

HVJ TRANSPORT LTD

TRANSPORT STATEMENT

PROPOSED RESIDENTIAL DEVELOPMENT

AT

59 GLOUCESTER ROAD, READING

FOR

KISS HOUSE

PROJECT NO. P1018

MARCH 2021

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CONTENTS

1	INTRODUCTION AND SCOPE	2
2	PLANNING POLICY GUIDANCE	3
3	DESCRIPTION OF THE SITE	6
4	PROPOSED DEVELOPMENT	10
5	DEVELOPMENT TRAFFIC IMPACT	15
6	WALKING, CYCLING AND PUBLIC TRANSPORT	17
7	CONCLUSION	21

APPENDIX A – Site plan

APPENDIX B – TRICS Data

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Working in conjunction with GTA Civils & Transport Ltd.





1 INTRODUCTION AND SCOPE

- 1.1 This statement is based on instructions from Carli Jordan and Adrian James of Kiss House and relates to the proposed residential development at 59 Gloucester Road, Reading.
- 1.2 The purpose of this Statement is to examine the traffic and transport impacts associated with the proposed development and the scope of work includes:
 - Site visit;
 - Review of site permitted development and proposed planning application;
 - Detailing of relevant national and local policies;
 - Review of local transport networks;
 - Review of relevant accident data;
 - Assessment of current accessibility by all transport modes (bus, cycle, walking, etc.);
 - Analysis of trip generations of existing and proposed development using the TRICS Database;
 - Analysis of parking requirements;
 - Assessment of the sightline requirements;
 - Assessment of impacts of proposed development on local and strategic highway networks.
- 1.3 Pre-application advice (Ref. 201078/PREAPP) has been sought from Reading Borough Council (RBC) and their response includes reference to a number of highway related issues which are also addressed through this statement.
- 1.4 This statement has been written with reference to the following planning frameworks and transport guidance documents:
 - National Planning Policy Framework (NPPF) July 2018;
 - Reading Borough Council Local Plan 2019;
 - Manual for Streets (MFS) 1 and 2 - 2007; and
 - TRICS (Trip Rate Information Computer System) Database.



2 PLANNING POLICY GUIDANCE

National Planning Policy Framework (NPPF)

- 2.1 The National Planning Policy Framework, first published in 2012, revised in July 2018 and again in February 2019 sets out the Government's policies for England and how these are expected to be applied. The NPPF provides a framework within which locally-prepared plans for housing and other development can be produced. Section 2 of the document '*Achieving sustainable development*', sets out how the planning system will operate to achieve this. In particular, paragraph 10 states: '*So that sustainable development is pursued in a positive way, at the heart of the Framework is a presumption in favour of sustainable development.*'
- 2.2 The NPPF states in paragraph 7 that '*the purpose of the planning system is to contribute to the achievement of sustainable development.*' The three main objectives of sustainable development being; economic, social and environmental.
- 2.3 Within Section 9 – '*Promoting sustainable transport*', paragraph 103 recognises that the planning system should actively manage patterns of growth in support of the five objectives listed below 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.
- 2.4 At paragraph 108, the document provides guidance for how development proposals should be assessed and determined. It states: '*In assessing sites that may be allocated for development in plans, or specific applications for development, it should be ensured 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; and*
 - *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.*'



- 2.5 Paragraph 109 gives clear guidance on how highways related issues are to be considered in determining development applications: *'Development should only be prevented or refused on highways grounds if there would be an unacceptable impact on highway safety, or the residual cumulative impacts on the road network would be severe.'*
- 2.6 The means by which an assessment of transport issues may be presented is clarified in paragraph 111 which states: *'All developments that will generate significant amounts of movement should be required to provide a travel plan, and the application should be supported by a transport statement or transport assessment so that the likely impacts of the proposal can be assessed.'*

Reading Borough Local Plan 2019

- 2.7 The new Local Plan is now the main planning document for Reading and it replaces a number of previous documents. The plan sets out a number of objectives, which, from a transport and sustainability perspective, include the following:
- Make the most efficient use of Reading's limited land, particularly previously developed land, to ensure that as many new homes as possible are delivered to meet identified needs, particularly needs for affordable housing;
 - Improve the quality of life for those living, working, studying in and visiting the Borough, creating inclusive, sustainable communities with good access to employment, open space and waterspace, transport, education, services and facilities (such as sustainable water supplies and wastewater treatment, healthcare services, social and community facilities, sport and recreation, etc.) to meet identified needs;
 - Improve and develop excellent transport systems to improve accessibility within Reading and for the wider area by sustainable modes of transport, including walking and cycling
- 2.8 Policy CC4 of the plan reiterates the sustainable development aspirations of the NPPF and states: *'A positive approach to considering development proposals will be taken that reflects the presumption in favour of sustainable development contained in the National Planning Policy Framework (NPPF).'*

