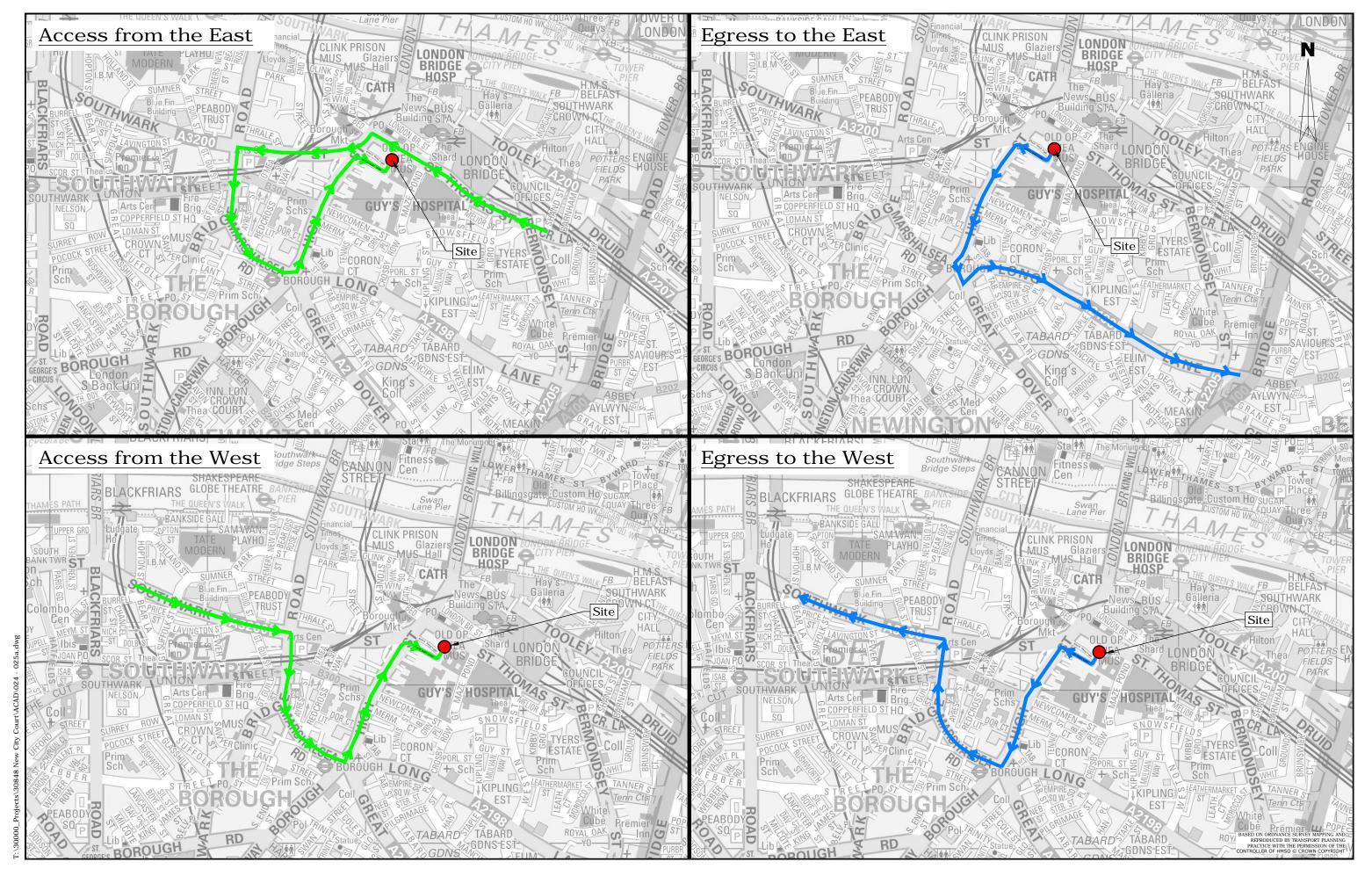
Appendix G

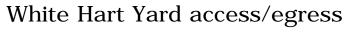
Proposed vehicle routes















St.Thomas Street access/egress (One-way)



