

# REPORT

## **Transport Statement**

Boston House, Fitzroy Square, Fitzrovia

Client: New College of the Humanities

Reference: PB9504-RHD-ZZ-XX-RP-Z-0001

Status: P01.3/Final

Date: 02 August 2019

HASKONINGDHV UK LTD.

2 Abbey Gardens  
Great College Street  
London  
SW1P 3NL  
Transport UK  
VAT registration number: 792428892

+44 207 2222115 **T**  
info.london@uk.rdhv.com **E**  
royalhaskoningdhv.com **W**

Document title: Transport Statement

Document short title: Boston House TS  
Reference: PB9504-RHD-ZZ-XX-RP-Z-0001  
Status: P01.3/Final  
Date: 02 August 2019  
Project name: New College of the Humanities  
Project number: PB9504  
Author(s): Ben Chimes

Drafted by: Ben Chimes

---

Checked by: Andy Ward

---

Date / initials: 29/07/19 aw

---

Approved by: Andy Ward

---

Date / initials: 31/07/19 aw

---

Classification

Project related



## Disclaimer

*No part of these specifications/printed matter may be reproduced and/or published by print, photocopy, microfilm or by any other means, without the prior written permission of HaskoningDHV UK Ltd.; nor may they be used, without such permission, for any purposes other than that for which they were produced. HaskoningDHV UK Ltd. accepts no responsibility or liability for these specifications/printed matter to any party other than the persons by whom it was commissioned and as concluded under that Appointment. The integrated QHSE management system of HaskoningDHV UK Ltd. has been certified in accordance with ISO 9001:2015, ISO 14001:2015 and OHSAS 18001:2007.*

## Table of Contents

<b>1</b>	<b>Introduction</b>	<b>1</b>
1.1	Preface	1
1.2	Scope of Assessment	2
1.3	Report Structure	2
<b>2</b>	<b>Existing Baseline</b>	<b>3</b>
2.1	Overview	3
2.2	Site Accessibility	3
2.3	Local Highway Network	3
2.4	Walking	3
2.5	Cycling	4
2.6	London Underground	5
2.7	Bus	6
2.8	Review of Collision Data	7
2.9	Summary	8
<b>3</b>	<b>National, Regional and Local Policy</b>	<b>9</b>
3.1	Preface	9
3.2	National Policy	9
3.3	Regional Policy	11
3.4	Local Policy	11
3.5	Summary	12
<b>4</b>	<b>Proposed Development</b>	<b>13</b>
4.1	Development Overview	13
4.2	Proposed Access Strategy	13
4.3	Cycle Parking Provision	13
4.4	Car Parking Provision	14
4.5	Delivery and Servicing	14
4.6	Summary	14
<b>5</b>	<b>Trip Attraction</b>	<b>15</b>
5.1	Overview	15
5.2	First Principles Approach	15
5.3	TRICS Comparison	16
5.4	Net Trip Attraction	17

<b>5.5</b>	<b>Summary</b>	<b>18</b>
<b>6</b>	<b>Travel Plan</b>	<b>19</b>
6.1	Overview	19
6.2	NCH Travel Plan	19
6.3	Summary	19
<b>7</b>	<b>Summary and Conclusion</b>	<b>20</b>
7.1	Summary	20
7.2	Conclusion	21

## **Appendices**

**Appendix A – Proposed Site Layout**

**Appendix B – TfL PTAL Report**

**Appendix C – TRICS Output Reports**

**Appendix D – Method of Travel to Work Census Data**

# 1 Introduction

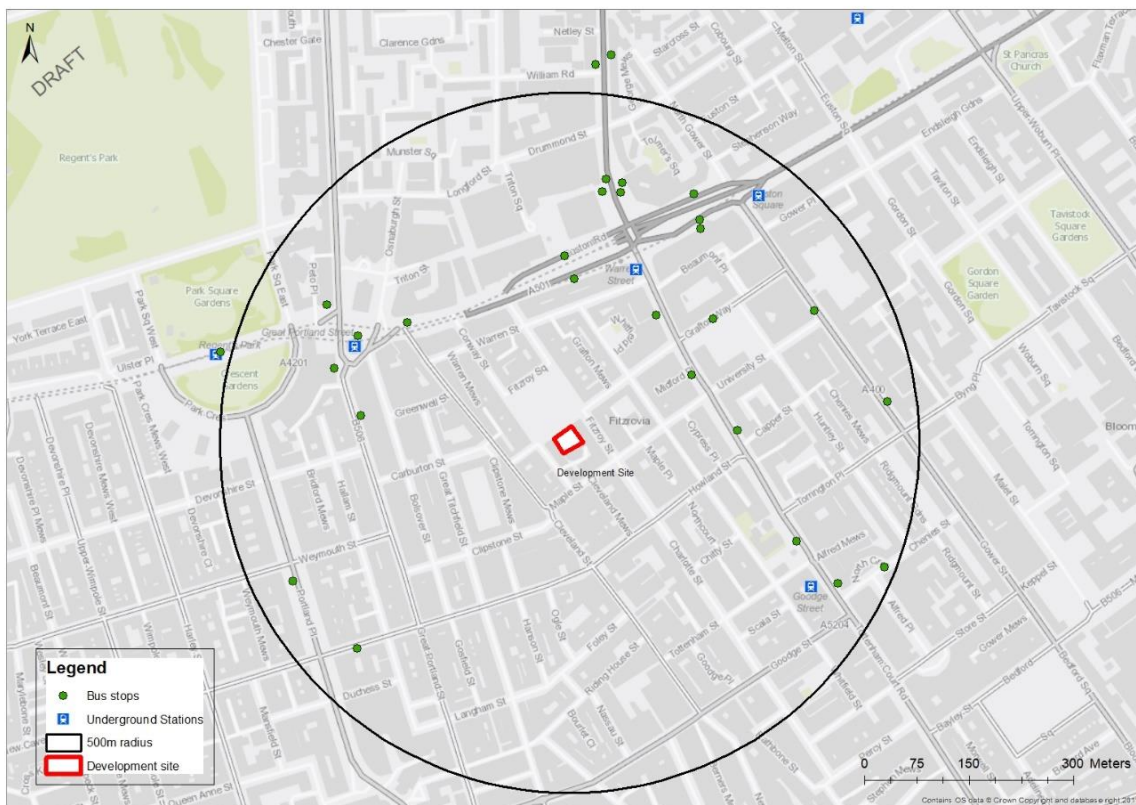
## 1.1 Preface

1.1.1 This Transport Statement (TS) has been prepared by Royal HaskoningDHV (RHDHV) on behalf of the New College of the Humanities (NCH) to accompany a planning application for the refurbishment and change of use of Boston House, Fitzroy Square, Fitzrovia, London, W1T 6EY. The local planning authority is the London Borough of Camden. A site location plan is provided in **Insert 1.1**.

1.1.2 Boston House currently accommodates office floor space under (Use Class B1) and the application shall be for a change of use from office (Class B1a) to a flexible use for use as either offices (B1a) and/or a non-residential education institution (Class D1). The NCH currently educates around 200 students at their current NCH site at Bedford Square, and are seeking to expand the student population to 600 students. It is understood that Boston House accommodates circa 1,860sq.m of floor space (gross floor area). A proposed site plan is provided in **Appendix A**.

1.1.3 This TS considers the transport implications of the proposed development and assesses whether the residual cumulative impacts of the development proposals are severe in respect of the requirements of the National Planning Policy Framework (NPPF, June 2019).

### Insert 1.1: Site Location Plan



## 1.2 Scope of Assessment

1.2.1 The scope of assessment contained herein is determined by the planning policy requirements of the London Borough of Camden. These requirements are contained in the Borough's adopted Local Plan (2017), policy A1 of which states that *"The Council will seek to protect the quality of life of occupiers and neighbours. We will grant permission for development unless this causes unacceptable harm to amenity."* The purpose of this TS is to set out the site accessibility by all modes of travel, estimate the likely development travel demand, assess any impact on the local transport network and establish whether the development is proposed in a manner that accords with adopted planning policy and associated best practice guidance.

## 1.3 Report Structure

1.3.1 Following this introduction, the TS is structured as follows:

- **Section 2** describes the local highway network and provides a summary of accessibility by non-car modes of travel. A review of personal injury road traffic collision data recorded in the vicinity of the site is also provided.
- **Section 3** provides a summary of national, regional and local planning policy relevant to the development proposals.
- **Section 4** describes the development proposals, including site access and cycle parking provision. The proposed delivery and servicing arrangements are also described.
- **Section 5** quantifies the development's anticipated trip generation using data provided by the NCH. A review is also provided of travel patterns at comparable sites from the TRICS database.
- **Section 6** provides details of the proposed NCH Travel Plan.
- **Section 7** provides a summary and conclusion to this document.

## 2 Existing Baseline

### 2.1 Overview

- 2.1.1 NCH is a university-level college founded in 2012, with the aim of providing education in the humanities and social sciences. Currently, there are approximately 200 students enrolled at NCH.
- 2.1.2 Boston House is situated at 36-38 Fitzroy Square, a large square enclosed by Georgian terraces with a large central private garden. Boston House was previously used as an office and call centre, with approximately 200 people working in the building. Boston House is served directly from Fitzroy Square and has no associated parking.

### 2.2 Site Accessibility

- 2.2.1 The site is situated a short walk from Regents Park, Great Portland Street, Warren Street, Euston Square, Russell Square, Goadge Street and Tottenham Court Road London Underground stations. Furthermore, onward connections can be made to national rail, London Overground and Eurostar services from Euston and London Kings Cross St Pancras stations.
- 2.2.2 Transport for London (TfL) publish Public Transport Accessibility Level (PTAL) ratings for the whole of Greater London on a scale of 1 to 6, with 1 being “poor” and 6 being “excellent “. TfL suggests that Boston House achieves a PTAL rating of 6b, the highest level of public transport accessibility. The full PTAL report is contained within **Appendix B**.

### 2.3 Local Highway Network

- 2.3.1 In terms of the local highway network, Fitzroy Square is accessed from Conway Street, Grafton Way and Fitzroy Street. Whilst these streets all lead to Fitzroy Square, the roadway around the square is not a public highway. This is denoted with a raised road surface, change in surface treatment and ‘no motor vehicle’ signage. Other approaches to the Fitzroy Square are controlled with bollards and ‘no entry except for cycles’ signage.
- 2.3.2 Pedestrian access is currently provided from Fitzroy Square. There are footways with street lighting on all sides of Fitzroy Square, connecting the site to the wider pedestrian network.
- 2.3.3 Parking restrictions for residential permit holders only are in place on all streets leading to Fitzroy Square. The area is within Parking Controlled Zone (CPZ) Zone CA-E which is in effect Monday to Saturday 8:30am to 18:30pm.

### 2.4 Walking

- 2.4.1 In terms of accessibility by foot, it is widely recognised that walking is the most important mode of travel at the local level and offers the greatest potential to replace short car trips, particularly those under 2 kilometres (km). There is potential for staff, student and visitor trips to be undertaken on foot.

- 2.4.2 Fitzroy Square is largely pedestrianised, with a carriageway on the northern side of the Square only for vehicular movement. The adjacent streets, within the vicinity of the Square, are supported by a network of footways of good standard, running along both sides of the streets and providing a comprehensive network to support pedestrian connectivity around the site and to the wider area.
- 2.4.3 Street lighting is present within Fitzroy Square and its adjacent streets. Our observations are that the local footways are in a good state of repair and are well maintained. Dropped kerbs and tactile paving are located at the pedestrian crossing on the four corners of Fitzroy Square and along all of the junctions in the surrounding area of the site to assist wheelchair users and parents pushing children's' buggies.
- 2.4.4 The Department for Transport's statistical release 'National Travel Survey, England' identifies that *"walking is the most frequent mode used for very short distance trips: 76% of all trips under one mile are walks"*. For staff and students, walking is likely to form an important element of part of a longer public transport journey. The distance to key transport nodes and services is given in **Table 2.1**. All destinations referenced in **Table 3.1** are accessible on foot from the site.