The key Transport Policy within the Local plan is Policy TR1: *Achieving the Transport Strategy* which sets out the following overarching requirements for development:

- Proposed development should contribute appropriately to meeting the objectives of the most up-to-date Local Transport Plan or any successor document, including sub-strategies, specific projects identified and the local action plans.
- Planning permission will not be granted for major development proposals unless there is a commitment to implement measures to promote and improve sustainable transport facilities, such as through provision to encourage walking, cycling and the use of public transport; and through agreed travel plans, safe



routes to local facilities and services, including schools and parks, and similar measures.

- All development proposals should make appropriate provision for works and contributions to ensure an adequate level of accessibility and safety by all modes of transport from all parts of a development, particularly by public transport, walking and cycling, in accordance with any agreed transport assessment submitted as part of the application.

Summary on Policy

- 2.9 The proximity of the proposed development to local services and amenities in the Gloucester Road area is consistent with relevant transport. By locating the development within easy reach of all facilities and services and within good walking distance of a frequent bus services, it is aligned with Government sustainable development aspirations.



3 DESCRIPTION OF THE SITE

- 3.1 The 0.13ha site is located within the suburb of West Reading approximately 2.5km west of the town centre (Refer Fig. 1) and is within parking Zone 2, Primary Core Area.

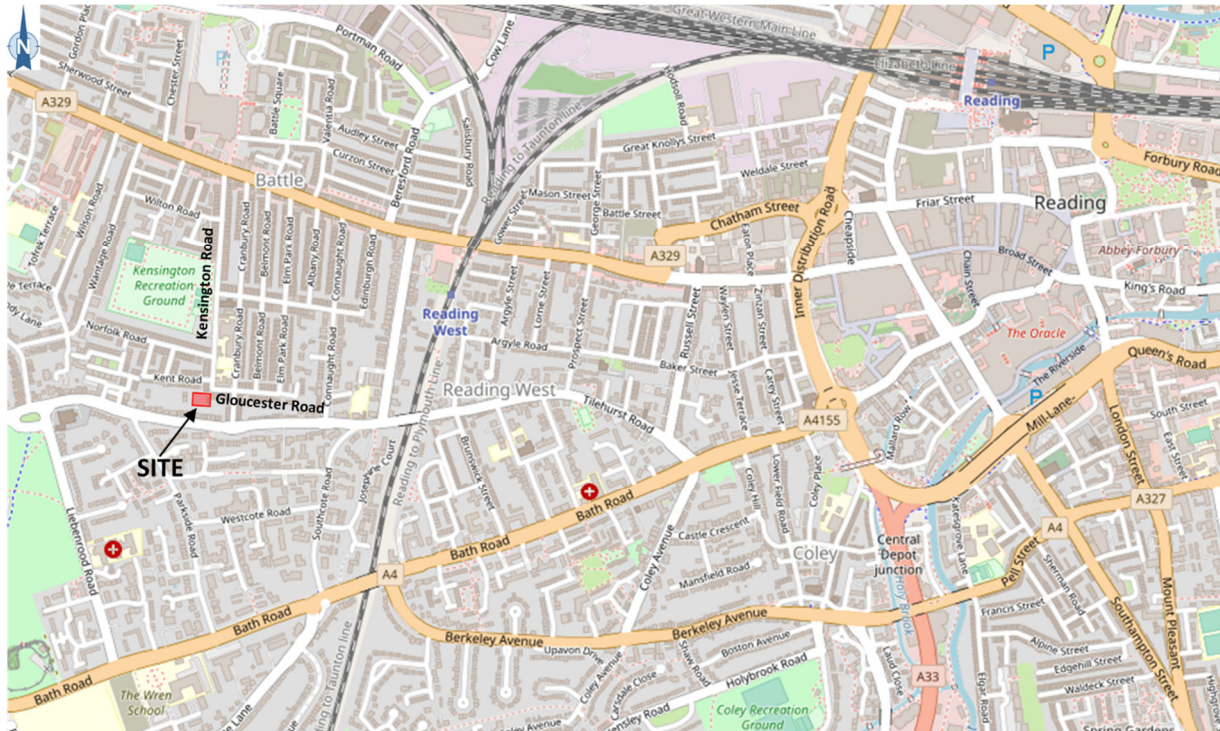


Figure 1: Location plan

- 3.2 The existing site is predominantly vacant ground with a single story building in the southeast corner that has been used as a nursery and a B1 use class studio with a GFA of 71m² (Refer Fig. 2).