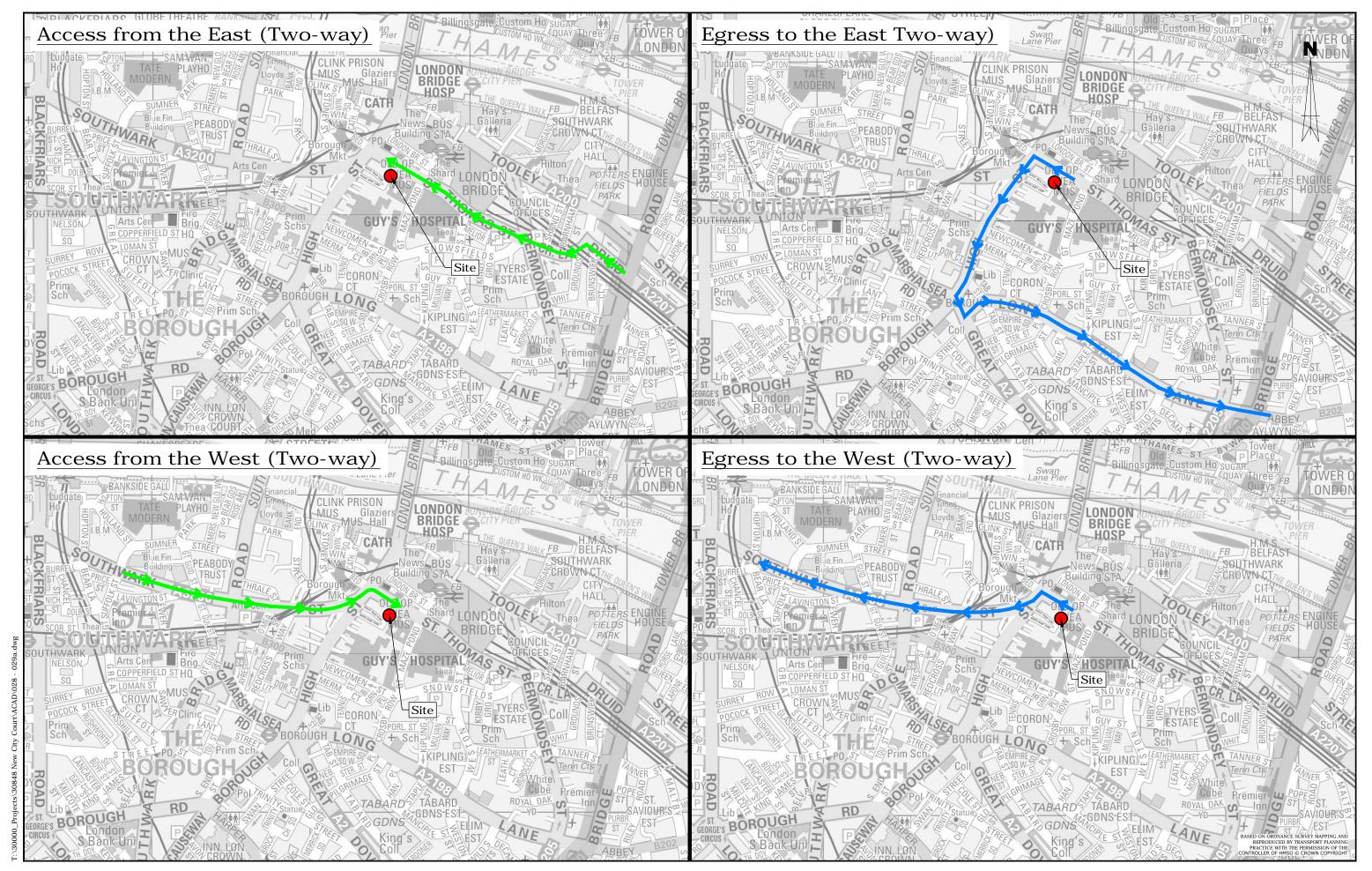


St.Thomas Street access/egress (One-way)





St. Thomas Street access/egress (Two-way)





Appendix H

Travel Plan





Travel Plan TPP

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1 INTRODUCTION

1.1 Background and context

1.1.1 Transport Planning Practice (TPP) has been appointed to provide transport planning advice in relation to the proposed redevelopment at New City Court within the London Borough of Southwark (LBS).

1.2 Existing site

- 1.2.1 The site is located in the London Bridge area covering an area of approximately 0.36 hectares (ha). It is bound by St Thomas Street to the north; shops on Borough High Street (A3) to the west; King's Head Yard to the south; and Guy's Hospital buildings to the east. It is currently almost entirely occupied by:
 - Georgian terraced townhouses at Nos. 4, 6, 8, 12, 14 and 16 St Thomas Street;
 - New City Court office building at No. 20 St Thomas Street; and
 - Keats House at Nos. 24 to 26 St Thomas Street.
- 1.2.2 The site has been subject to a site specific survey, which has included reviewing accessibility by disabled users and parents with children in buggies or scooters. A site location plan is included in Figure 1 and the site boundary is shown in Figure 2.

1.3 Proposed development

1.3.1 The proposals are for the comprehensive redevelopment of the site to include the demolition of the existing 1980s office building and erection of a 37-storey building (the Tower), the restoration and refurbishment of the existing listed terrace (the Georgian Terrace), and the redevelopment of Keats House to provide the following:



- 46,374m² GIA of Class B1 office floorspace;
- 1,904m² GIA of Class A1 & A3 retail floorspace;
- 615m² GIA of Class D2 gym floorspace;
- 719m² GIA Class B1/D2 HUB floorspace; and
- 825m² GIA Class D2 public garden floorspace.

1.4 Report Purpose

- 1.4.1 The purpose of this Interim Travel Plan (ITP) is to set out the strategy for maximising the use of public transport, walking and cycling amongst staff and visitors at the site.
- 1.4.2 As there will be no general car parking provided at the proposed development, the travel patterns have already been influenced towards the use of sustainable transport to the site. Therefore, the main objective of this ITP is to ensure that the site's location with excellent access to sustainable transport modes is taken advantage of and the predicted travel patterns to and from the development are achieved and maintained.
- 1.4.3 The proposed development is a mixed-use commercial scheme and this ITP is a Workplace Travel Plan covering employees of both the office and retail uses.
- 1.4.4 As the proposed development has not yet been constructed, this ITP is an interim document with the full Travel Plan expected to be secured via a planning condition or an obligation within the Section 106 agreement. This ITP has been prepared to accompany a full planning application for the site and has been developed as part of the feasibility and design stages.

1.5 Report structure

- 1.5.1 Following this introductory section, the report is structured as follows:
 - **Section 2: Existing transport conditions** describes the current site in relation to the transport network and its accessibility by different transport modes.



- Section 3: Expected travel patterns sets out the expected modal split.
- **Section 4: Aims, objectives and targets** sets out the objectives and aims of the document and targets against which the ITP will be assessed.
- Section 5: Proposed measures gives details of the proposed travel planning measures to help deliver sustainable patterns at the proposed development.
- **Section 6: Management and monitoring** explains how the ITP will be managed and monitored. An action plan is also provided.
- Section 7: Securing, enforcement and funding provides a summary of how the Travel Plan will be secured, enforced and funded.
- Chapter 8: BREEAM compliance demonstrates the ITP's compliance with BREEAM.



2 EXISTING TRANSPORT CONDITIONS

2.1.1 This section reviews the pedestrian, cycle and public transport facilities in the vicinity of the site and reviews the accessibility of the proposed development by these modes.

2.2 Pedestrian Network and Facilities

- 2.2.1 The site is located in an area with an established network of footways and pedestrian facilities. Due to its central London location, numerous public transport services and amenities can be accessed on foot. Details of the existing pedestrian infrastructure on each of the roads surrounding the site are provided below.
- 2.2.2 The key pedestrian desire lines are expected to be the footways of St Thomas Street and Borough High Street as they will provide access from the site to the nearest facilities for public transport. Another key pedestrian desire line is expected to be between the proposed development and the new London Underground exit proposed to be located adjacent to the proposed development's public square.

St Thomas Street

- 2.2.3 St Thomas Street provides footways on both sides of its carriageway. The width of the footways varies between 2m (near the junction with Borough High Street) to 5m (in the vicinity of London Bridge Station and Weston Street).
- 2.2.4 A signalised pedestrian crossing facility is located on St Thomas Street, near the junction with London Bridge Street and Bedale Street. The crossing is provided with tactile paving on the footways on both sides of the carriageway and zig-zag road markings.
- 2.2.5 Signalised pedestrian crossings are also located at the junction with Borough High Street and outside the entrance to London Bridge Station. Both crossings are provided with tactile paving on the footways on both sides of the carriageway. The footways of St Thomas Street are well lit as they are provided with light columns at regular intervals.