**Table 2.1: Walking Distance to Public Transport Services**

Mode	Location	Distance (m)
Bus	Warren Street (Stop X)	260
	Great Portland Street (Stop H)	350
London Underground	Warren Street (Northern and Victoria)	350
	Great Portland Street (Circle, Hammersmith and City, and Metropolitan)	400
	Regent's Park (Bakerloo)	600
National Rail	London Euston	850

## 2.5 Cycling

- 2.5.1 It is generally accepted that cycling can offer a realistic alternative to the private car for journeys up to 5km in length, although it is not uncommon for lengthier journeys to be undertaken via this mode on regular occasions, particularly to places of work. A 5km catchment around the site encompasses a significant proportion of central London, and extends to Highgate to the north, Hammersmith in the west, Vauxhall to the south and Whitechapel to the east. Recognising that many journeys to work are undertaken over a distance of greater than 5 kilometres (km), travelling to work by cycle is likely to be a viable option for a high proportion of students and staff.
- 2.5.2 Cycle facilities are available in the vicinity of the site with cycle lanes provided on a number of local carriageways. Cycle lanes with kerbs that segregate a cyclist from traffic are located along Maple Street to the south of the site and University Street to the east.
- 2.5.3 TfL publishes guides for cycling in London which include routes recommended by experienced cyclists. The guides include signed cycle routes, quieter and less busy streets, greenways through parks and along canals, stations with cycle parking and details of the Cycle Superhighways, which are accessible from the wider area. Cycle Superhighways are cycle routes from outer London into and across central London. They are designed to provide safer, faster and more direct journeys



into the city. The closest Cycle Superhighway to the site is Cycle Superhighway 6, which routes on Tavistock Place, approximately 1.2km to the east.

- 2.5.4 Quietways are cycle routes which use less-busy backstreets across London and are clearly marked with purple signs. Quietways are ideal for cyclists who want to cycle on lower-traffic streets, or new cyclists to London. Quietway routes 2 and 3 pass close to the site. Quietway 2 runs east to west from Walthamstow to nearby Bloomsbury, while Quietway 3 runs north from Regent's Park to Gladstone Park. There are also a number of alternative quieter signed or recommended routes that utilise the side roads adjacent to this Quietway. These connect to other cycle routes to provide access to the wider area.
- 2.5.5 The London Cycle Hire scheme offers a self-service bike sharing cycle hire scheme for short journeys. It does not require membership and allows people to hire a bike from one of the docking stations located around London. There are 25 Santander Cycle Hire Docking Stations (CHDSs) located by Warren Street station with a further 15 docking stations provided on Bolsover Street to the south-east of Great Portland Street station, approximately 400m from the site.
- 2.5.6 In summary, the site has good links to the surrounding residential and central London attractions in all directions and to the wider area, thus offering accessibility for cyclists.

## 2.6 London Underground

- 2.6.1 The site is located close to six London Underground stations, which are all within walking distance of the site and all within Travelcard Zone 1. The stations and their approximate walk distances are as follows:
- Warren Street, 350 metres (m)
  - Great Portland Street, 400m
  - Euston Square, 500m
  - Goodge Street, 600m
  - Regent's Park, 600m
  - Euston, 850m
- 2.6.2 Warren Street station is served by the Northern and Victoria lines, being located between Euston and Goodge Street stations. The entrance to the station can be accessed at the junction between Warren Street and Tottenham Court Road. Bus routes 14, 18, 24, 27, 29, 30, 73, 88, 134, 205 and 390 serve the station. Goodge Street station is also served by the Northern Line, while Euston is served by both Northern and Victoria Lines. Both these stations are unlikely to be destinations for pedestrian trips to/from the site because Warren Street station offers the same transport connections and is a closer distance to the site.
- 2.6.3 Great Portland Street station is located on a traffic island at the northern end of Great Portland Street which marks the border between Marylebone and Fitzrovia. The station is served by the Metropolitan, Hammersmith and City, and Circle Lines. Bus routes 18, 27, 30, 88, 205, 453 and C2 serve the station.
- 2.6.4 Euston Square station is located at the corner of Euston Road and Gower Street and is served by the Metropolitan, Hammersmith and City, and Circle Lines. Bus routes 10, 14, 18, 24, 27, 29, 30, 73, 88, 134, 205 and 390 serve the station.

2.6.5 Regent's Park underground station is located on Marylebone Road by Regent's Park. The station is served by the Bakerloo line and lies between Baker Street and Oxford Circus stations. Bus routes 18, 27, 30, 88, 205, 453, and C2 serve the station.

## 2.7 Bus

2.7.1 There are a number of bus stops locally, within a walk distance of the site, including an interchange facility between buses and London Underground services at Euston Station. Many of the very frequent bus services operating in the vicinity of the site stop at Great Portland Street Station and Warren Street Station.

2.7.2 There are 12 regular bus services which can be accessed from the various bus stops in the immediate vicinity of the site, as shown in Error! Reference source not found. 1.1 of this report.

2.7.3 The nearest bus stop to the site is located in Warren Street (Stop X), which is close to Warren Street underground station, located approximately 260m from the site. This bus stop provides access to bus services including 24, 29, 73, 134, and 390.

2.7.4 Great Portland Street (Stop H) bus stop is located on Euston Road and is approximately 350m away from the site. This bus stop provides access to bus services including 18, 27 and 205.

2.7.5 A summary of bus services accessible close to the site is presented in **Table 2.2**.

**Table 2.2: Summary of Bus Services from Warren Street and Great Portland Street**

Service	Route	Typical Weekday Daytime Service Frequency - per hour	Service	Route	Typical Weekday Daytime Service Frequency - per hour
453	Marylebone to Deptford	4 – 9 minutes	14	Putney Heath to Russell Square	6 – 8 minutes
24	Grosvenor Road to Royal Free Hospital	8 -11 minutes	30	Oxford Street to Hackney	7 – 10 minutes
134	University College Hospital to North Finchley	5 – 8 minutes	88	Parliament Hill Fields to Clapham	6 – 9 minutes
390	Archway to Victoria	4 – 7 minutes	18	Sudbury to Euston Station	3 - 7 minutes
73	Stoke Newington to Oxford Circus	4 – 8 minutes	27	Hammersmith to Chalk Farm	6 – 8 minutes
29	Trafalgar Square to Wood Green	4 – 8 minutes	205	Paddington to Mile End	7 – 10 minutes

- 2.7.6 The site is located close to three mainline railway stations: London Euston, King's Cross and St Pancras. London Euston is located approximately 850m from the site, while King's Cross and St Pancras stations are adjacent to each other, both located approximately 1.5km from the site.
- 2.7.7 London Euston station is managed by Network Rail and is connected to Euston underground station via an escalator on the main concourse. Euston accommodates services operated by Virgin Trains, West Midlands Trains, the London Overground, and the Caledonian Sleeper. London Underground services can also be accessed from Euston.
- 2.7.8 The Caledonian Sleeper provides two overnight services to cities in Scotland from Sunday to Friday.
- 2.7.9 There is a bus station directly in front of the main entrance which provides access to bus services, including 10, 73, 205 and 390.
- 2.7.10 King's Cross mainline railway station and St Pancras station are located adjacent to each other, separated by Pancras Road. Beneath both stations is King's Cross St Pancras underground station which connects the two and forms one of the UK's largest transport hubs. Bus routes 10, 30, 73 and 390 serve the stations.
- 2.7.11 King's Cross is the southern terminus of the East Coast Main Line to the North East of England and Scotland and is managed by Network Rail. The station has services operated by London North Eastern Railway, Thameslink and Great Northern, Hull Trains and Grand Central.
- 2.7.12 St Pancras is the London terminus for Eurostar's high speed trains to Belgium, France, and the Netherlands via the Channel Tunnel. Domestically, the station is the terminus for services operated by East Midlands Trains, Southeastern and a mainline station for Thameslink.
- 2.7.13 Currently under construction is High Speed 2 (HS2) which would have its London terminus at Euston and is intended to provide access to high-speed services to Birmingham, and later, Leeds and Manchester. As part of the development plans, Euston underground station would be connected to Euston Square station.

## 2.8 Review of Collision Data

- 2.8.1 In terms of highway safety, Personal Injury Collision (PIC) data has been obtained from TfL for a defined study area. The data includes all personal injury collision for a five year period. The study area incorporates Fitzroy Square and the streets that lead from the square for a distance of 50m from the square.
- 2.8.2 Only one serious PIC was recorded within the study area. On 15 March 2017, at 11:00am, a collision occurred at the Grafton Way junction with Whitfield Road involving a motorcycle and a light goods vehicle. An adult motorcyclist was seriously injured.
- 2.8.3 The review of collision data has indicated that there are no clear trends relating to collision causation or location, and as such it can be concluded that the local highway does not constitute a road safety liability. As Boston House is 'car free' it can, therefore, be concluded that there is no inherent highways safety issue at Fitzroy Square. It is also anticipated that the development proposals would not have a material impact on the safety of the local highway network.

## **2.9 Summary**

- 2.9.1 In summary, the site is accessible by non-car modes with a number of public transport services, multi-modal opportunities. TfL's PTAL rating identifies that the site has excellent accessibility by public transport, with a PTAL rating of 6b, the highest rating available.
- 2.9.2 A review of collision data for the most recent five-year period concluded that the development proposals are not anticipated to have a material impact on the safety of the local highway network.

### 3 National, Regional and Local Policy

#### 3.1 Preface

3.1.1 This section sets out the national, regional and local transport planning policies that are relevant to the development proposals.

3.1.2 Reference is made to the following policy documents:

- National Planning Policy Framework (2019);
- New London Plan (December 2017);
- Camden Local Plan (July 2017); and
- Camden Planning Guidance Transport (March 2019).

#### 3.2 National Policy

##### ***National Planning Policy Framework (NPPF June 2019)***

3.2.1 The current National Planning Policy Framework (NPPF) was published in June 2019. It is defined as being the document that “*sets the Government’s planning policies for England and how these are expected to be applied*”. The NPPF sets a framework within which locally prepared plans for housing and other documents can be produced.

3.2.2 The NPPF is not a transport specific document; rather it sets out the Government’s general requirements for the planning system. The NPPF incorporates guidance for local planning authorities when defining their local plans and in determining planning applications. The purpose of the planning system, as identified in the NPPF, is to contribute to the achievement of sustainable development, with three ‘dimensions’ identified as supporting this purpose. These dimensions are:

- Economic – by identifying and coordinating development requirements in order to build a competitive, responsive and strong economy;
- Social – by supporting strong, vibrant and healthy communities;
- Environmental – by contributing to the protection and enhancement of the natural, built and historic environment.

3.2.3 With regard to considering transport associated with new developments, the NPPF states that all developments that generate significant amounts of movements should be supported by a Transport Assessment or Travel Plan so that the likely impacts of the proposal can be assessed. The identified documents should ensure that:

- Appropriate opportunities to promote sustainable transport modes can be – or have been – taken up, given the type of development and its location;
- Safe and suitable access to the site can be achieved for all users;
- Any significant impacts from the development on the transport network (in terms of capacity and congestion), or on highway safety, can be cost effectively mitigated to an acceptable degree.

3.2.4 Development should only be prevented or refused on highways grounds if there would be an unacceptable impact on highway safety, or if the residual cumulative impacts on the road network would be severe.