Fig 2: Plan of existing site



- 3.3 Pedestrian access to the site exists from the northern side of Gloucester Road. There is a frontage width of 5.2m between the western side boundary of number 57 Gloucester Road where a telegraph pole exists and a low brick boundary wall along the frontage of number 192 Kensington Road as shown in Photo 1.



Photo 1: Existing site frontage

- 3.4 Gloucester, Kensington and Kent Roads, together with all surrounding roads in the immediate vicinity (approx. 500m) of the site, are within a 20 mph traffic calmed area (Refer Photo 2). The combination of raised junctions, speed humps, parked cars and narrow road widths ensures observed speeds are generally at or below 20mph.



Photo 2: Start of 20mph zone



- 3.5 There is a total carriageway width of 6.4m with 2.1m to 2.3m wide tarmac footways on both sides of the road and there is a system of street lighting. Gloucester Road and the adjoining roads have significant lengths of double yellow markings with accompanying signage detailing the resident parking allowances within the Primary Core Area Zone 2 (Refer Photos 3 and 4).



Photo 3



Photo 4

- 3.6 National, regional and local planning policies promote the need for sustainable developments to have good accessibility to services and facilities. Ideally, developments should be located within walking or cycling distance of education, employment, health, retail and leisure facilities. The following amenities and facilities are in the immediate vicinity of the site:

Education services

- Battle Primary Academy - 120m
- St Edward's Prep Primary School – 550m
- The Wren School (Secondary) – 1.1km
- Blessed Hugh Faringdon Catholic School – 1.4km

Medical services

- Western Elms Surgery – 850m
- Russell Street Surgery – 1.3km
- Castle Hill Dental Care Ltd – 1.0km
- Inspire Dental, Reading – 1.4km

Transport (See also Section 6)

- Reading West Rail Station – 1.1km
- Tilehurst Road bus stops – 130m
- Oxford Road bus stops – 500m



Other amenities/services

- Tesco Express supermarket – 1.0km
- M&S Simply Food – 1.07km
- Lidl supermarket – 880m
- Oxford Road local shopping precinct 500m

3.7 In terms of the operation and safety of the road network, records are kept of personal injury accidents. A guide to the local accident patterns can be viewed at www.crashmap.co.uk. This web site uses data approved by the National Statistics Authority and reported by the Department for Transport each year. Data for this area indicates that there have been no incidents in the vicinity of the subject site over the past five years.



4 PROPOSED DEVELOPMENT

- 4.1 The proposal is to redevelop the site to provide two new detached dwellings constructed to Passivhaus standards and including associated off street parking. The existing studio building is to be retained and refurbished as part of this proposal for exclusive use by the owner of one of the new dwellings. The proposed site layout is provided in Appendix A.

Access

- 4.2 As noted on the layout plan, it is proposed to utilise the 5.2m length of Gloucester Road frontage to provide a means of vehicular access to the two dwellings. The pre-application advice confirmed that any access would need to maintain a minimum 1.0m clearance to the existing telegraph pole so a 4.0m wide shared drive and vehicle crossing is proposed to meet this requirement.
- 4.3 The pre-application advice also references *Section 7.2 Street Dimensions*, of Manual for Streets (MfS) which sets out guidelines for the design of urban streets. The pre-application advice suggests that a greater width is required to provide two-way vehicle movements in line with normal street design practice.
- 4.4 By contrast, this proposal is simply seeking to provide a shared drive crossing of the frontage property boundary to the existing kerb over a distance of 2.1m and therefore does not warrant the application of street design concepts. Once vehicles have crossed from the kerb into the property, there is ample width and space to serve the typical manoeuvring needs of a development of this type and scale and to facilitate enter and leave in a forward gear.
- 4.5 It is recognised, however, that it would be appropriate to apply the conditions and requirements of the RBC Vehicle Crossing Policy which requires that: *'The vehicle hard-standing area on property frontage should have minimum dimensions of at least 2.4m wide (along the boundary entry point) and a minimum 4.8m length (this is the minimum depth of property frontage required).'* In relation to this requirement and as previously stated, a width of 4.0m is provided and there is over 14m of clear space between the kerb and the first form of obstruction inside the site.
- 4.6 Other aspects of the RBC vehicle Crossing Policy such as surface treatments, drainage or whether a dropped kerb is necessary can be assessed through the normal vehicle crossing application process.