Borough High Street

2.2.6 Borough High Street provides footways on both sides of the carriageway. The footways are generally wide and provide a minimum width of approximately 3m.

TPP

- 2.2.7 Signalised pedestrian crossings are located on each arm of the four-arm junction between Borough High Street, St Thomas Street and Bedale Street. Signalised crossings are also provided at the junction between Borough High Street and Southwark Street, at the junction between Borough High Street and London Bridge Street and at the junction between Borough High Street and Duke St Hill.
- 2.2.8 The footways of Borough High Street are well lit as they are provided with light columns at regular intervals.

King's Head Yard and White Hart Yard

- 2.2.9 King's Head Yard is accessible from the south-eastern side of Borough High Street and provides narrow footways (approximately 1m-1.5m wide) on both sides of the carriageway.
- 2.2.10 White Hart Yard is also accessible from the south-eastern side of Borough High Street and offers very limited footway provision. The road is very lightly trafficked and is effectively used as a shared surface with pedestrians utilising the whole width of the yard and having priority over vehicles.

PERS Audit

- 2.2.11 A Pedestrian Environment Review System (PERS) Audit of the existing pedestrian network in the vicinity of the site has been undertaken.
- 2.2.12 It is noted that the local pedestrian environment will be undergoing changes as a result of the proposed development's public realm and TfL's proposals for St Thomas Street. Therefore, the pedestrian environment in the vicinity of the site by the time the proposed scheme is completed and operational will be different to the one currently in place. Notwithstanding this, the PERS audit was requested by TfL and LBS during pre-application discussions. The audit has been undertaken by Transport Research Laboratory (TRL).
- 2.2.13 A PERS audit has been undertaken of the existing pedestrian network surrounding the site including the area immediately south of London Bridge and around London Bridge Station.
- 2.2.14 It is noted that the local pedestrian environment will be undergoing changes as a result of the proposed development's public realm and also TfL's proposals for St Thomas Street. Therefore, the pedestrian environment in the vicinity of the site



by the time the proposed scheme is completed and operational will be different to the one currently in place.

- 2.2.15 Crossing points were also assessed and all were given a good or acceptable score with the exception of the diagonal crossing on Borough High Street.
- 2.2.16 The audit shows that at present, a number of links achieved a red rating which indicates a poor level of provision. These include on the southern side of St Thomas Street, on the southern side of Borough High Street outside of the site, on White Hart Yard and on King's Head Yard. The links have been scored based on several parameters with the worst scoring parameters being poor maintenance, user conflict, colour contract, tactile information and permeability. It is noted that this is the existing situation and the proposed development includes proposals which would improve the existing situation. The new entrance to the London Bridge Underground Station means that pedestrian conditions on St Thomas Street and Borough High Street are expected to improve as pedestrians divert through the site:
 - In respect of St Thomas Street, this will be subject to improvements as part of TfL's proposals and would be expected to provide good level of pedestrian provision once implemented.
 - In respect of King's Head Yard, this will become a largely car-free pedestrian route and will be adjacent to the new public square as part of the development proposals significantly enhancing this link.
 - With regard to White Hart Yard, the proposed development is not expected to add any additional pedestrians onto the yard and the pedestrian enhancements and new connection through the site seek to encourage pedestrians to divert from this link. Additionally, the audit assumed that pedestrians are limited to the limited footway provision on the yards whereas in reality, pedestrians are observed utilising the whole width with the yards operating as informal shared surfaces.

Access to local amenities

2.2.17 Given the site's central London location, there is a wide range of amenities and facilities within a walking distance. Additionally, the proposed development provides a mixed-use scheme meaning that a number of amenities will be



available directly within the site for the benefit of the employees and the wider public. Table 2.1 sets out a range of amenities within 500m of the proposed development.

Table 2.1 - Amenities within 500m

Amenity	Nearest Facility/Location
Food outlet	Cafes/restaurants on St Thomas Street and Borough High Street. Retail/restaurant provision within the proposed development itself.
Cash machine	Cash machines on Borough High Street.
Outdoor open space	Public squares directly within the proposed development.
Recreation or leisure facility for fitness or sport	Gym directly within the proposed development basement level.
Postal facility	Post office on Borough High Street.
Community facility	HUB space (D2) within the proposed tower.
Pharmacy	City Pharmacy on Borough High Street.
GP/Surgery	Guy's Hospital.
Childcare facility/school	The Arc Nursery, Crosby Row.

2.3 Cycle Network and Facilities

- 2.3.1 The site is located in close proximity to established cycle routes which provide access within the Borough and the wider area. Figure 3 shows the available network for cyclists and cycle facilities in the vicinity of the site including Cycle Superhighway 7 (CS7) and National Cycle Network Route 4.
- 2.3.2 Additionally, Weston Street and Bermondsey Street are located to the east of the site and are identified by TfL on their cycle maps as routes 'signed or marked for use by cyclists on a mixture of quiet or busier roads'. Tooley Street (north to the site) has been labelled in the same way.
- 2.3.3 Newcomen Street, Snowsfields and Crosby Row are local roads located to the west of the site which feature on the TfL cycle map as 'quieter roads recommended by other cyclists'.
- 2.3.4 Cycle parking facilities are provided throughout St Thomas Street in the form of Sheffield Stands. A cycle hire docking station is located on Tooley Street,



- approximately 400m (4-5 minute walk) to the north of the site. The docking station provides access to 20 bicycles.
- 2.3.5 Southwark Bridge Road is located to the west of the site and is part of Cycle Superhighway 7. The superhighway extends by approximately 13.7km (an approximate 45 minute cycle) and connects City, Southwark, Lambeth, Wandsworth and Merton.
- 2.3.6 Tooley Street forms part of the National Cycle Network Route 4, a long distance route between London and Fishguard via Reading, Bath, Bristol, Newport, Swansea, Carmarthen, Tenby, Haverfordwest and St Davids.
- 2.3.7 Given the above, it can be seen that the site is well located to the local cycle network.

2.4 Public Transport Accessibility Level

- 2.4.1 The industry standard accessibility indicator for London, the Public Transport Accessibility Level (PTAL) rating, has been used to identify the level of accessibility the site has to the local public transport network.
- 2.4.2 The site has been identified as being located in an area with a PTAL rating of 6b (the highest), indicating an excellent level of public transport accessibility.