3.2.5 Within this context, the NPPF requires that applications for development should:

- *Give priority first to pedestrian and cycle movements, both within the scheme and with neighbouring areas; and second – so far as possible –facilitate access to high-quality public transport, with layouts that maximise the catchment area for bus or other public transport services, and appropriate facilities that encourage public transport use;*
- *Address the needs of people with disabilities and reduced mobility in relation to all modes of transport;*
- *Create places that are safe, secure and attractive – which minimise the scope for conflicts between pedestrians, cyclists and vehicles, avoid unnecessary street clutter, and respond to local character and design standards;*
- *Allow for efficient delivery of goods, and access by services and emergency vehicles; and*
- *Be designed to enable charging of plug-in and other ultra-low emission vehicles in safe, accessible and convenient locations.*

***National Planning Practice Guidance (Transport evidence bases in plan making and decision taking)***

3.2.6 The National Planning Policy Guidance (NPPG), March 2014, states that Transport Assessments and Travel Plans can positively contribute to the following, amongst other factors:

- *encouraging sustainable travel;*
- *lessening traffic generation and the associated detrimental impacts;*
- *creating accessible, connected, inclusive communities; and*
- *reducing the need for new development to increase existing road capacity or provide new roads.*

3.2.7 The NPPG identifies key contents of a TS, including:

- *‘the planning context of the development proposal;*
- *road trip generation and trip distribution methodologies and/or assumptions about the development proposal; and*
- *measures to promote sustainable travel.’*

3.2.8 The Guidance states that TA’s, TS’s and Travel Plans (TP’s) should be proportionate to the size and scope of the proposed development, be tailored to local circumstances and be established at the earliest practicable possible stage of a development proposal.

### 3.3 Regional Policy

#### *New London Plan (December 2017)*

- 3.3.1 The New London Plan was published by the Mayor of London for consultation in December 2017 and is a material consideration in planning decisions. As the document has not been formally adopted the significance given to the policies contained within is a matter for the decision maker, but the document gains more weight as it moves through the process towards adoption. TfL has stated that they expect proposed developments to adhere to the policies of the New London Plan.
- 3.3.2 Chapter three of the New London Plan considers design matters. Policy D1 relates to London's form and characteristics and Section 3.1.6 states that *“the design and layout of development should reduce the dominance of cars and provide permeability to support active travel (public transport, walking and cycling), community interaction and economic vitality.”*
- 3.3.3 The policy goes on to say that development plans should encourage and facilitate active travel with convenient and inclusive pedestrian and cycling routes, crossing points, cycle parking, and legible entrances to buildings, that are aligned with peoples' movement patterns and desire lines in the area.
- 3.3.4 Policy D7 relates to Public Realm, policy D7(B) states that *“development plans and development proposals should maximise the contribution that the public realm makes to encourage active travel and ensure its design discourages travel by car and excessive on-street parking, which can obstruct people's safe enjoyment of the space. This includes design that reduces the impact of traffic noise and encourages appropriate vehicle speeds.”*
- 3.3.5 In terms of parking, Policy L requires that on-street parking is designed so that it is not dominant or continuous, and that there is space for green infrastructure as well as cycle parking in the carriageway. Pedestrian crossings should be regular, convenient and accessible.
- 3.3.6 Chapter 10 of the New London Plan considers transport, policy T2 (A) states that *“Development proposals and Development Plans should deliver patterns of land use that facilitate residents making shorter, regular trips by walking or cycling.”*
- 3.3.7 The New London Plan expects development proposals to demonstrate the application of the Mayor's Healthy Streets approach in order to reduce car dominance, road danger, community severance, emissions and noise.

### 3.4 Local Policy

#### *Camden Local Plan 2017*

- 3.4.1 The Camden Local Plan was adopted by the Borough in July 2017. The local plan replaced the Core Strategy and Camden Development Policy documents as the basis for planning decisions and future development within the borough.
- 3.4.2 The Camden Local plan explains that: *‘The Council will consider the impacts of movements to, from and within a site, including links to existing transport networks via transport assessments, travel plans, delivery and servicing management plans and construction management plans.’* The preparation of this TS and the associated TP, therefore, accords with local plan guidance.



- 3.4.3 The Local Plan states that the council will promote sustainable transport by prioritising walking, cycling and public transport in the borough. Policy T1 goes on to say: *Cycling is an increasingly popular and sustainable means of travel which we hope to encourage further. We will also expect cycle parking to be convenient and secure, so that users of a development are more likely to use bicycles to travel to and from a site. Details regarding cycle parking standards and design can be found within our supplementary planning document Camden Planning Guidance on transport.*

***Camden Planning Guidance Transport March 2019***

- 3.4.4 The Camden Planning Guidance (CPG) on Transport supports the policies in the Camden Local Plan 2017. This guidance is therefore consistent with the Local Plan and forms a Supplementary Planning Document (SPD) which is an additional material consideration in planning decisions.
- 3.4.5 On car parking provision, Section 5.2 states: *Our car-free policy makes an important contribution towards the Council's strategic aims relating to transport, as well as wider responsibilities such as public health. These include reducing congestion, promoting sustainable transport, improving air quality, reducing carbon emissions and supporting healthy, active sustainable lifestyles. It also enables land to be used more efficiently. Over the duration of the Plan period, the Council will therefore seek to capitalise on opportunities arising from development, to achieve a net reduction in its overall stock of parking spaces throughout the borough.*
- 3.4.6 On cycle parking, Section 8.6 explains: *As stated in the Local Plan Policy T1, the Council will expect developments to provide, as a minimum, the number of cycle parking spaces as set out in the London Plan. The Council will also seek an additional 20% of spaces over and above the London Plan standard to support the expected future growth of cycling for those that live and work in Camden.*

### **3.5 Summary**

- 3.5.1 It is considered that the proposed development shall accord to local, regional and national planning policy guidance. This TS has been produced in accordance with the NPPF objectives and local planning policy.



## 4 Proposed Development

### 4.1 Development Overview

- 4.1.1 The proposals do not include any alterations to the façade of Boston House and no external works to the building is proposed. The development proposals would only require an internal fit-out and refurbishment of the current building to provide a new education space for NCH.
- 4.1.2 The proposed development seeks to provide 1,860sq.m of floor space (D1 Use Class) which would be occupied by the NCH. The proposed development would not require any changes to the existing external layout or site access arrangements. The proposed site layout is illustrated on the architect's site plan, provided in **Appendix A**.
- 4.1.3 The NCH employ 35 administrative staff, 28 full-time and 32 part-time academic staff. On average 50 staff are on site at any one time.
- 4.1.4 The proposed development would, when fully operational, accommodate up to 60 staff and 600 students, however, not all students and staff would be on-site at any one time. There are aspirations for the college to educate 1,000-1,200 students in the long term.
- 4.1.5 During the Autumn term only, up to 300 overseas students attend the NCH as part of their studies. This TS considers travel patterns during a 'typical day'. On the basis that these additional over-seas students only attend the site for 13 hours per week for twelve weeks they have not been included within the assessment.
- 4.1.6 The NCH operate a three-term system. Two terms of twelve weeks in the autumn and spring, and a summer term of eight weeks. In effect there would be 22 weeks a year when there is teaching in the building. Furthermore, students only have 13 teaching hours per week and are not on-site every day.

### 4.2 Proposed Access Strategy

- 4.2.1 The existing pedestrian entrance from Fitzroy Square would be retained and would continue to provide the main pedestrian route into the site. All other access and servicing arrangements shall remain the same post-development.

### 4.3 Cycle Parking Provision

- 4.3.1 In terms of cycle parking, LBC policy states that development should provide "*accessible, secure cycle parking facilities exceeding minimum standards outlined within the London Plan*". The London Plan standard would require one space per four full time education staff + one space per 20 full time education students. Finally, one space per 7 full time education students for visitors.
- 4.3.2 It is anticipated that the proposed development could employ up to 60 members of staff and cater for up to 600 students. As detailed in the next section, it is anticipated that 218 staff and students could be on-site at any one time. The proposed development shall provide 42 cycle parking spaces for staff, students and visitors. The proposed level of cycle parking would be in excess of the London Plan Standards for the likely number of students and staff on-site at any one time.

- 4.3.3 The proposed level of cycle parking provision would provide an additional cycle parking capacity to meet extra demand between classes if required.
- 4.3.4 Cycle shelters offering safe, secure and convenient cycle parking are to be provided adjacent to the main entrance of the building. A plan showing the proposed cycle store locations is provided in **Appendix A**.

## 4.4 Car Parking Provision

- 4.4.1 The London Borough of Camden's adopted Local Plan (2017) states that: *"The Council will limit the availability of parking and require all new developments in the borough to be car-free."* The document goes on to state that *"Car-free development means that no car parking spaces are provided within the site other than those reserved for disabled people and businesses and services reliant upon parking, where this is integral to their nature, operational and/or servicing requirements (e.g. emergency services, storage and distribution uses)."*
- 4.4.2 It is proposed that in line with the existing site layout that no parking is provided on-site. This approach is in accordance with the relevant policy and the site's level of public transport accessibility (PTAL 6b). Subsequently, providing no additional parking on-site is considered acceptable. Visitors and blue badge holders shall be able to utilise the on-site car parking on nearby streets, including on-street disabled bays near the site on Grafton Way.

## 4.5 Delivery and Servicing

- 4.5.1 The NCH currently receives between five and ten deliveries per day. The number of servicing trips associated with the proposals is not anticipated to change.
- 4.5.2 Delivery and servicing are proposed to be undertaken from Fitzroy Square. This is consistent with the existing delivery and servicing arrangements at the site. Based on the nature of the proposed development, it is anticipated that delivery and servicing would be undertaken using refuse vehicles and small vans.

## 4.6 Summary

- 4.6.1 The proposed development consists of the change of use of Boston House from B1 Office to D1 Higher Education. The development would consist of internal refurbishment works only and would not change the existing site layout. The development proposals would result in no increase in parking at the site or changes to the existing delivery and servicing arrangements.

## 5 Trip Attraction

### 5.1 Overview

5.1.1 This section of the TS provides an assessment of the proposed development in terms of trip generation by all modes. The objective is to provide an indication of any likely development related impact on the surrounding transport network and infrastructure.

### 5.2 First Principles Approach

5.2.1 Data provided by NCH indicates that typically a maximum of 70 access cards are used daily by staff and students. Whilst some entries may relate to the same person entering and exiting on more than one occasion, the data demonstrates that no more than 28% of the current total number of staff and students (200 students and 60 staff) are on-site each day.

5.2.2 When fully operational the NCH population shall consist of 60 staff and 600 students, however, not all students and staff would be on-site at any one time.

5.2.3 It is anticipated that the current attendance ratio (28%) would continue at the Boston House site. For the purposes of a robust assessment, it shall be considered that up to 50 of the total 60 staff shall be on-site each day and the 28% attendance ratio shall be applied to students only. Subsequently, when this attendance ratio is applied to the proposed 600 student population it is anticipated that overall 218 people could attend college per day.

5.2.4 Each student and member of staff arriving, and departing is considered as one two-way trip. Students moving between classes would occur within the building and would not result in trips on the local transport network. It has been assumed that all staff arrive prior to the start of the teaching day (09:00) and depart after the teaching day ends (17:00). It is considered that students would arrive and depart within these times.

5.2.5 To apportion these trips to a method of travel, a staff and student travel survey was undertaken at the NCH in July 2019, with 142 respondents. The results of the staff and student travel survey are presented in **Table 5.1**.

**Table 5.1: NCH Staff and Student (2019) Travel Survey Results – Existing Accommodation**

Main Mode of Travel	Count	Percentage
Car	1	1%
Walk	35	25%
Public Transport	95	66%
Taxi	0	0%
Cycle	11	8%
<b>Total</b>	<b>142</b>	<b>100%</b>

5.2.6 It is considered that the mode share presented in **Table 5.1** would be comparable to the Boston House as both are locations are subject to a PTAL level of 6b.

5.2.7 When applying the recorded mode share to the anticipated maximum number of people on-site

(28% of students and 100% of staff) the resultant daily two-way trips are presented in **Table 5.2**.

**Table 5.2: Proposed Development Anticipated Daily Multi-Modal Trip Generation**

Mode	Mode Share	Number of Two-way Trips
Car	1%	2
Walk	25%	55
Public Transport	66%	144
Taxi	0%	0
Cycle	8%	17
<b>Total</b>	<b>100%</b>	<b>218</b>

5.2.8 As shown in **Table 5.2**, the predominance of trips associated with the NCH is anticipated to be undertaken by public transport, as would be expected for a site subject to a PTAL level of 6b.