Access visibility

- 4.7 The design of sightlines at junctions and access points is discussed in detail in MfS which was published in 2007. This guide is also meant to complement local street design guidance produced by local authorities.
- 4.8 An 'X' dimension of 2.4m (Refer Fig. 3) which is normally used in most built up situations, as this represents a reasonable maximum distance between the front of the car and the driver's eye, is considered suitable at this location. According to MfS, using an 'X' distance in excess of 2.4m is not generally required.

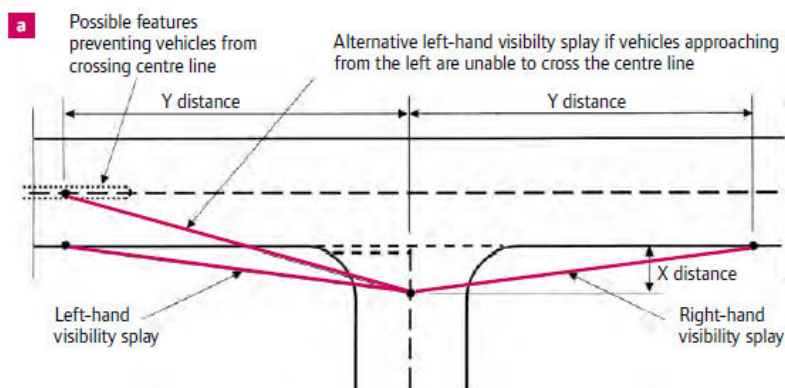


Figure.3: Junction visibility requirements

- 4.9 Sightlines at the proposed access onto Gloucester Road were assessed on site for compliance with the MfS requirements. For a 20mph road, a minimum (Y) distance of 25m at 2.4m(X) is required. As can be seen in Photos 5 and 6, the minimum sight distance requirements are comfortably exceeded.



Photo 5: Sightline to the north along Kensington Road



Photo 6: Sightline to the west along Gloucester Road

Car parking

4.10 Managing car parking provision in a more efficient and effective manner will help to:

- encourage more sustainable use of other modes of transport;
- reduce the land take of the development;
- promote linked trips;
- increase access to development for those without a car; and
- tackle congestion.

4.11 Government planning policy on transport is set out principally in the NPPF. This provides advice on how local authorities should integrate land use and transport, particularly through the development process and promote sustainable transport. Its key objectives are to:

- Ensure that opportunities for sustainable transport have been taken up depending on the nature and location of the site, to reduce the need for major transport infrastructure;
- Ensure safe and suitable access to the site can be achieved for all users; and
- Give priority to pedestrian and cycle movements and have access to high quality public transport facilities.

4.12 In setting local parking standards for residential and non-residential development, the NPPF states that local planning authorities should take into account: - the accessibility of the development, the type, mix and use of the development, the availability of and opportunities for public transport, local car ownership levels and an overall need to reduce the use of high-emission vehicles. It also acknowledges that parking policies can influence significantly the demand for travel by car.



- 4.13 In relation to parking, local authorities should not require developers to provide more space than they themselves wish, other than in exceptional circumstances which might include for example where there are significant implications for road safety which cannot be resolved through the introduction or enforcement of on-street parking controls.
- 4.14 As has been noted, the subject site lies within Zone 2 Primary Core Area within Residents' Parking Permit Area Zone 07R. The pre-application advice notes that resident parking permits would not be available to new residents. The advice also noted that a car free scheme could be considered. However, in recognition of this, the proposed scheme includes provision of on-site parking.
- 4.15 The RBC SPD document - *Revised Parking Standards and Design*, sets out the maximum parking requirements for various forms of development within the different RBC Zones which reflect the availability and likely use of alternative modes of transport and expected levels of car ownership.
- 4.16 Section 6 sets out the sustainability credentials of this centrally located site. The level of amenity available ensures that residents have realistic choices of sustainable modes of transport by walking, cycling or public transport. The accessibility of local shops, schools and services means that multiple car ownership in this location is unlikely.
- 4.17 With consideration of the standards and the pre application advice, the level of parking provided for this site is 4 spaces as shown on the site plan in Appendix A and provides one space for each dwelling, a visitor space and a space for the studio. The parking provision ensures there is no additional parking burden placed on the surrounding local streets.
- 4.18 Given the site's location and accessibility to numerous public transport connections and other sustainable modes of transport (Refer Section 6), it is likely that car dependency will be low. Therefore, proposed car parking arrangements are in line with the standards and appropriate for this proposal.