2.5 Local Bus Services

- 2.5.1 The local area is served by several bus routes. London Bridge Bus Station is located within a 200m walking distance (2-3 minute walk) to the north of the site and provides access to bus stops 'B', 'C' and 'D'. Bus stop 'B' provides access to routes 521 and N343. Bus stop 'C' provides access to routes 43 and 141. Bus stop 'D' provides access to routes 149, N21 and N343.
- 2.5.2 Bus stops 'S' and 'R' are located on Duke St Hill within a 300m walking distance (3-4 minute walk) to the north of the site. Both bus stops are served by routes 47, 343, 381, N381 and RV1. Bus stop R is also served by route N199.
- 2.5.3 Bus stops 'M' and 'Y' are located on Borough High Street within a 320m walking distance (3-4 minute walk) to the north of the site. Bus stop 'M' is served by routes 17, 21, 35, 40, 43, 47, 48, 133, 141, 149, 344 and N21. Bus stop 'Y' is served by routes 17, 21, 35, 40, 47, 48, 133, N21, N133 and N199.



- 2.5.4 There are two bus stop located outside of The Hop Exchange on Southwark Street within a 250m walking distance (2-3 minute walk) to the west of the site. These bus stops are served by routes 344, 381, N343, N381 and RV1.
- 2.5.5 Bus 'Southwark Street' is located on Borough High Street within a 280m walking distance (2-3 minute walk) to the south-west of the site. The bus stop provides access to routes 21, 35, 40, 133, 343, N21, N133, and N343. Bus stop 'G' is located on Borough High Street within a 400m walking distance (4-5 minute walk) to the south-west of the site and is served by the same bus routes as bus stop 'Southwark Street'.
- 2.5.6 Bus stop 'BD' is located on Southwark Bridge Road within a 580m walking distance (5-7 minute walk) to the west of the site. The bus stop is served by route 344. A summary of the local bus services is provided in Table 2.2.



Table 2.2 - Summary of Local Bus Services

Bus	Stop Location Destination		Monday – Friday			
Route	Stop Location	•		PM Peak	Saturday	Sunday
48	Υ	London Bridge	Peak 6	6	6	5
40	М	Walthamstow Bus Station	6	6	6	5
343	S / Southwark Street	New Cross / Jerningham Road	7	7	8	6
	R / G	City Hall	8	8	8	6
21	Y / Southwark Street	Molesworth Street	9	9	8	5
	M / G	Newington Green	9	9	8	5
17	Y	London Bridge	7	7	6	4
17	М	Archway Station	8	8	6	4
	M / G	Duke's Place	8	8	6	4
40	Y / Southwark Street	Dulwich Library	7	7	6	4
	M / G	Shoreditch	6	6	6	4
35	Y / Southwark Street	Clapham Junction Station / Falcon Road	6	6	6	4
381	S / The Hope Exchange	County Hall	6	6	6	5
301	R / The Hop Exchange	Peckham Bus Station	6	6	6	5
344	M / The Hop Exchange	Appold Street	8	8	6	7
	BD	Clapham Junction Station	8	8	7	7
RV1	R / The Hop Exchange	Tower Gateway Station	4	3	3	3
S / The Hop Exchange		Covent Garden / Catherine Street	4	3	3	3
	В	London Bridge Station	20	20	-	-
521	В	Waterloo Station / Mepham Street	21	23	-	-
	С	London Bridge Station	8	8	8	5
141	C / M	Tottenhall Road	8	8	7	6
149	London Bridge Station	London Bridge Station	11	9	8	7
149	A / M	Edmonton Green Bus Station	11	9	7	7
	С	London Bridge Station	11	11	9	7
43	C / M	Halliwick Park or Archway Station	11	11	7	6
47	S/M	Shoreditch	6	6	5	3
47	R / Y	Catford Garage	5	5	5	3
	M / G	Great Winchester Street	11	11	7	4
133	Y / Southwark Street	Streatham Station	11	11	8	4
	To	tal	257	253	182	138



2.6 London Underground

2.6.1 This section summarises the London Underground services available from London Bridge Underground Station.

2.7 London Underground Services

2.7.1 The site is located approximately 50m from the Borough High Street entrance to London Bridge Underground Station. The Station is served by the Jubilee Line, which provides services towards Stratford and Stanmore and the Bank branch of the Northern Line, which provides services towards High Barnet, Mill Hill East, Edgware and Morden. Table 2.2 shows the peak hour frequencies at London Bridge Underground Station.

Table 2.3 - Services & Frequencies from London Bridge Underground Station

Service	Direction	Monday – Friday		Caturday	Sunday
Service	Direction	0800-0900	1700-1800	Saturday	Sunday
Jubilee Line	Westbound	30	30	24	24
Jubliee Lille	Eastbound	30	30	24	24
Northern Line	Northbound	25	23	20	20
	Southbound	23	23	20	20

- 2.7.2 Table 2.3 indicates that London Bridge Underground Station provides 30 Jubilee Line services and a minimum of 23 Northern Line services in both directions during the weekday AM and PM peak hours. Over Saturday and Sunday, the Station provides 24 hourly Jubilee Line and 20 hourly Northern Line services in both directions throughout the day.
- 2.7.3 Planning capacity figures obtained from TfL indicate that each Jubilee Line train has a planning capacity of 960 passengers. Based on the AM Peak frequency of 30 trains per hour per direction there is a planning capacity of 28,800 passenger per hour per direction (pphd) on the Jubilee Line. With regard to the Northern Line, each train is shown to have a planning capacity of 800 passengers and therefore capacity of 20,000 pphd in the northbound direction in the AM peak and 18,400 in the southbound direction. In the PM peak the capacity is 18,400 pphd in each direction.
- 2.7.4 Additionally, it is understood that there are proposals to enhance the capacity of the Jubilee Line and the Northern Line by increasing the peak hour frequencies



to 36 and 30 services per hour respectively although at present there are no confirmed timescales for the implementation of this.

2.8 National Rail

- 2.8.1 London Bridge National Rail Station provides services operated by Southern and Southeastern Rail and Thameslink. The Station provides services from Charing Cross to southeast London, Kent and East Sussex as well as destinations towards South East England.
- 2.8.2 Table 2.4 presents the peak hour frequencies of National Rail services departing from London Bridge National Rail Station. These include through trains heading north (Thameslink) or terminating / leaving London Charring Cross or Cannon Street as well as the services to the south, to destinations in Sussex, Kent and Surrey.