### 5.3 TRICS Comparison

5.3.1 In order to compare the likely trip attraction associated with the proposed College use to the existing office use, an assessment of the multi-modal trip attraction has been undertaken using data stored within the TRICS database.

#### *Existing Office Use*

5.3.2 In order to establish trips associated with the existing B1 office use, the TRICS v7.6.1 database has been interrogated. The full TRICS output is provided in **Appendix C** of this TS. The following TRICS sites selection criteria have been applied:

- Land Use Class 02A Employment (Office); and
- Sites located within All England including Greater London;

5.3.3 The total person trip rate has then been allocated to each mode of travel for the workplace population for the local output area E02000191 (Camden 026), extrapolated from 2011 census data.

5.3.4 The 2011 Census data for the method of travel to work data for workplace zone E02000191 is summarised in **Appendix D**.

5.3.5 The multi-modal trip rates for the office are shown in **Table 5.3**. Note that values within **Table 5.3** are subject to rounding.

**Table 5.3: Existing 1,858sq.m B1 Office Multi-Modal Trips**

Mode	AM Peak (08:00-09:00)			PM Peak (17:00-18:00)			Daily (07:00-19:00)		
	Arr.	Dep.	2-Way	Arr.	Dep.	2-Way	Arr.	Dep.	2-Way
Vehicle	2	0	2	0	2	2	8	8	15
Walk	2	0	2	0	2	2	10	10	20
Public Transport	32	2	34	2	31	33	136	138	275
Cycle	3	0	3	1	2	3	11	11	22
Total	39	2	41	3	37	40	165	167	332

5.3.6 As shown in **Table 5.3**, the existing office could generate 40-41 two-way movements by all modes of travel during the traditional peak hours of travel demand (08:00-09:00 and 17:00-18:00) and 332 two-way movements over the course of the day.

### ***Proposed Development***

5.3.7 In order to validate the first principles approach to trip attraction provided in Section 5.2, and to provide a comparison of peak hour trips with the existing permitted office land use, the TRICS database has been interrogated with the following selection criteria applied:

- Land Use Class 04C Education (College/ University); and
- Sites located within All England including Greater London;

5.3.8 The TRICS total person trip rates have been allocated to each mode of travel based on the results of the NCH July 2019 survey as illustrated in **Table 5.1**. Since no respondents reported traveling via taxi, this mode has not been considered further.

5.3.9 The full TRICS output is provided in **Appendix D** of this TS. The multi-modal trip rates for the university for 168 students that would attend the site each day is shown in **Table 5.4**. Note that staff trips would be included within the total person trip rate and that values are subject to rounding.

**Table 5.4: Proposed University Trips**

Mode	AM Peak (08:00-09:00)			PM Peak (17:00-18:00)			Daily (07:00-19:00)		
	Arr.	Dep.	2-Way	Arr.	Dep.	2-Way	Arr.	Dep.	2-Way
Vehicle	0	0	0	0	0	0	1	1	2
Walk	6	1	7	1	3	4	28	28	56
Public Transport	15	3	17	3	9	11	74	74	148
Cycle	3	0	2	0	1	1	9	9	18
Total	22	4	26	5	13	17	112	112	224

5.3.10 As shown in **Table 5.4**, a university based on the results from the TRICS database could generate 17-26 two-way movements by all modes during the peak hours and 244 two-way movements over the course of the day. Furthermore, the results validate will with the results within **Table 5.2**.

## **5.4 Net Trip Attraction**

5.4.1 The anticipated net trip generation from the TRICS assessment is presented in **Table 5.5** and has

been calculated by comparing the difference between the anticipated daily trip attraction of the existing office and the proposed development.

**Table 5.5: Anticipated Net Changes**

Mode	AM Peak (08:00-09:00)			PM Peak (17:00-18:00)			Daily (07:00-19:00)		
	Arr.	Dep.	2-Way	Arr.	Dep.	2-Way	Arr.	Dep.	2-Way
Vehicle	-2	0	-2	0	-2	-2	-7	-7	-13
Walk	4	1	5	1	1	2	18	18	36
Public Transport	-17	1	-17	1	-22	-22	-62	-64	-127
Cycle	0	0	-1	-1	-1	-2	-2	-2	-4
Total	-17	2	-15	2	-24	-23	-53	-55	-108

- 5.4.2 The net trip generation indicates that the proposed development is anticipated to result in a reduction of 108 two-way daily trips over the course of a day to Boston House. The proposed development would also result in a net reduction in trips by all modes during the traditional peak hours.

## 5.5 Summary

- 5.5.1 The proposed development is anticipated to result in a net decrease in daily trips during the peak hours and over the course of a day, therefore, the proposed development is not anticipated to have a material impact on the operation of the local highway network.
- 5.5.2 In addition to a net reduction in daily and peak hour two-way trips, the NCH operate a three-term system. Two terms of twelve weeks in the autumn and spring, and a summer term of eight weeks. In effect there would be 22 weeks a year when there is teaching in the building. In contrast, should Boston House reopen as an office the site would be operational all year round.

## 6 Travel Plan

### 6.1 Overview

6.1.1 A Travel Plan (TP) shall be implemented once the site is operational to encourage staff, students and visitors to use sustainable modes of transport rather than a private car.

6.1.2 The purpose of a TP is to set out a long-term strategy for reducing dependence on travel by private car. Its objective is to reduce private car mileage in favour of more sustainable modes of travel, which reflects current Government policy objectives in respect of transport. Travel Plans set out objectives, targets and measures, which aim to maximise the use of sustainable modes of travel where possible.

### 6.2 NCH Travel Plan

6.2.1 A TP has been produced as part of the planning requirements for the relocation of the NCH to Boston House.

6.2.2 A Travel Plan Coordinator (TPC) shall be appointed by the NCH and shall be responsible for the coordination of the TP and its successful implementation. The TPC shall also act as a conduit between staff, students and NCH who shall be overseeing the implementation and effectiveness of the TP.

6.2.3 Once the site is operational the main TP measures implemented shall focus on:

- Encouraging the uptake of walking;
- Encouraging the uptake of cycling; and
- Encouraging the uptake of public transport.

6.2.4 The TPC shall communicate the TP to staff, visitors and students in the following way:

- Promotional literature;
- Staff / student email;
- Newsletters and social media;
- Communal screens and noticeboards;
- Website – public, staff intranet and student hub; and
- Special events.

6.2.5 It would be the responsibility of the TPC to undertake annual monitoring and review to ensure the TP stays on track and to identify the necessary changes required to minimise the number of car trips.

### 6.3 Summary

6.3.1 The TP document shall form part of the NCH policies, forming an overarching college-wide strategy for encouraging the use of sustainable modes of transport.

## **7 Summary and Conclusion**

### **7.1 Summary**

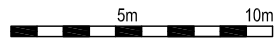
- 7.1.1 This Transport Statement (TS) has been prepared by Royal HaskoningDHV (RHDHV) on behalf of the New College of the Humanities (NCH) to accompany a planning application for the refurbishment and change of use of Boston House, Fitzroy Square, Fitzrovia, London, W1T 6EY. The local planning authority is the London Borough of Camden.
- 7.1.2 Boston House currently accommodates office floor space under (Use Class B1) and the application shall be for a change of use to education (Use Class D1). The College currently educates around 200 students at the current NCH site at Bedford Square and are seeking to expand the student population to 600 students.
- 7.1.3 The proposals do not include any alterations to the façade of the building or undertake any external works. The development proposals would only require an internal fit-out and refurbishment of the current building to provide a new education space for NCH.
- 7.1.4 The site is accessible by a wide range of non-car modes with a number of services, multi-modal opportunities and amenities easily accessible within a walk and cycle distance of the site. Boston House does not provide any parking.
- 7.1.5 Fitzroy Square is a private square. As a resident of Fitzroy Square, NCH would have vehicle access rights to the square. No vehicle access rights would be awarded to students. The existing entrance from Fitzroy Square shall be retained and would continue to provide the main pedestrian route into the site. All other access and servicing arrangements shall remain the same post-development.
- 7.1.6 A review of collision data for the most recent five-year period concluded that the development proposals are not anticipated to have a material impact on the safety of the local highway network.
- 7.1.7 The proposed development shall provide 54 cycle parking spaces for staff and students. Cycle parking is to be provided in accordance with adopted local standards, and in excess of the adopted London Plan standards.
- 7.1.8 The proposed development is anticipated to result in a net reduction of 108 two-way daily trips over the course of a day. The proposed development would also result in a net reduction in trips by all modes during the traditional peak hours compared to a typical B1 lane use (office) occupier.
- 7.1.9 The proposed development is not anticipated to have a material impact on the operation of the local highway network.
- 7.1.10 In addition to a net reduction in daily and peak hour two-way trips, the NCH operate a three-term system. Two terms of twelve weeks in the autumn and spring, and a summer term of eight weeks. In effect there would be 22 weeks a year when there is teaching in the building. In contrast, should Boston House reopen as an office the site would be operational all year round.
- 7.1.11 A Travel Plan (TP) shall be implemented once the site is operational to encourage staff, students and visitors to use sustainable modes of transport rather than a private car.



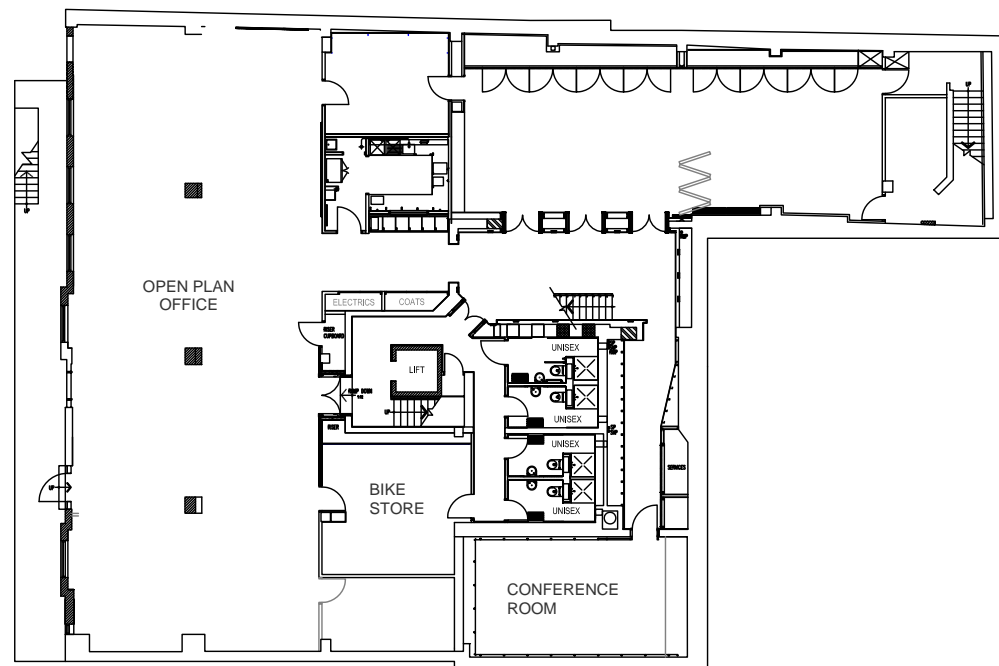
## 7.2 Conclusion

- 7.2.1 The National Planning Policy Framework (NPPF) sets out the Government's planning policies for England and identifies that *'Development should only be prevented or refused on transport grounds where the residual cumulative impacts of development are severe'*. In accordance with the NPPF, it has been demonstrated that the anticipated travel demand for the proposed development does not represent a severe residual transport impact.
- 7.2.2 The development proposals have been demonstrated to be in accordance with national, regional and local planning policies.
- 7.2.3 In conclusion, it is considered there are no reasons relating to transport and highways matters for not permitting the proposed development.