Cycle parking

- 4.19 The RBC parking standards also provides guidance for the allocation of cycle parking and notes that standards for cycle parking should be applied as minimum standards, and must be reflective of the potential for cycling to each land use type. The standard requires that the following objectives are considered:
- Conveniently located in relation to the trip origin and destination. It is considered that cycle activity is encouraged when parking is provided in more convenient locations to car parking, i.e. parking entrances;
 - Easy to use; Where the cycle can be secured easily and quickly to the parking device;
 - Secure; where parking is overlooked by development nearby, located close to well used areas or is within the coverage of a local security camera system. After dark lighting is required to ensure personal safety for bike users; and
 - Covered; particularly important for overnight and all day parking at places of employment and transport interchanges.
- 4.20 For residential development within zones 1-4, two spaces per dwelling are required. Two spaces are provided for each dwelling within the shared forecourt area adjacent to the houses.
- 4.21 The car and cycle parking provision is in accordance with the requirements of the RBC Parking Standards.



5 DEVELOPMENT TRAFFIC IMPACT

- 5.1 An assessment has been completed which demonstrates that the traffic associated with the proposed development will not have a material impact on the local highway network.
- 5.2 The TRICS database was analysed and data from sites with similar characteristics to the application site were applied. The database has been interrogated under the land uses Houses – Privately owned and Class B1 Business use and the results are presented in the Tables below. The full TRICS data output is presented in Appendix C.
- 5.3 As noted, the existing studio has a GFA of 71m² and there are two new detached dwellings proposed for the site.

Trip Periods	Forecast trip generation					
	Trip rate per 100m ² GFA			Total trips for 71m ² GFA		
	Arr	Dep	Total	Arr	Dep	Total
AM Peak: 08.00-09.00	1.937	0.342	2.279	1.375	0.243	1.618
PM Peak: 17.00-18.00	0.311	1.596	1.906	0.221	1.133	1.353
Daily Flows: 07.00-19.00	8.204	8.304	16.508	5.825	5.896	11.721

Table 5.1: Trip Generation for Class B1 studio (Existing trips to site)

Trip Periods	Forecast trip generation					
	Trip rate per dwelling			Total trips for 2 dwellings		
	Arr	Dep	Total	Arr	Dep	Total
AM Peak: 08.00-09.00	0.122	0.307	0.429	0.244	0.614	0.858
PM Peak: 17.00-18.00	0.265	0.123	0.388	0.530	0.246	0.776
Daily Flows: 07.00-19.00	2.143	2.122	4.265	4.286	4.244	8.530

Table 5.2: Trip Generation for 2 residential houses, privately owned

Development Scenario	AM Peak			PM Peak			Daily Trips
	Arr	Dep	Total	Arr	Dep	Total	
Existing use (Studio)	1.375	0.243	1.618	0.221	1.133	1.353	11.721
Proposed additional use (2 detached dwellings)	0.244	0.614	0.858	0.530	0.246	0.776	8.530
Total traffic generation for proposed site	1.619	0.857	2.476	0.751	1.379	2.129	20.251

Table 5.3: Summary of trip generations

- 5.4 The trip rate peak times for this type of use and activity is between 0800 and 0900, in the mornings and between 1700 and 1800 in the evenings.



- 5.5 The trip rate for the proposed use is 2.48 movements in the AM peak hour and 2.13 movements during the PM peak. The overall 12 hour trip rate generation is 20.25 movements which on average is approximately 1.69 movements per hour or 1 movements every 35 minutes.
- 5.6 The increase in movements attributable to the proposed development is 0.86 movements during the AM peak and 0.78 movements during the PM peak. The overall 12 hour trip rate generation is 8.53 movements which on average equates to an additional 0.71 movements per hour or 1 movements every 84 minutes.
- 5.7 This analysis demonstrates that the traffic volumes associated with the development are not significant when compared to the daily flows on the adjoining roads and certainly within the likely daily variation expected in background traffic.
- 5.8 Based on the analysis it is therefore considered that the proposed development uses, when at peak, are acceptable in terms of highway safety and capacity impacts on Gloucester Road.