Table 2.4 - Services & Frequencies from London Bridge National Rail Station

Doctination	Monday – Friday		
Destination	0800-0900	1700-1800	
Bedford and northern destinations	11	13	
Other London Terminating Stations	53	29	
Sussex, Kent and Surrey	57	71	
Total	121	113	

2.8.3 As can be seen, there is a high number of services available from London Bridge with 121 and 113 individual trains in both directions during the AM and PM peak hour respectively.

2.9 River Taxi

- 2.9.1 The London Bridge City Pier is located approximately within a 550m walking distance (5-7 minute walk) to the north-east of the site. It is served by routes RB1, RB1X, RB2 and RB6.
- 2.9.2 RB1 and RB1X provide services between Westminster and North Greenwich. RB1 operates daily whereas RB1X provides additional services on the weekend. RB2 operates daily and provides services between Battersea Power Station and London Bridge City. RB6 provides services between Blackfriars to Canary Wharf on weekday mornings and evenings only.



2.9.3 The river services during the AM, PM and weekend peak hours are summarised below.

Table 2.5 - River Taxi Services

Service	Destination	AM Peak	PM Peak	Saturday	Sunday	
Service	Destination	0800-0900	1700-1800	Saturday	Sunday	
RB1	Westminster	3	1	2	2	
KDI	North Greenwich	2	3	2	2	
RB1X	Westminster	-	-	2	2	
KDIX	North Greenwich	-	-	2	2	
	Battersea Power Station	-	-	2	2	
RB2	London Bridge City	-	-	2	2	
DD6	Blackfriars	2	3	-	-	
RB6	Canary Wharf	3	1	-	-	

2.10 Car clubs

- 2.10.1 The nearest 'Car Club Only' bay provided by Zipcar is located on Tooley Street, within a 280m walking distance (3-4 minute walk) to the north-east of the site. The bay provides access to two vehicles. The vehicles available at this location are a Ford Zipcar Logo Focus and a Hyundai Zipcar Logo i30. A second 'Car Club Only' bay operated by Zipcar is located on Weston Street within a 400m walking distance (4-5 minute) to the south-east of the site.
- 2.10.2 Zipcar offer special business accounts to commercial users.



3 EXPECTED TRAVEL PATTERNS

3.1.1 The expected modal split for the employees of the proposed development is provided in Table 3.1. This has been established with reference to the most recent 2011 travel to work Census data for daytime population (i.e. journeys into the area) with adjustments made to account for the car-free nature of the proposed development. Full details regarding the trip generation methodology and assumptions are set in the Transport Assessment which accompanies this planning application.

Table 3.1 - Expected Modal Split

Мо	Modal Split %	
	Underground	28.2%
	Train	48.4%
Sustainable	Bus	10.2%
	Bicycle	5.6%
	On foot	5.1%
Sub-	total	97.5%
	Car	0.0%
	Taxi	0.2%
Other Modes	Motorcycle	1.5%
	Passenger in a car	0.4%
	Other	0.3%
Sub-	2.5%	
<u>Grand</u>	<u>100.0%</u>	

- 3.1.2 As can be seen from Table 3.1, the majority of the trips would be expected to be undertaken by public transport with train and the Underground making up approximately 77% of all trips. Given the lack of car parking at the proposed development (other than 2 disabled bays) and the on-street parking restrictions, no car trips associated with staff travel are expected.
- 3.1.3 It should be noted that the above modal split is provisional and will be recalculated once a baseline travel survey has been undertaken.



4 AIMS, OBJECTIVES AND TARGETS

4.1.1 This section outlines the aims, objectives and the proposed targets for the ITP.

4.2 Aims and objectives

- 4.2.1 The key aim of this ITP is to encourage staff and visitors to travel to and from the site using sustainable modes. As there will be no general car parking at the proposed development, the travel patterns have already been influenced ensuring the sustainability of the site. Therefore, the main objectives of this ITP are to:
 - Raise awareness of sustainable modes of travel available in the vicinity of the site.
 - Achieve and maintain the predicted sustainable travel patterns to and from the development.
 - Encourage the users of the site to move up within the sustainable transport hierarchy (e.g. from public transport to cycling and/or walking).

4.3 Targets

- 4.3.1 Targets are measurable goals by which the progress of the ITP will be assessed. Targets are essential for monitoring the progress and success of the Travel Plan. Targets should be 'SMART' specific, measurable, achievable, realistic and timebound.
- 4.3.2 Given that there will be no car parking at the site, the main focus of the ITP will not be about reducing the car mode share but instead the ITP will focus on increasing the mode share of cycling and walking.
- 4.3.3 The provisional targets for years, one, three and five are provided in Table 4.1.

Table 4.1 - Target Modal Split (provisional)

Mode	Baseline Mode Split	Interim Mode Split (Year 1)	Interim Mode Split (Year 3)	Target Mode Split (Year 5)
Bicycle	5.6%	7%	10%	12%
On Foot	5.1%	6%	7%	8%

4.3.4 It should be noted that the above targets are provisional and that they should be updated in line with the results of the baseline survey and subsequent travel



surveys undertaken at years 1, 3 and 5. The Travel Plan will be reviewed after each travel survey at which point if targets have not been achieved, amendments will be agreed between LBS and the Travel Plan Co-ordinator (TPC).



5 PROPOSED MEASURES

5.1.1 This section sets out a range of measures that will be implemented at the proposed development. These include initiatives that focus on ensuring that employees are made aware of all sustainable travel options to them.

5.2 Provision of travel information

5.2.1 Informing future employees of the range of travel choices available to them and providing them with information on the available facilities within the development will be an important part of the Travel Plan.

Travel Information Pack

- 5.2.2 Each commercial tenant will be provided with an Information Pack upon occupation of the development for distribution to their staff. The packs would be expected to include the following:
 - Information on the aims and objectives of the ITP, for example the environmental and health benefits of walking and cycling.
 - Information on travel planning website and phone apps such as TfL,
 DfT journey planners and CityMapper to raise awareness of transport options, and alternatives in case of delays or cancellations.
 - Information on service delay refunds.
 - Information on services and amenities provided locally.
 - Information on the cycle parking facilities, showers and lockers available at the proposed development along with the details on how these can be accessed.
 - TfL cycle route maps relevant to the local area which provides details of cycle routes and locations of the Santander Cycle Hire docks.
 - London Underground and bus service maps and timetables.