## Appendix A – Proposed Site Layout



1  
2  
3  
4  
5  
6  
7  
8



Issue	Date	By	Chkd	Appd

Client

Job Title

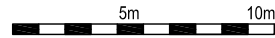
**Boston House  
Basement**

Scale at A2  
1:200

Discipline

Job No	Drawing Status
	<b>PROPOSED</b>

Drawing No	Issue
<b>BH.B. 1900</b>	



1

2

3

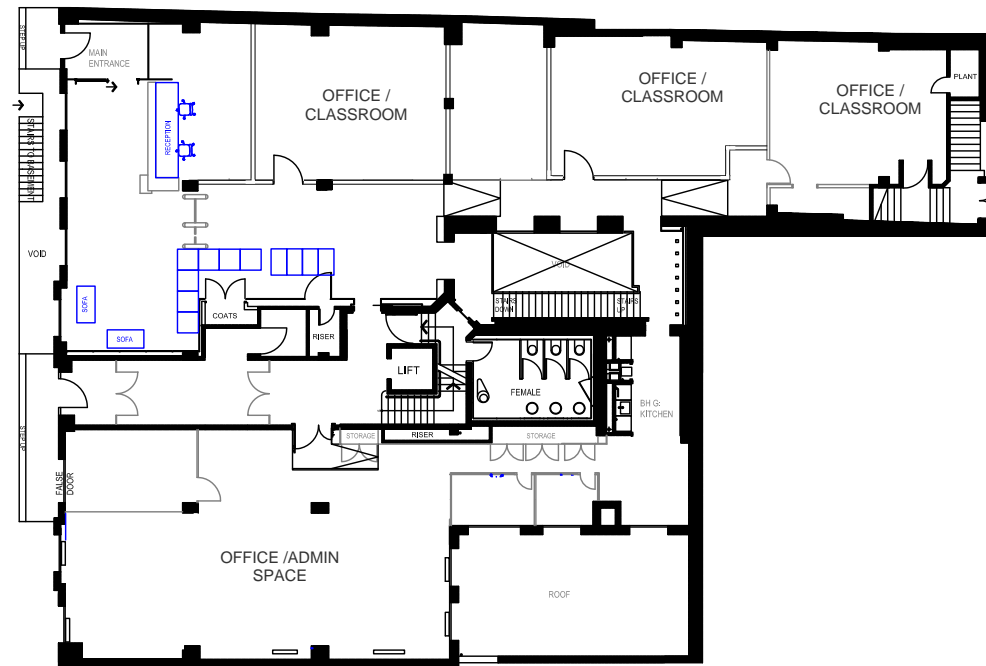
4

5

6

7

8



Issue	Date	By	Chkd	Appd

Client

Job Title  
**Boston House  
 Ground Floor**



Scale at A2  
1:200

Discipline

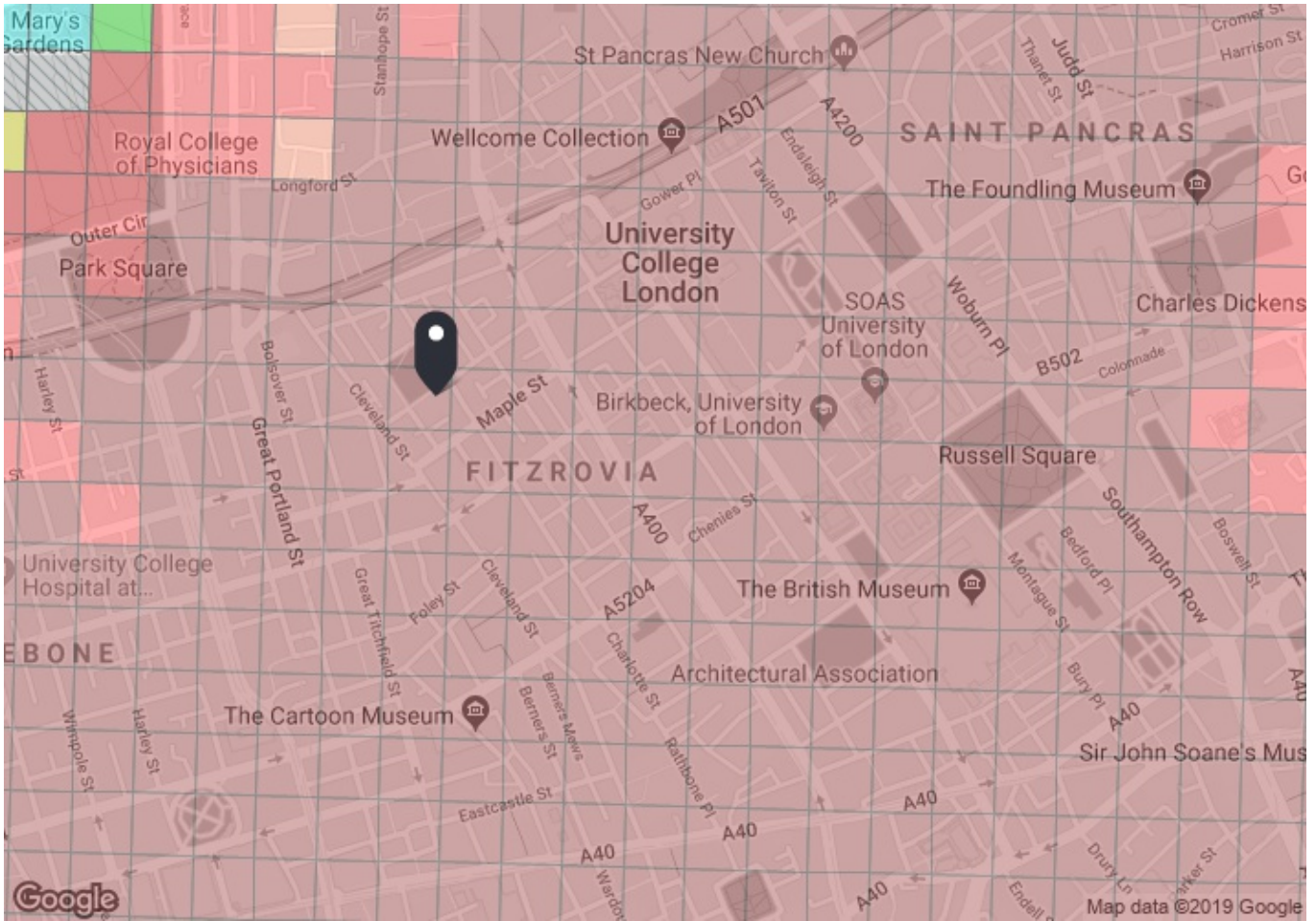
Job No	Drawing Status <b>PROPOSED</b>
--------	-----------------------------------

Drawing No <b>BH.00. 1200</b>	Issue
----------------------------------	-------

Project related



## Appendix B – TfL PTAL Report



**PTAL output for Base Year 6b**

38 Fitzroy Square, Fitzrovia, London W1T 6EY, UK  
Easting: 529173, Northing: 182043

Grid Cell: 88374

Report generated: 05/07/2019

---

**Calculation Parameters**

Day of Week	M-F
Time Period	AM Peak
Walk Speed	4.8 kph
Bus Node Max. Walk Access Time (mins)	8
Bus Reliability Factor	2.0
LU Station Max. Walk Access Time (mins)	12
LU Reliability Factor	0.75
National Rail Station Max. Walk Access Time (mins)	12
National Rail Reliability Factor	0.75

**Map key - PTAL**

0 (Worst)	1a
1b	2
3	4
5	6a
6b (Best)	

**Map layers**

- PTAL (cell size: 100m)

Calculation data

Mode	Stop	Route	Distance (metres)	Frequency(vph)	Walk Time (mins)	SWT (mins)	TAT (mins)	EDF	Weight	AI
Bus	GREAT PORTLAND ST STN	C2	446.26	8	5.58	5.75	11.33	2.65	0.5	1.32
Bus	GREAT PORTLAND ST STN	453	446.26	12	5.58	4.5	10.08	2.98	0.5	1.49
Bus	GOWER ST UNIVERSITY COLL	10	554.64	4.5	6.93	8.67	15.6	1.92	0.5	0.96
Bus	GOWER ST UNIVERSITY COLL	24	554.64	10	6.93	5	11.93	2.51	0.5	1.26
Bus	GOWER ST UNIVERSITY COLL	134	554.64	12	6.93	4.5	11.43	2.62	0.5	1.31
Bus	GOWER ST UNIVERSITY COLL	390	554.64	8	6.93	5.75	12.68	2.37	0.5	1.18
Bus	GOWER ST UNIVERSITY COLL	73	554.64	18	6.93	3.67	10.6	2.83	0.5	1.42
Bus	GOWER ST UNIVERSITY COLL	29	554.64	15	6.93	4	10.93	2.74	0.5	1.37
Bus	GOWER ST UNIVERSITY COLL	14	554.64	13	6.93	4.31	11.24	2.67	0.5	1.33
Bus	GREAT PORTLAND ST STN	30	360.67	7.5	4.51	6	10.51	2.85	0.5	1.43
Bus	GREAT PORTLAND ST STN	88	360.67	9	4.51	5.33	9.84	3.05	0.5	1.52
Bus	GREAT PORTLAND ST STN	18	360.67	17	4.51	3.76	8.27	3.63	1	3.63
Bus	GREAT PORTLAND ST STN	27	360.67	8	4.51	5.75	10.26	2.92	0.5	1.46
Bus	GREAT PORTLAND ST STN	205	360.67	8	4.51	5.75	10.26	2.92	0.5	1.46
LUL	Great Portland Street	'Edgware-Hammersmith'	434.85	6	5.44	5.75	11.19	2.68	0.5	1.34
LUL	Great Portland Street	'Barking-Hammersmith'	434.85	6.34	5.44	5.48	10.92	2.75	0.5	1.37
LUL	Great Portland Street	'Hammersmith-Plaistow'	434.85	1	5.44	30.75	36.19	0.83	0.5	0.41
LUL	Great Portland Street	'Amer-AldgateFast'	434.85	1	5.44	30.75	36.19	0.83	0.5	0.41
LUL	Great Portland Street	'Ches-AldgateFast'	434.85	2	5.44	15.75	21.19	1.42	0.5	0.71
LUL	Great Portland Street	'Uxbridge-AldSlow'	434.85	5.33	5.44	6.38	11.81	2.54	0.5	1.27
LUL	Great Portland Street	'Watford-AldSfast'	434.85	3.67	5.44	8.92	14.36	2.09	0.5	1.04
LUL	Great Portland Street	'Aldg-WatfordSlow'	434.85	3.67	5.44	8.92	14.36	2.09	0.5	1.04
LUL	Great Portland Street	'Ald-HarrowHill'	434.85	1.33	5.44	23.31	28.74	1.04	0.5	0.52
LUL	Regent's Park	'QueensPk-El&Castle'	597.77	11.01	7.47	3.47	10.95	2.74	0.5	1.37
LUL	Regent's Park	'El&Castle-Harrow&W'	597.77	5.67	7.47	6.04	13.51	2.22	0.5	1.11
LUL	Regent's Park	'StbridgePk-El&Castle'	597.77	5	7.47	6.75	14.22	2.11	0.5	1.05
LUL	Regent's Park	'Waterloo-QueensPk'	597.77	1	7.47	30.75	38.22	0.78	0.5	0.39
LUL	Regent's Park	'Waterloo-Harrow&W'	597.77	0.33	7.47	91.66	99.13	0.3	0.5	0.15
LUL	Tottenham Court Road	'Ealing-Epping'	938.67	3	11.73	10.75	22.48	1.33	0.5	0.67
LUL	Tottenham Court Road	'WRuislip-Epping'	938.67	3	11.73	10.75	22.48	1.33	0.5	0.67
LUL	Tottenham Court Road	'RuislipGar-Epping'	938.67	1	11.73	30.75	42.48	0.71	0.5	0.35
LUL	Tottenham Court Road	'WhiteCity-Epping'	938.67	0.33	11.73	91.66	103.39	0.29	0.5	0.15
LUL	Tottenham Court Road	'Epping-NActon'	938.67	1	11.73	30.75	42.48	0.71	0.5	0.35
LUL	Tottenham Court Road	'Northolt-Epping'	938.67	0.67	11.73	45.53	57.26	0.52	0.5	0.26
LUL	Tottenham Court Road	'Debden-WRuislip'	938.67	0.33	11.73	91.66	103.39	0.29	0.5	0.15
LUL	Tottenham Court Road	'WhiteCity-Debden'	938.67	0.33	11.73	91.66	103.39	0.29	0.5	0.15
LUL	Tottenham Court Road	'Debden-Northolt'	938.67	1	11.73	30.75	42.48	0.71	0.5	0.35
LUL	Tottenham Court Road	'RuislipGdns-Debden'	938.67	0.33	11.73	91.66	103.39	0.29	0.5	0.15
LUL	Tottenham Court Road	'Loughton-WRuislip'	938.67	1	11.73	30.75	42.48	0.71	0.5	0.35
LUL	Tottenham Court Road	'NActon-Loughton'	938.67	0.67	11.73	45.53	57.26	0.52	0.5	0.26
LUL	Tottenham Court Road	'RuislipGdns-Loughton'	938.67	0.67	11.73	45.53	57.26	0.52	0.5	0.26
LUL	Tottenham Court Road	'Loughton-WhiteCity'	938.67	0.67	11.73	45.53	57.26	0.52	0.5	0.26
LUL	Tottenham Court Road	'Loughton-Northolt'	938.67	0.33	11.73	91.66	103.39	0.29	0.5	0.15
LUL	Tottenham Court Road	'Ealing-Loughton'	938.67	1	11.73	30.75	42.48	0.71	0.5	0.35
LUL	Tottenham Court Road	'Ealing-NewburyPark'	938.67	0.67	11.73	45.53	57.26	0.52	0.5	0.26
LUL	Tottenham Court Road	'WRuislip-NewburyPark'	938.67	0.33	11.73	91.66	103.39	0.29	0.5	0.15
LUL	Tottenham Court Road	'NActon-NewburyPark'	938.67	0.33	11.73	91.66	103.39	0.29	0.5	0.15
LUL	Tottenham Court Road	'Hainault-Ealing'	938.67	5.33	11.73	6.38	18.11	1.66	0.5	0.83
LUL	Tottenham Court Road	'Hainault-Nacton'	938.67	1.33	11.73	23.31	35.04	0.86	0.5	0.43
LUL	Tottenham Court Road	'Hainault-WRuislip'	938.67	3.33	11.73	9.76	21.49	1.4	0.5	0.7
LUL	Tottenham Court Road	'Hain-NP-RuislipGdns'	938.67	0.67	11.73	45.53	57.26	0.52	0.5	0.26
LUL	Tottenham Court Road	'Hainault-WhiteCity'	938.67	1.67	11.73	18.71	30.45	0.99	0.5	0.49
LUL	Tottenham Court Road	'Hainault-NP-Northolt'	938.67	1	11.73	30.75	42.48	0.71	0.5	0.35
LUL	Tottenham Court Road	'GrangeHill-WD-Eal'	938.67	1	11.73	30.75	42.48	0.71	0.5	0.35
LUL	Tottenham Court Road	'GrangeHill-Wdld-Whit'	938.67	0.67	11.73	45.53	57.26	0.52	0.5	0.26
LUL	Tottenham Court Road	'GrangeHill-Wdld-WRsp'	938.67	0.67	11.73	45.53	57.26	0.52	0.5	0.26
LUL	Warren Street	'Morden-Edgware'	600.15	4.67	7.5	7.17	14.68	2.04	0.5	1.02
LUL	Warren Street	'HighBarnet-Morden'	600.15	0.33	7.5	91.66	99.16	0.3	0.5	0.15