6 WALKING, CYCLING AND PUBLIC TRANSPORT

Walking opportunities

- 6.1 Recognised best practice says that walking is the most important mode of travel at the local level and offers the greatest potential to replace short car trips, particularly under 2km. More direct, safe and secure walking routes particularly in and around town centres and local neighbourhoods, and to schools and stations, to reduce the actual walking distance between land uses, and to public transport should be created. Walking also forms an often forgotten part of all longer journeys by public transport and car.
- 6.2 In terms of the journey purpose, local trips on foot are likely to relate to short shopping trips, access to leisure facilities, trips to school and nursery, local visiting, and trips to bus stops as part of linked trips to further destinations. Walking is usually chosen as the mode for these trips as a result of the relatively short distances involved. However, modal choice for these trips can also be influenced by variables such as route condition, weather and topography.
- 6.3 The location of this development site on Gloucester Road offers the potential to encourage walking trips to and from the site, especially to public transport links and local shopping services. The proposed site is only approximately 130m to the Tilehurst Road bus stops and 950m to the Reading West station.
- 6.4 The Institution of Highway and Transportation document '*Planning for Public Transport in Developments*' suggests that new development should be so located, that public transport trips involve a walking distance of no greater than 400m to the nearest bus stop. This distance is nominated as guidance and it is noted that there are many instances where slightly longer distances have been considered acceptable. In the absence of any other form of public transport, the potential for walking trips to and from the application site is extremely probable.
- 6.5 The DETR publication entitled '*Reducing Transport Emissions through Planning*' paragraph 2.4.22 and Table 11 on Page 47, states that '*some 63% of shoppers who live within 1km of a local shopping and District Centre carry out shopping trips on foot*'. This publication also states that '*taken as a whole, the analysis shows that walking (at 53%) for journeys to local and non-local centres, is the dominant mode for trips up to 1.6km.*'
- 6.6 The subject site is located within an area that already represents the highest level of walking to and from work (26%) when compared across the Borough according to the Reading Transport Strategy 2036.



6.7 Given the location of the application site a reasonable proportion of trips can be expected to be made on foot. The Institution of Highway and Transportation (IHT) in its '*Guidelines for Providing for Journeys on Foot-(2000)*' suggests an average walking speed of 1.4m/s can be assumed, so the transport links, schools and local shops and services are well within a walking distance of the 18 minutes or less as advocated within this document.

Cycling opportunities

6.8 The Reading Transport Strategy 2036 notes that cycling levels in Reading are slightly above the national average and the RBC wishes to promote and increase this level of usage particularly for journeys under 5km.

6.9 The subject site is located in an area that represents the second highest (4.1%) level of cycle usage in the Borough. Cycle facilities tend to be on road with most of the major amenities and facilities within an easy cycle distance. There is convenient access to both on-road and traffic free sections of the various Reading Cycle Routes as shown on Figure 4, which provide convenient access to Reading town centre, the stations and most amenities.