5.3 Initiatives to encourage walking cycling

5.3.1 Walking and cycling are considered the most important modes at a local level, being sustainable and healthy. As noted previously, information on the health benefits of walking and cycling as well a map showing the accessible areas by



these modes, will be provided within the Information Pack. Employees will also be made aware of the cycle tools available within the TfL journey planner.

5.4 Cycle parking and facilities

- 5.4.1 The proposed development aspires to provide an exemplary cycle storage and changing facility.
- 5.4.2 Facilities for cyclists are divided into long stay and short stay across the various users types on site, as per LBS and TfL's policies. Showers and lockers are also provided and located within easy reach of the cycle parking.
- 5.4.3 Cycle parking spaces and associated shower and locker provisions have been allocated across ground level and Basement Level 1. Short stay Sheffield stand parking has been provided at ground level and a mixture of double stacking racks, Sheffield stands and folding bike lockers are proposed at Basement Level 1 in secure access zones.
- 5.4.4 In total, the proposed development will provide 1,322 cycle spaces. Of these, 1,031 spaces will be for long-stay parking for the use of the staff with the remainder 291 spaces being allocated as short-stay spaces for visitors/customers.
- 5.4.5 Access to the basement for cyclists with bikes is provided from King's Head Yard via a combined cycle stair ramp with a special conveyor system to assist. This is wide enough to allow two people to pass on the stairs. A dedicated shuttle lift will allow cyclists to return to reception once bikes have been stored.

5.5 Bike2Work Scheme

5.5.1 As part of the information provided to the tenants, they will be provided with details on the Government's scheme aimed at encouraging people to purchase a bicycle to commute to work. The scheme allows people to purchase bicycles with a discount of up to 40% by not paying tax on their salary used to purchase the bicycle.

5.6 Cycle to work day

5.6.1 The Travel Plan Co-ordinator (TPC) could organise a cycle to work day as part of a sustainable travel week to encourage more cycle use. The feasibility of providing a free bikers' breakfast will also be explored.



5.7 Provision of showers and lockers

5.7.1 Staff will have access to a wellness facility located at basement level including 70 showers and 447 lockers.

5.8 Reducing the need to travel

5.8.1 Similar to many office developments, it is anticipated that it will be feasible for a proportion of employees to work from home for some of the working week reducing the need to travel. It is noted that this is dependent on the role of the employees and the flexibility of the businesses they work within. Additionally, an increased number of employees allow for staff to work flexibly allowing for travel outside of either the morning and/or the evening peak hour minimising the impact on the transport infrastructure.

5.9 Initiatives to encourage public transport use

5.9.1 The Information Packs will provide detailed information on the public transport services available from the site which will include route maps. Information on the TfL online journey planner and live bus stop tracking websites and smartphone applications will also be provided.

5.10 Measures for visitors/customers

- 5.10.1 The websites of tenants are likely to provide the main portal of information about access to the site. The websites are expected to include directions to the development including the various transport modes available.
- 5.10.2 The excellent public transport accessibility of the development and the lack of parking development are likely to have the greatest influence on travel choices of the visitors/customers.



6 MANAGEMENT AND MONITORING

6.1 Travel Plan Co-ordinator

- 6.1.1 A Travel Plan Co-ordinator (TPC) will be appointed by the site management company prior to first implementation of the development to be responsible for implementing, managing and promoting the Travel Plan. The TPC is expected to be a member of the site management team. The general responsibilities of the role will include:
 - Being available as a first point of contact for the building tenants to discuss transport issues;
 - Liaising with the local planning and highway authorities;
 - Providing Travel Information Packs for distribution to tenants;
 - Facilitating and be responsible for the monitoring of the ITP which will include undertaking surveys and preparing monitoring reports; and
 - Maintaining all necessary systems, data and paperwork.
- 6.1.2 The amount of time required to undertake the duties associated with the ITP will vary depending on the specific task. However, the TPC will allow sufficient time to carry out the measures outlined in the Action Plan and to undertake the maintenance of necessary systems, data and paperwork.

6.2 Monitoring

- 6.2.1 The monitoring regime for the proposed office has been determined with reference to the requirements set out by TfL's guidance. Given the scale of the proposed development, the Travel Plan will need to be monitored by means of TRICS compliant monitoring surveys.
- 6.2.2 Therefore a TRICS compliant travel survey will be undertaken when 75% of the development has been occupied. This will ascertain the baseline travel patterns and help set travel mode split targets.
- 6.2.3 The monitoring surveys will be commissioned by the TPC and will take place in years 1, 3 and 5 after the initial baseline survey. The TPC will examine the survey results against the targets and produce a monitoring report which will be submitted to LBS for input into TRICS.



6.3 Action Plan

6.3.1 This section includes a check list of the proposed measures detailing who will be responsible for ensuring that the actions identified in previous sections are delivered. The Action Plan for the proposed development is included in Table 6.1.



Table 6.1- Action Plan

	Management / A abit on a	NA/I	5 44	For the benefit of	
Objective	Objective Measures/Actions When		By Whom	Staff	Visitors
Objective 1	Appoint named Travel Plan Co- ordinator	Prior to first occupation	Developer	√	
* Raise awareness of sustainable modes of travel available	Provide Information Packs.	When tenants move in	TPC	√	
Objective 2 & 3	Provide secure cycle parking.	As part of proposals	Developer	√	√
* Maintain the predicted sustainable travel	Provide a wellness facility including showers and lockers.	As part of proposals	Developer	√	
patterns to and from the development; * Encourage users to move up within the sustainable transport hierarchy	Provide information on the Government's Bike2Work scheme	On full occupation	TPC	\checkmark	
* Ensure Travel Plan is monitored and targets are	Undertake a baseline survey.	Once 75% of development is occupied	TPC	√	√
being met	Undertake TRICS compliant survey and prepare monitoring reports	Years 1, 3 and 5	TPC	√	√



7 SECURING, ENFORCEMENT AND FUNDING

7.1 Securing

7.1.1 The future Travel Plan is expected to be secured through a condition of planning permission or an obligation to the Section 106 agreement. This document sets out the form of the Travel Plan and indicates the programme of monitoring that should be undertaken.

7.2 Enforcement

7.2.1 The future Travel Plan will be reviewed after five years at which point, if targets have not been achieved, amendments will be agreed between LBS and the TPC.