Mode	Stop	Route	Distance (metres)	Frequency(vph)	Walk Time (mins)	SWT (mins)	TAT (mins)	EDF	Weight	AI
LUL	Warren Street	'Kennington-Edgware'	600.15	14.67	7.5	2.79	10.3	2.91	0.5	1.46
LUL	Warren Street	'HighBarnet-Kenningt'	600.15	5.33	7.5	6.38	13.88	2.16	0.5	1.08
LUL	Warren Street	'MillHill-Morden'	600.15	1.67	7.5	18.71	26.22	1.14	0.5	0.57
LUL	Warren Street	'MillHillE-Kenningt'	600.15	1.67	7.5	18.71	26.22	1.14	0.5	0.57
LUL	Warren Street	'Brixton-WalthamstowC'	600.15	15.67	7.5	2.66	10.17	2.95	1	2.95
LUL	Warren Street	'SevenSisters-Brixton'	600.15	11.67	7.5	3.32	10.82	2.77	0.5	1.39
<b>Total Grid Cell AI:</b>										<b>51.89</b>



## Appendix D – Method of Travel to Work Census Data

## TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 02 - EMPLOYMENT

Category : A - OFFICE

MULTI-MODAL TOTAL PEOPLE

Selected regions and areas:

01	GREATER LONDON	
	BT BRENT	2 days
	CI CITY OF LONDON	2 days
	CN CAMDEN	1 days
	HD HILLINGDON	1 days
	HM HAMMERSMITH AND FULHAM	1 days
	HO HOUNSLOW	1 days
	WH WANDSWORTH	1 days
02	SOUTH EAST	
	BD BEDFORDSHIRE	1 days
	ES EAST SUSSEX	3 days
	EX ESSEX	1 days
	HC HAMPSHIRE	1 days
	HF HERTFORDSHIRE	2 days
	KC KENT	5 days
	SC SURREY	2 days
	SO SLOUGH	2 days
03	SOUTH WEST	
	BR BRISTOL CITY	1 days
	DC DORSET	1 days
04	EAST ANGLIA	
	CA CAMBRIDGESHIRE	1 days
	NF NORFOLK	2 days
	SF SUFFOLK	1 days
06	WEST MIDLANDS	
	WK WARWICKSHIRE	1 days
07	YORKSHIRE & NORTH LINCOLNSHIRE	
	NY NORTH YORKSHIRE	1 days
	WY WEST YORKSHIRE	1 days
08	NORTH WEST	
	GM GREATER MANCHESTER	3 days
	LC LANCASHIRE	1 days
09	NORTH	
	CB CUMBRIA	1 days
	DH DURHAM	1 days
	TV TEES VALLEY	1 days
	TW TYNE & WEAR	1 days

*This section displays the number of survey days per TRICS® sub-region in the selected set*

## Secondary Filtering selection:

*This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.*

Parameter: Gross floor area  
Actual Range: 178 to 114000 (units: sqm)  
Range Selected by User: 178 to 114000 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:

Selection by: Include all surveys

Date Range: 01/01/11 to 04/10/18

*This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.*

Selected survey days:

Monday	11 days
Tuesday	10 days
Wednesday	9 days
Thursday	8 days
Friday	5 days

*This data displays the number of selected surveys by day of the week.*

Selected survey types:

Manual count	43 days
Directional ATC Count	0 days

*This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaken using machines.*

Selected Locations:

Town Centre	14
Edge of Town Centre	17
Suburban Area (PPS6 Out of Centre)	6
Edge of Town	6

*This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.*

Selected Location Sub Categories:

Industrial Zone	3
Commercial Zone	10
Development Zone	2
Residential Zone	4
Built-Up Zone	20
High Street	1
No Sub Category	3

*This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.*

LIST OF SITES relevant to selection parameters

1	BD-02-A-03 OFFICES BROMHAM ROAD BEDFORD	BEDFORDSHIRE
	Edge of Town Centre No Sub Category Total Gross floor area: 1469 sqm <i>Survey date: MONDAY 14/10/13</i>	<i>Survey Type: MANUAL</i>
2	BR-02-A-02 PLANNING & ENGINEERING ST THOMAS STREET BRISTOL	BRISTOL CITY
	Town Centre Built-Up Zone Total Gross floor area: 5736 sqm <i>Survey date: FRIDAY 29/11/13</i>	<i>Survey Type: MANUAL</i>
3	BT-02-A-03 OFFICES EMPIRE WAY WEMBLEY	BRENT
	Suburban Area (PPS6 Out of Centre) Development Zone Total Gross floor area: 920 sqm <i>Survey date: WEDNESDAY 03/06/15</i>	<i>Survey Type: MANUAL</i>
4	BT-02-A-04 OFFICES EMPIRE WAY WEMBLEY	BRENT
	Suburban Area (PPS6 Out of Centre) Development Zone Total Gross floor area: 10625 sqm <i>Survey date: THURSDAY 14/05/15</i>	<i>Survey Type: MANUAL</i>
5	CA-02-A-05 OFFICES NEW ROAD PETERBOROUGH	CAMBRI DGESHIRE
	Town Centre Built-Up Zone Total Gross floor area: 8793 sqm <i>Survey date: TUESDAY 16/12/14</i>	<i>Survey Type: MANUAL</i>
6	CB-02-A-02 OFFICE PORT ROAD CARLISLE	CUMBRIA
	Edge of Town Centre Industrial Zone Total Gross floor area: 925 sqm <i>Survey date: FRIDAY 24/06/16</i>	<i>Survey Type: MANUAL</i>
7	CI-02-A-02 OFFICES GRACECHURCH STREET CITY OF LONDON MONUMENT	CITY OF LONDON
	Town Centre Commercial Zone Total Gross floor area: 9803 sqm <i>Survey date: FRIDAY 29/11/13</i>	<i>Survey Type: MANUAL</i>
8	CI-02-A-03 OFFICES MONUMENT STREET CITY OF LONDON MONUMENT	CITY OF LONDON
	Town Centre Commercial Zone Total Gross floor area: 1951 sqm <i>Survey date: FRIDAY 29/11/13</i>	<i>Survey Type: MANUAL</i>

LIST OF SITES relevant to selection parameters (Cont.)

9	CN-02-A-03 FITZROY STREET FITZROVIA	PLANNING & ENGINEERING	CAMDEN
	Town Centre Built-Up Zone Total Gross floor area:	26639 sqm	
	<i>Survey date: WEDNESDAY</i>	<i>06/12/17</i>	<i>Survey Type: MANUAL</i>
10	DC-02-A-09 THE GROVE DORCHESTER	COUNCIL OFFICES	DORSET
	Edge of Town Centre Built-Up Zone Total Gross floor area:	11664 sqm	
	<i>Survey date: MONDAY</i>	<i>28/11/11</i>	<i>Survey Type: MANUAL</i>
11	DH-02-A-02 DURHAM ROAD NEAR DURHAM BOWBURN	CONSTRUCTION COMPANY	DURHAM
	Edge of Town Industrial Zone Total Gross floor area:	2000 sqm	
	<i>Survey date: TUESDAY</i>	<i>27/11/12</i>	<i>Survey Type: MANUAL</i>
12	ES-02-A-11 THE SIDINGS HASTINGS ORE VALLEY	HOUSING COMPANY	EAST SUSSEX
	Suburban Area (PPS6 Out of Centre) Residential Zone Total Gross floor area:	186 sqm	
	<i>Survey date: TUESDAY</i>	<i>17/11/15</i>	<i>Survey Type: MANUAL</i>
13	ES-02-A-12 VICARAGE LANE HAILSHAM	COUNCIL OFFICES	EAST SUSSEX
	Edge of Town Centre Built-Up Zone Total Gross floor area:	3640 sqm	
	<i>Survey date: THURSDAY</i>	<i>26/11/15</i>	<i>Survey Type: MANUAL</i>
14	ES-02-A-13 ROMAN ROAD HOVE	OFFICES	EAST SUSSEX
	Edge of Town Centre Residential Zone Total Gross floor area:	280 sqm	
	<i>Survey date: WEDNESDAY</i>	<i>04/07/18</i>	<i>Survey Type: MANUAL</i>
15	EX-02-A-03 VICTORIA AVENUE SOUTHEND-ON-SEA	HMRC	ESSEX
	Town Centre Built-Up Zone Total Gross floor area:	45000 sqm	
	<i>Survey date: WEDNESDAY</i>	<i>23/10/13</i>	<i>Survey Type: MANUAL</i>
16	GM-02-A-07 MOSELEY STREET MANCHESTER	LAW OFFICES	GREATER MANCHESTER
	Town Centre Built-Up Zone Total Gross floor area:	4200 sqm	
	<i>Survey date: WEDNESDAY</i>	<i>19/10/11</i>	<i>Survey Type: MANUAL</i>

LIST OF SITES relevant to selection parameters (Cont.)