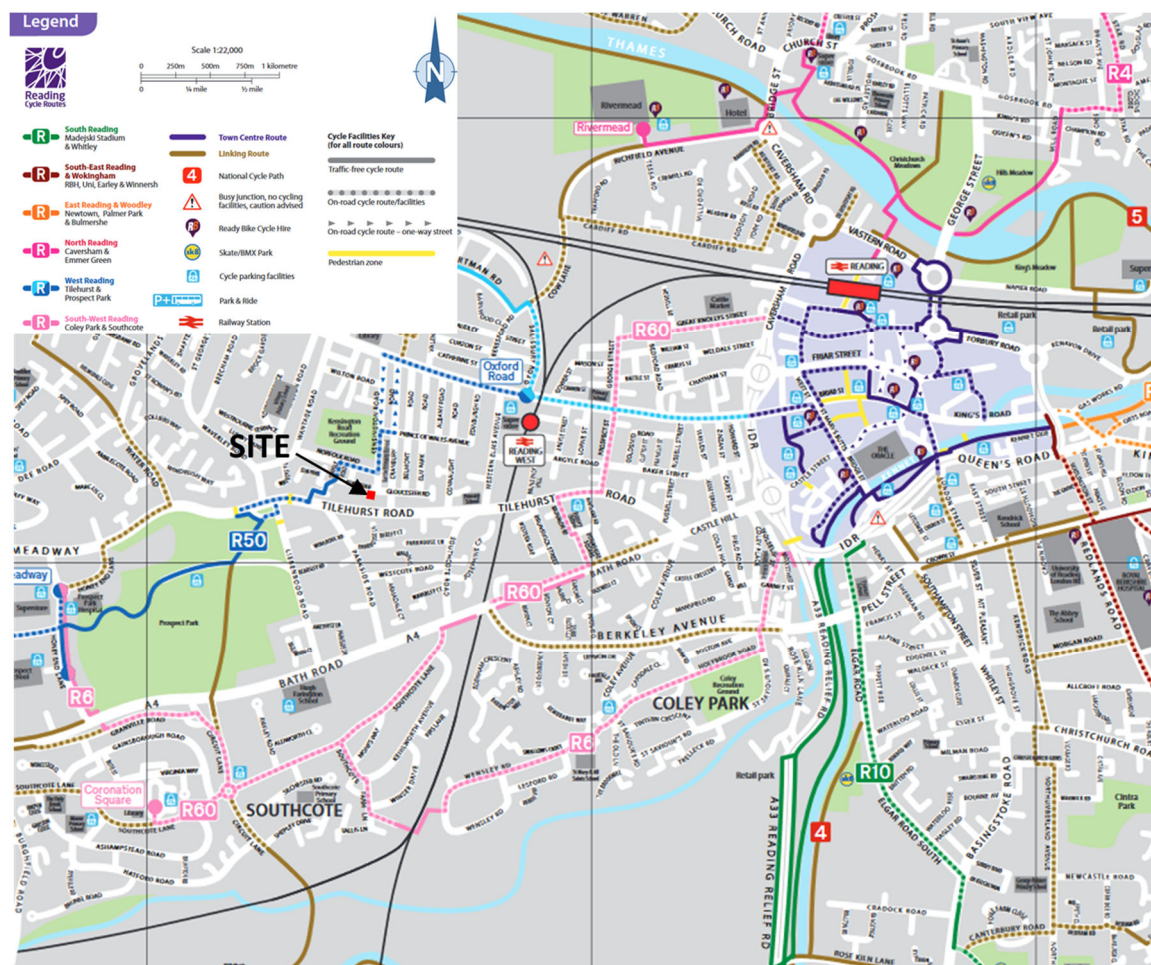


Figure 4: Location of nearest local and national cycle route
(Extract from Reading cycle routes network map)



- 6.10 Both the Reading West and the main Reading rail stations and also the town centre can be easily reached in under 10 minutes by bicycle. The nearest shops, services and supermarkets are also within this distance.
- 6.11 Provision of cycle storage facilities in a safe, secure and sheltered location for residents will encourage cycling for all types of trip. The proposal provides adequate cycle parking for each dwelling to ensure cycling will offer a real choice for all residents of the proposed development.

Public transport links

- 6.12 The nearest rail station is Reading West, just 950m from the site, which is served by Great Western Railway (GWR) services between Reading and Basingstoke or Newbury. Being a main network interchange station, Reading station provides extensive rail connections to the southwest and south Wales as well as fast services to London, Oxford and Birmingham.
- 6.13 The site is served by several bus routes accessible from either Tilehurst Road (130m) or Oxford Road (500m) (Refer Fig.5). The no. 33 Reading Buses route along Tilehurst Road runs between Reading town centre and Turnham's Farm with services every 10-15min. Monday to Saturday and half hourly services on Sundays. This route is supplemented with additional services from the 932 and 933 buses.
- 6.14 The Oxford Road stops are served by the nos. 15, 15a, 16, 17, 85, 88, 91, 143 and 915 routes. All routes run from Reading town centre and west to Purley, Kentwood, Tilehurst and Dee Park. Needless to say, there are numerous buses passing the Oxford road stops at frequent intervals.



Summary – site accessibility

- 6.15 It is evident and unsurprising that this site is exceptionally well served by both bus and rail public transport and is well situated in the context of the surrounding land uses. There are also various employment, educational and community facilities that are accessible by sustainable transport mode.
- 6.16 The proximity of the site to central Reading and Reading station provides access to a range of potential sources of employment in varied industries and sectors with easy access to Reading and realistic commuting options to other major centres such as Oxford, Birmingham, Swindon and Bristol.