7.3 Remedial measures

7.3.1 As discussed above, following the baseline survey, monitoring will take place after 1, 3 and 5 years of occupation and targets will be assessed and adjusted accordingly to achieve the desired objectives. However, if the 5th year monitoring report concludes that the set targets have not been met, the applicant will fund an updated and more comprehensive travel information pack and enhance promotional measures to encourage staff to take part in the initiatives set out in the Travel Plan.

7.4 Funding

7.4.1 The applicant will fund the future Travel Plan for the initial five year period, including the costs related to monitoring surveys and reports.



8 BREEAM COMPLIANCE

8.1.1 Table 8.1 shows the BREEAM criteria and the sections of the Travel Plan that addresses them.

Table 8.1 – BREEAM Criteria and Compliance

	5 6.1 - BRELAN CITCEITA AND COMPHANCE	Located in Travel Plan/	
No.	Item	Comments	
		Commence	
1	A Travel Plan has been developed as part of the feasibility and design stages.	Yes - See paragraph 1.4.4.	
	Where relevant, existing travel patterns and opinions of existing building or site users towards cycling and walking so that constraints and opportunities can be identified.	Not applicable, the scheme is a complete redevelopment of the existing site providing a different offer in terms of public realm in and around the site and high quality cycle parking facilities, shower and lockers.	
	Travel patterns and transport impacts of future building users.	See section 3 – Expected Travel Patterns.	
	Current local environment for walkers and cyclists (accounting for visitors who may be accompanied by young children).	See Sections 2.2 and 2.3.	
2	Disabled access (accounting for varying levels of disability and visual impairment).	The landscape design has been coordinated such that easy mobility impaired user access is maintained throughout the site. Level access is provided to office and retail space within Keats House and also a lift has been provided to allow for inclusive access to all floors. Within the Georgian townhouses, there is a level access to the retail space from at rear from the New Yard. Given that the building is Grade Two Listed the existing stepped entrance on St Thomas Street is being preserved. Within the proposed tower, lift access is provided to all office floor levels. All retail units within the tower have level access at ground floor. Accessible cyclists will have use of the goods lift to the south-east end of the site to gain access to the cycle provisions in the basement. See also the Design and Access Statement for further details and which refers to accessibility, social inclusion and safety.	
	Public transport links serving the site. Current facilities for cyclists.	See Section 2.6. The proposed development will provide cycle parking, showers and lockers which meet BREEAM standards – See paragraph 5.4 and	
3	The travel plan includes a package of measures to encourage the use of	5.7. Section 5 for proposed measures.	



	sustainable modes of transport and movement of people and goods during the buildings operation and use.	
4	If the occupier is known, they must be involved in the development of the Travel Plan	Occupier is unknown at present.
5	Confirm that the travel plan will be implemented post construction and supported by the buildings management in operation.	The TPC will be responsible for implementing, managing and promoting the travel plan to occupiers – see section 6. This will be secured by a relevant planning condition or obligation under S106.

8.1.2 To satisfy the requirements of Table 7.1 of the Travel Plan assessment criteria Table 2.1 of this report is replicated below.

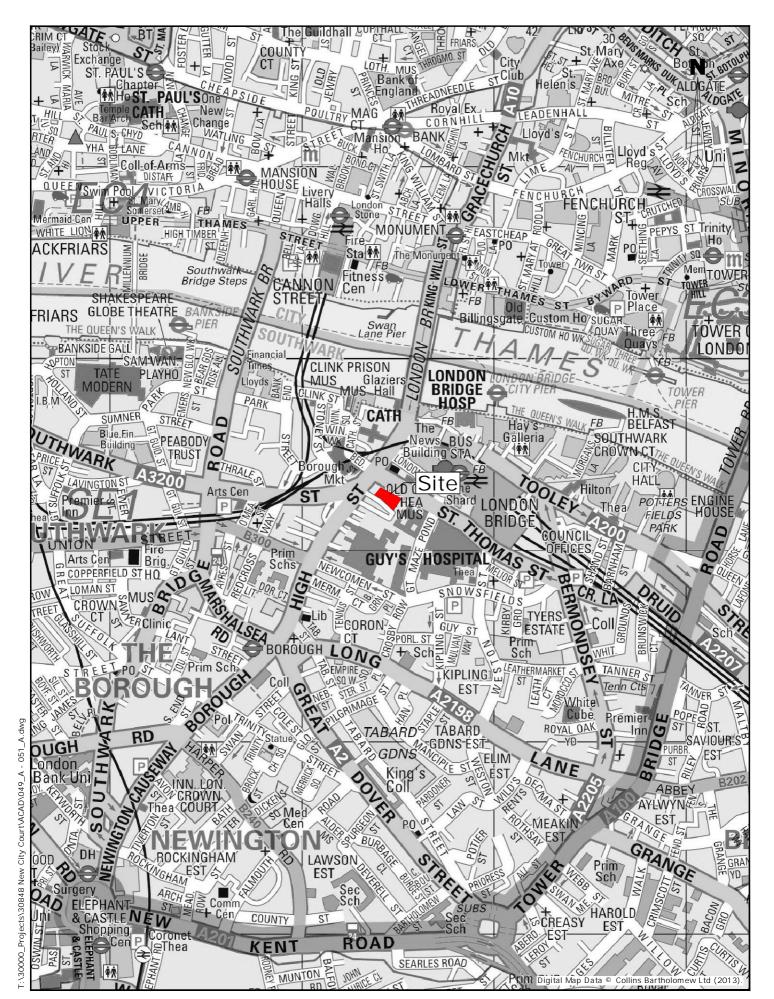
Amenities within 500m

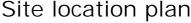
Amenity	Nearest Facility/Location
Food outlet	Cafes/restaurants on St Thomas Street and Borough High Street. Retail/restaurant provision within the proposed development itself.
Cash machine	Cash machines on Borough High Street.
Outdoor open space	Public squares directly within the proposed development.
Recreation or leisure facility for fitness or sport	Gym directly within the proposed development basement level.
Postal facility	Post office on Borough High Street.
Community facility	HUB space (D2) within the proposed tower.
Pharmacy	City Pharmacy on Borough High Street.
GP/Surgery	Guy's Hospital.
Childcare facility/school	The Arc Nursery, Crosby Row.