17	GM-02-A-08 FOUNTAIN STREET MANCHESTER	REGUS		GREATER MANCHESTER
	Town Centre Built-Up Zone Total Gross floor area:		3960 sqm	
	<i>Survey date: MONDAY</i>		<i>26/09/16</i>	<i>Survey Type: MANUAL</i>
18	GM-02-A-09 NEW MOUNT STREET MANCHESTER	LEASED OFFICES		GREATER MANCHESTER
	Edge of Town Centre Built-Up Zone Total Gross floor area:		2500 sqm	
	<i>Survey date: MONDAY</i>		<i>26/09/16</i>	<i>Survey Type: MANUAL</i>
19	HC-02-A-11 CHESTNUT AVENUE CHANDLER'S FORD	DIY CO. HQ		HAMPSHIRE
	Edge of Town Commercial Zone Total Gross floor area:		26100 sqm	
	<i>Survey date: MONDAY</i>		<i>17/10/11</i>	<i>Survey Type: MANUAL</i>
20	HD-02-A-09 MILLINGTON ROAD HAYES	DATA CENTRE		HILLINGDON
	Edge of Town Centre Commercial Zone Total Gross floor area:		12100 sqm	
	<i>Survey date: TUESDAY</i>		<i>26/06/18</i>	<i>Survey Type: MANUAL</i>
21	HF-02-A-03 60 VICTORIA STREET ST ALBANS	OFFICE		HERTFORDSHIRE
	Edge of Town Centre Built-Up Zone Total Gross floor area:		610 sqm	
	<i>Survey date: WEDNESDAY</i>		<i>16/10/13</i>	<i>Survey Type: MANUAL</i>
22	HF-02-A-04 STATION WAY ST ALBANS	OFFICES		HERTFORDSHIRE
	Edge of Town Centre Residential Zone Total Gross floor area:		5000 sqm	
	<i>Survey date: THURSDAY</i>		<i>02/10/14</i>	<i>Survey Type: MANUAL</i>
23	HM-02-A-01 QUEEN CAROLINE STREET HAMMERSMITH	REGUS OFFICES		HAMMERSMITH AND FULHAM
	Town Centre Built-Up Zone Total Gross floor area:		2036 sqm	
	<i>Survey date: MONDAY</i>		<i>13/11/17</i>	<i>Survey Type: MANUAL</i>

LIST OF SITES relevant to selection parameters (Cont.)

24	HO-02-A-01 SYON LANE ISLEWORTH	SKY HEADQUARTERS	HOUNSLOW
	Suburban Area (PPS6 Out of Centre) No Sub Category Total Gross floor area: 120000 sqm <i>Survey date: WEDNESDAY 05/07/17</i>		
25	KC-02-A-07 KAVELIN WAY ASHFORD HENWOOD IND. ESTATE	KCC HIGHWAYS REG.	KENT
	Edge of Town Commercial Zone Total Gross floor area: 2525 sqm <i>Survey date: MONDAY 05/12/11</i>		
26	KC-02-A-08 ST MICHAEL'S CLOSE AYLESFORD CLAY WOOD	KCC HIGHWAYS REG. OFFICE	KENT
	Edge of Town Industrial Zone Total Gross floor area: 3168 sqm <i>Survey date: MONDAY 28/11/11</i>		
27	KC-02-A-09 SANDLING ROAD MAIDSTONE	COUNCIL OFFICES	KENT
	Edge of Town Centre Built-Up Zone Total Gross floor area: 1500 sqm <i>Survey date: WEDNESDAY 19/10/11</i>		
28	KC-02-A-10 SANDLING ROAD MAIDSTONE	COUNCIL OFFICES	KENT
	Edge of Town Centre Built-Up Zone Total Gross floor area: 2900 sqm <i>Survey date: WEDNESDAY 19/10/11</i>		
29	KC-02-A-11 SANDLING ROAD MAIDSTONE	COUNTY HALL	KENT
	Edge of Town Centre Built-Up Zone Total Gross floor area: 32793 sqm <i>Survey date: MONDAY 17/10/11</i>		
30	LC-02-A-09 FURTHERGATE BLACKBURN	OFFICES	LANCASHIRE
	Suburban Area (PPS6 Out of Centre) Built-Up Zone Total Gross floor area: 2600 sqm <i>Survey date: TUESDAY 04/06/13</i>		
31	NF-02-A-02 NORTH QUAY GREAT YARMOUTH	FINANCIAL PLANNERS	NORFOLK
	Edge of Town Centre Commercial Zone Total Gross floor area: 894 sqm <i>Survey date: MONDAY 11/09/17</i>		

LIST OF SITES relevant to selection parameters (Cont.)

32	NF-02-A-03 NORTH QUAY GREAT YARMOUTH	OFFICES		NORFOLK
	Edge of Town Centre Commercial Zone Total Gross floor area:		5500 sqm	
	<i>Survey date: TUESDAY</i>		<i>12/09/17</i>	<i>Survey Type: MANUAL</i>
33	NY-02-A-01 NORTH PARK ROAD HARROGATE	SOLICITORS		NORTH YORKSHIRE
	Edge of Town Centre Built-Up Zone Total Gross floor area:		178 sqm	
	<i>Survey date: THURSDAY</i>		<i>04/10/18</i>	<i>Survey Type: MANUAL</i>
34	SC-02-A-16 STANHOPE ROAD CAMBERLEY	BANK OF AMERICA		SURREY
	Edge of Town Commercial Zone Total Gross floor area:		39230 sqm	
	<i>Survey date: TUESDAY</i>		<i>10/05/11</i>	<i>Survey Type: MANUAL</i>
35	SC-02-A-17 ST GEORGE'S AVENUE WEYBRIDGE THE HEATH	PHARMACEUTICALS		SURREY
	Suburban Area (PPS6 Out of Centre) Residential Zone Total Gross floor area:		10293 sqm	
	<i>Survey date: TUESDAY</i>		<i>18/10/11</i>	<i>Survey Type: MANUAL</i>
36	SF-02-A-02 BATH STREET IPSWICH	OFFICES		SUFFOLK
	Edge of Town Centre Commercial Zone Total Gross floor area:		6505 sqm	
	<i>Survey date: FRIDAY</i>		<i>19/07/13</i>	<i>Survey Type: MANUAL</i>
37	SO-02-A-01 HIGH STREET SLOUGH	COUNCIL OFFICES		SLOUGH
	Town Centre High Street Total Gross floor area:		1800 sqm	
	<i>Survey date: THURSDAY</i>		<i>27/02/14</i>	<i>Survey Type: MANUAL</i>
38	SO-02-A-02 BATH ROAD SLOUGH	COUNCIL OFFICES		SLOUGH
	Edge of Town Centre Built-Up Zone Total Gross floor area:		5050 sqm	
	<i>Survey date: THURSDAY</i>		<i>27/02/14</i>	<i>Survey Type: MANUAL</i>
39	TV-02-A-04 CORPORATION ROAD MIDDLESBROUGH	COUNCIL OFFICES		TEES VALLEY
	Town Centre Commercial Zone Total Gross floor area:		3950 sqm	
	<i>Survey date: TUESDAY</i>		<i>08/10/13</i>	<i>Survey Type: MANUAL</i>



LIST OF SITES relevant to selection parameters (Cont.)

40	TW-02-A-07 MULGRAVE TERRACE GATESHEAD	OFFICES		TYNE & WEAR
	Town Centre Built-Up Zone			
	Total Gross floor area:		2090 sqm	
	Survey date: MONDAY		13/06/16	Survey Type: MANUAL
41	WH-02-A-02 BATTERSEA PARK ROAD BATTERSEA	OFFICES		WANDSWORTH
	Town Centre Built-Up Zone			
	Total Gross floor area:		1215 sqm	
	Survey date: THURSDAY		10/05/12	Survey Type: MANUAL
42	WK-02-A-01 WARWICK ROAD COVENTRY	OFFICES		WARWICKSHIRE
	Town Centre Built-Up Zone			
	Total Gross floor area:		960 sqm	
	Survey date: THURSDAY		17/10/13	Survey Type: MANUAL
43	WY-02-A-05 PIONEER WAY CASTLEFORD WHITWOOD	OFFICES		WEST YORKSHIRE
	Edge of Town No Sub Category			
	Total Gross floor area:		1230 sqm	
	Survey date: TUESDAY		23/05/17	Survey Type: MANUAL

*This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.*

TRIP RATE for Land Use 02 - EMPLOYMENT/A - OFFICE

MULTI-MODAL TOTAL PEOPLE

Calculation factor: 100 sqm

BOLD print indicates peak (busiest) period

Time Range	ARRIVALS			DEPARTURES			TOTALS		
	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate	No. Days	Ave. GFA	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00	1	114000	0.475	1	114000	0.066	1	114000	0.541
07:00 - 08:00	42	9642	0.798	42	9642	0.072	42	9642	0.870
08:00 - 09:00	43	9421	2.074	43	9421	0.129	43	9421	2.203
09:00 - 10:00	43	9421	1.405	43	9421	0.232	43	9421	1.637
10:00 - 11:00	43	9421	0.577	43	9421	0.317	43	9421	0.894
11:00 - 12:00	43	9421	0.409	43	9421	0.397	43	9421	0.806
12:00 - 13:00	43	9421	0.795	43	9421	1.042	43	9421	1.837
13:00 - 14:00	43	9421	0.977	43	9421	0.751	43	9421	1.728
14:00 - 15:00	43	9421	0.500	43	9421	0.493	43	9421	0.993
15:00 - 16:00	43	9421	0.276	43	9421	0.628	43	9421	0.904
16:00 - 17:00	43	9421	0.215	43	9421	1.216	43	9421	1.431
17:00 - 18:00	43	9421	0.144	43	9421	1.999	43	9421	2.143
18:00 - 19:00	41	9847	0.073	41	9847	0.820	41	9847	0.893
19:00 - 20:00	1	114000	0.052	1	114000	0.505	1	114000	0.557
20:00 - 21:00	1	114000	0.051	1	114000	0.192	1	114000	0.243
21:00 - 22:00	1	114000	0.061	1	114000	0.111	1	114000	0.172
22:00 - 23:00									
23:00 - 24:00									
<b>Total Rates:</b>			8.882			8.970			17.852

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is:  $COUNT/TRP*FACT$ . Trip rates are then rounded to 3 decimal places.