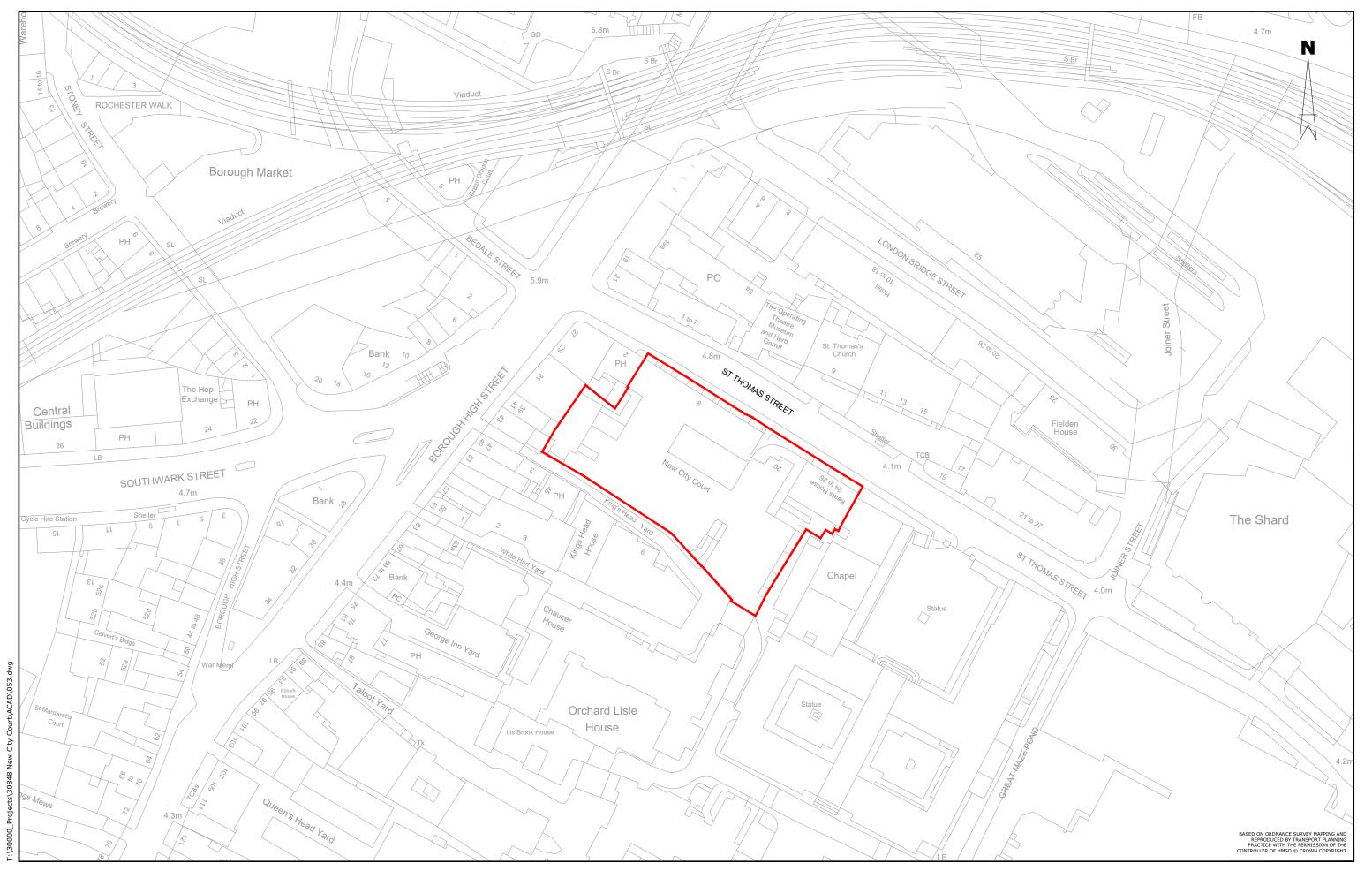
Figures





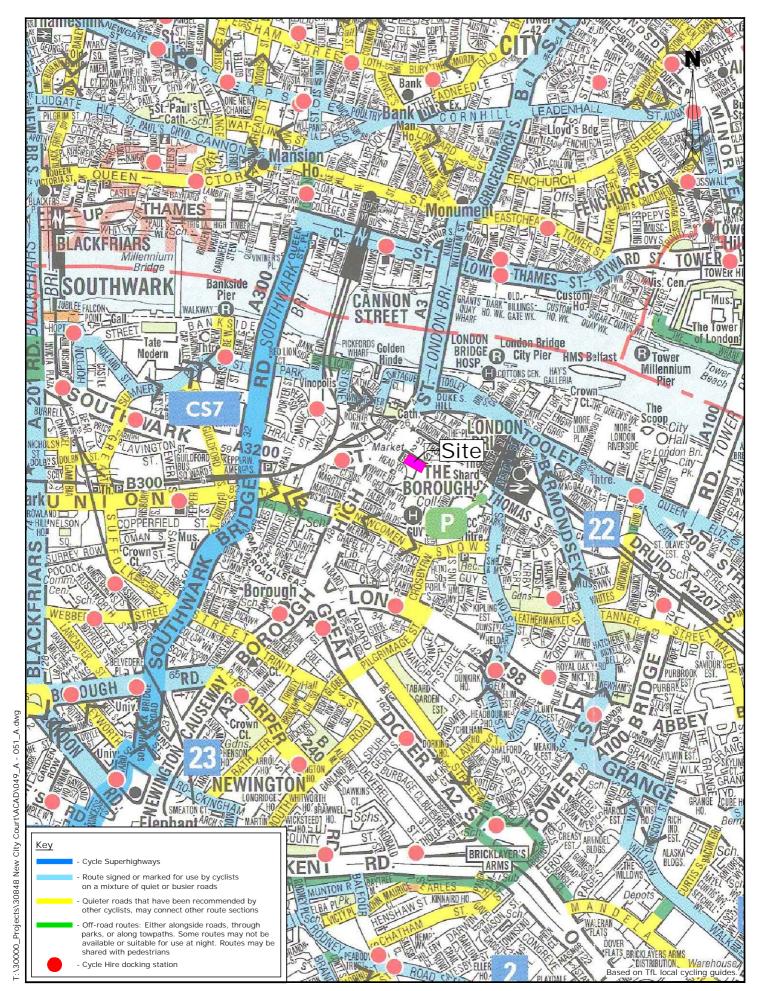








Site Boundary Plan





Local cycle network