Calculation Reference: AUDIT-703101-190725-0740

## TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 04 - EDUCATION  
 Category : C - COLLEGE/UNIVERSITY  
 MULTI-MODAL TOTAL PEOPLE

Selected regions and areas:

01	GREATER LONDON	
	HD HILLINGDON	2 days
02	SOUTH EAST	
	BU BUCKINGHAMSHIRE	1 days
	ES EAST SUSSEX	3 days
	WS WEST SUSSEX	2 days
03	SOUTH WEST	
	CW CORNWALL	1 days
04	EAST ANGLIA	
	CA CAMBRIDGESHIRE	2 days

*This section displays the number of survey days per TRICS® sub-region in the selected set*

## Secondary Filtering selection:

*This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.*

Parameter: Number of students  
 Actual Range: 720 to 15500 (units: )  
 Range Selected by User: 360 to 16000 (units: )

Parking Spaces Range: All Surveys Included

Public Transport Provision:

Selection by: Include all surveys

Date Range: 01/01/11 to 25/04/18

*This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.*

Selected survey days:

Monday	1 days
Tuesday	5 days
Wednesday	2 days
Thursday	3 days

*This data displays the number of selected surveys by day of the week.*

Selected survey types:

Manual count	11 days
Directional ATC Count	0 days

*This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaken using machines.*

Selected Locations:

Town Centre	2
Edge of Town Centre	5
Suburban Area (PPS6 Out of Centre)	3
Edge of Town	1

*This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.*

Selected Location Sub Categories:

Residential Zone	5
Built-Up Zone	4
Out of Town	1
No Sub Category	1

*This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.*

LIST OF SITES relevant to selection parameters

1	BU-04-C-01 UNIVERSITY QUEEN ALEXANDRA ROAD HIGH WYCOMBE		BUCKINGHAMSHIRE
	Edge of Town Centre Built-Up Zone Total Number of students:	3795	
	<i>Survey date: TUESDAY</i>	<i>24/01/17</i>	<i>Survey Type: MANUAL</i>
2	CA-04-C-02 COLLEGE BROOK STREET PETERBOROUGH		CAMBRIDGESHIRE
	Edge of Town Centre Built-Up Zone Total Number of students:	3000	
	<i>Survey date: MONDAY</i>	<i>17/10/16</i>	<i>Survey Type: MANUAL</i>
3	CA-04-C-03 COLLEGE PARK CRESCENT PETERBOROUGH		CAMBRIDGESHIRE
	Suburban Area (PPS6 Out of Centre) Residential Zone Total Number of students:	15500	
	<i>Survey date: TUESDAY</i>	<i>18/10/16</i>	<i>Survey Type: MANUAL</i>
4	CW-04-C-04 UNIVERSITY A394 TRELIEVER ROAD NEAR FALMOUTH PENRYN		CORNWALL
	Edge of Town Out of Town Total Number of students:	5091	
	<i>Survey date: THURSDAY</i>	<i>03/05/12</i>	<i>Survey Type: MANUAL</i>
5	ES-04-C-05 COLLEGE PENLAND ROAD BEXHILL ON SEA		EAST SUSSEX
	Suburban Area (PPS6 Out of Centre) Residential Zone Total Number of students:	1500	
	<i>Survey date: THURSDAY</i>	<i>03/11/11</i>	<i>Survey Type: MANUAL</i>
6	ES-04-C-06 COLLEGE STATION APPROACH HASTINGS STATION PLAZA		EAST SUSSEX
	Town Centre Built-Up Zone Total Number of students:	2283	
	<i>Survey date: TUESDAY</i>	<i>29/05/12</i>	<i>Survey Type: MANUAL</i>
7	ES-04-C-07 COLLEGE PARKER ROAD HASTINGS ORE		EAST SUSSEX
	Suburban Area (PPS6 Out of Centre) Residential Zone Total Number of students:	720	
	<i>Survey date: WEDNESDAY</i>	<i>30/05/12</i>	<i>Survey Type: MANUAL</i>

LIST OF SITES relevant to selection parameters (Cont.)

8	HD-04-C-01 PARK ROAD UXBRIDGE	COLLEGE	HILLINGDON
	Edge of Town Centre Residential Zone Total Number of students:	8103	
	<i>Survey date: THURSDAY</i>	<i>03/03/16</i>	<i>Survey Type: MANUAL</i>
9	HD-04-C-03 OXFORD ROAD UXBRIDGE	UNIVERSITY (HEALTH)	HILLINGDON
	Town Centre Built-Up Zone Total Number of students:	2432	
	<i>Survey date: TUESDAY</i>	<i>06/03/18</i>	<i>Survey Type: MANUAL</i>
10	WS-04-C-06 UPPER BOGNOR ROAD BOGNOR REGIS	UNIVERSITY OF CHICHESTER	WEST SUSSEX
	Edge of Town Centre Residential Zone Total Number of students:	1456	
	<i>Survey date: WEDNESDAY</i>	<i>25/04/18</i>	<i>Survey Type: MANUAL</i>
11	WS-04-C-07 COLLEGE LANE CHICHESTER	UNIVERSITY OF CHICHESTER	WEST SUSSEX
	Edge of Town Centre No Sub Category Total Number of students:	3574	
	<i>Survey date: TUESDAY</i>	<i>24/04/18</i>	<i>Survey Type: MANUAL</i>

*This section provides a list of all survey sites and days in the selected set. For each individual survey site, it displays a unique site reference code and site address, the selected trip rate calculation parameter and its value, the day of the week and date of each survey, and whether the survey was a manual classified count or an ATC count.*

TRIP RATE for Land Use 04 - EDUCATION/C - COLLEGE/UNIVERSITY

MULTI-MODAL TOTAL PEOPLE

Calculation factor: 1 STUDEN

BOLD print indicates peak (busiest) period

Time Range	ARRIVALS			DEPARTURES			TOTALS		
	No. Days	Ave. STUDEN	Trip Rate	No. Days	Ave. STUDEN	Trip Rate	No. Days	Ave. STUDEN	Trip Rate
00:00 - 01:00									
01:00 - 02:00									
02:00 - 03:00									
03:00 - 04:00									
04:00 - 05:00									
05:00 - 06:00									
06:00 - 07:00									
07:00 - 08:00	11	4314	0.019	11	4314	0.005	11	4314	0.024
08:00 - 09:00	11	4314	0.130	11	4314	0.023	11	4314	0.153
09:00 - 10:00	11	4314	0.095	11	4314	0.027	11	4314	0.122
10:00 - 11:00	11	4314	0.065	11	4314	0.035	11	4314	0.100
11:00 - 12:00	11	4314	0.053	11	4314	0.046	11	4314	0.099
12:00 - 13:00	11	4314	0.059	11	4314	0.072	11	4314	0.131
13:00 - 14:00	11	4314	0.058	11	4314	0.056	11	4314	0.114
14:00 - 15:00	11	4314	0.039	11	4314	0.061	11	4314	0.100
15:00 - 16:00	11	4314	0.036	11	4314	0.066	11	4314	0.102
16:00 - 17:00	11	4314	0.030	11	4314	0.098	11	4314	0.128
17:00 - 18:00	11	4314	0.027	11	4314	0.076	11	4314	0.103
18:00 - 19:00	10	4673	0.024	10	4673	0.030	10	4673	0.054
19:00 - 20:00	9	5026	0.015	9	5026	0.030	9	5026	0.045
20:00 - 21:00	9	5026	0.009	9	5026	0.026	9	5026	0.035
21:00 - 22:00	9	5026	0.006	9	5026	0.015	9	5026	0.021
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			0.665			0.666			1.331

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is:  $COUNT/TRP*FACT$ . Trip rates are then rounded to 3 decimal places.

## Appendix C – TRICS Output Reports

**WP703EW - Method of travel to work (2001 specification) (Workplace population)**

ONS Crown Copyright Reserved [from Nomis on 25 July 2019]

population All usual residents aged 16 to 74 in employment in the area the week before the census  
 units Persons  
 area type 2011 super output areas - middle layer  
 area name E02000191 : Camden 026

Method of travel to work	2011			
All categories: Method of travel	40,890			
Work mainly at or from home	397			
Underground, metro, light rail	16,410	16,410	Vehicle	4.6%
Train	12,090	12,090	Walk	5.9%
Bus, minibus or coach	4,290	4,290	Public Transport	82.7%
Taxi	88	88	Cycle	6.7%
Motorcycle, scooter or moped	615		Total	100.0%
Driving a car or van	1,748	1,748		
Passenger in a car or van	166			
Bicycle	2,676	2,676		
On foot	2,347	2,347		
Other method of travel to work	63			
Total	39,649			



In order to protect against disclosure of personal information, records have been swapped between different geographic areas. Some counts will be affected, particularly small counts at the lowest geographies.



TRIP RATE for Land Use 02 - EMPLOYMENT/A - OFFICE	
Site Name:	Fitzroy Square, London
Calculation Factor:	100 sqm
Floor Area	1,858 sqm

Development Scenario:	EXISTING OFFICE
Trip Rate for:	TOTAL PEOPLE

Time Range	ARRIVALS			DEPARTURES			TOTALS			TRIPS	
	No.	Ave.	Trip	No.	Ave.	Trip	No.	Ave.	Trip	Arr.	Dep.
	Days	GFA	Rate	Days	GFA	Rate	Days	GFA	Rate		
00:00-01:00										0	0
01:00-02:00										0	0
02:00-03:00										0	0
03:00-04:00										0	0
04:00-05:00										0	0
05:00-06:00										0	0
06:00-07:00	1	114000	0.475	1	114000	0.066	1	114000	0.541	9	1
07:00-08:00	42	9642	0.798	42	9642	0.072	42	9642	0.87	15	1
08:00-09:00	43	9421	2.074	43	9421	0.129	43	9421	2.203	39	2
09:00-10:00	43	9421	1.405	43	9421	0.232	43	9421	1.637	26	4
10:00-11:00	43	9421	0.577	43	9421	0.317	43	9421	0.894	11	6
11:00-12:00	43	9421	0.409	43	9421	0.397	43	9421	0.806	8	7
12:00-13:00	43	9421	0.795	43	9421	1.042	43	9421	1.837	15	19
13:00-14:00	43	9421	0.977	43	9421	0.751	43	9421	1.728	18	14
14:00-15:00	43	9421	0.5	43	9421	0.493	43	9421	0.993	9	9
15:00-16:00	43	9421	0.276	43	9421	0.628	43	9421	0.904	5	12
16:00-17:00	43	9421	0.215	43	9421	1.216	43	9421	1.431	4	23
17:00-18:00	43	9421	0.144	43	9421	1.999	43	9421	2.143	3	37
18:00-19:00	41	9847	0.073	41	9847	0.82	41	9847	0.893	1	15
19:00-20:00	1	114000	0.052	1	114000	0.505	1	114000	0.557	1	9
20:00-21:00	1	114000	0.051	1	114000	0.192	1	114000	0.243	1	4
21:00-22:00	1	114000	0.061	1	114000	0.111	1	114000	0.172	1	2
22:00-23:00										0	0
23:00-24:00										0	0
Daily Trip Rates:			8.882			8.970			17.852	165	167

TRIP RATE for Land Use 04 - EDUCATION/C - COLLEGE/UNIVERSITY		
Site Name:	Fitzroy Square, London	
Calculation Factor:	1	Students
Number of Students:	168	Students

Development Scenario:	PROPOSED RESIDENTIAL
Trip Rate for:	VEHICLES

Time Range	ARRIVALS			DEPARTURES			TOTALS			TRIPS	
	No.	Ave.	Trip	No.	Ave.	Trip	No.	Ave.	Trip	Arr.	Dep.
	Days	GFA	Rate	Days	GFA	Rate	Days	GFA	Rate		
00:00-01:00										0	0
01:00-02:00										0	0
02:00-03:00										0	0
03:00-04:00										0	0
04:00-05:00										0	0
05:00-06:00										0	0
06:00-07:00										0	0
07:00-08:00	11	4314	0.019	11	4314	0.005	11	4314	0.024	3	1
08:00-09:00	11	4314	0.13	11	4314	0.023	11	4314	0.153	22	4
09:00-10:00	11	4314	0.095	11	4314	0.027	11	4314	0.122	16	5
10:00-11:00	11	4314	0.065	11	4314	0.035	11	4314	0.1	11	6
11:00-12:00	11	4314	0.053	11	4314	0.046	11	4314	0.099	9	8
12:00-13:00	11	4314	0.059	11	4314	0.072	11	4314	0.131	10	12
13:00-14:00	11	4314	0.058	11	4314	0.056	11	4314	0.114	10	9
14:00-15:00	11	4314	0.039	11	4314	0.061	11	4314	0.1	7	10
15:00-16:00	11	4314	0.036	11	4314	0.066	11	4314	0.102	6	11
16:00-17:00	11	4314	0.03	11	4314	0.098	11	4314	0.128	5	16
17:00-18:00	11	4314	0.027	11	4314	0.076	11	4314	0.103	5	13
18:00-19:00	10	4673	0.024	10	4673	0.03	10	4673	0.054	4	5
19:00-20:00	9	5026	0.015	9	5026	0.03	9	5026	0.045	3	5
20:00-21:00	9	5026	0.009	9	5026	0.026	9	5026	0.035	2	4
21:00-22:00	9	5026	0.006	9	5026	0.015	9	5026	0.021	1	3
22:00-23:00										0	0
23:00-24:00										0	0
Daily Trip Rates:			0.665			0.666			1.331	112	112