7 CONCLUSION

- 7.1 This Transport Statement has been completed to support the proposed residential development of two detached dwellings and retention of the existing studio building at Gloucester Road, Reading.
- 7.2 The scheme proposes a shared drive with a vehicle crossing as a means of connecting the site to the Gloucester Road kerb.
- 7.3 Analysis of the traffic impact of the development demonstrates that there will be no discernible negative effect on the local highway network when compared to existing traffic levels. The exceptional range of public transport options combined with the ease of accessibility by walking or bicycle to all necessary services means that car dependency will be low and the modelled trip data presents a worst case scenario.
- 7.4 The scheme will be in accordance with the aims and objectives of local and national policy with regard to accessibility by walking, cycling and public transport. It will offer occupiers of the new houses a choice in their mode of transport.
- 7.5 The proposed scheme offers safe and efficient access arrangements for all traffic (cars, cyclists and pedestrians).
- 7.6 The site has access to sustainable transport options for commuting to major employment destinations within Reading as well as fast commuter links to London, Bristol, Oxford and Birmingham.
- 7.7 The proposed development is in line with the parking requirements for both cars and cycles as laid down in the Reading Borough Council SPD Revised Parking Standards and Design and reflects the expected levels of car ownership. The parking provision ensures there is no additional parking burden placed on the surrounding local streets.
- 7.8 The junction of the proposed vehicle crossing at Gloucester Road in respect of both the sightlines and the trip generation satisfy all standards with sightline requirements including the government's Manual for Streets.
- 7.9 This review has not identified any aspects of this development which could cause severe harm in highway safety terms and there are no transportation reasons which should prevent the development of this site. The Highway Authority, therefore ought to be able to provide a positive recommendation for approval of this planning application.



APPENDIX A

Site plan





APPENDIX B

TRICS data

Calculation Reference: AUDIT-349901-190411-0423

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 02 - EMPLOYMENT
 Category : B - BUSINESS PARK

MULTI-MODAL VEHICLESSelected regions and areas:

02	SOUTH EAST	
	EX ESSEX	2 days
03	SOUTH WEST	
	DV DEVON	1 days
05	EAST MIDLANDS	
	LN LINCOLNSHIRE	1 days
06	WEST MIDLANDS	
	WO WORCESTERSHIRE	1 days
10	WALES	
	CF CARDIFF	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: 1500 to 5000 (units: sqm)
 Range Selected by User: 975 to 5000 (units: sqm)

Parking Spaces Range: All Surveys Included

Public Transport Provision:

Selection by: Include all surveys

Date Range: 01/01/10 to 26/06/18

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	1 days
Wednesday	1 days
Thursday	1 days
Friday	2 days

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

Selected survey types:

Manual count	6 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:

Edge of Town	5
Neighbourhood Centre (PPS6 Local Centre)	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:

Industrial Zone	3
Commercial Zone	1
Village	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.

Secondary Filtering selection:Use Class:

B1	6 days
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This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 1 mile:

5,001 to 10,000	1 days
10,001 to 15,000	3 days
15,001 to 20,000	2 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

50,001 to 75,000	1 days
125,001 to 250,000	4 days
250,001 to 500,000	1 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.6 to 1.0	2 days
1.1 to 1.5	4 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

No	6 days
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This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	6 days
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This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1	CF-02-B-06	BUSINESS PARK	CARDIFF
	MALHOUSE AVENUE		
	CARDIFF		
	PONTPRENNAU		
	Edge of Town		
	No Sub Category		
	Total Gross floor area:	1642 sqm	
	Survey date: MONDAY	12/03/18	Survey Type: MANUAL
2	DV-02-B-01	BUSINESS PARK	DEVON
	MANATON CLOSE		
	EXETER		
	MATFORD BUSINESS PARK		
	Edge of Town		
	Commercial Zone		
	Total Gross floor area:	1500 sqm	
	Survey date: WEDNESDAY	05/07/17	Survey Type: MANUAL
3	EX-02-B-01	BUSINESS PARK	ESSEX
	BRUNEL COURT		
	COLCHESTER		
	SEVERALLS INDUSTRIAL PK		
	Edge of Town		
	Industrial Zone		
	Total Gross floor area:	2900 sqm	
	Survey date: FRIDAY	18/05/18	Survey Type: MANUAL
4	EX-02-B-02	BUSINESS PARK	ESSEX
	WYNCOLLS ROAD		
	COLCHESTER		
	SEVERALLS INDUSTRIAL PK		
	Edge of Town		
	Industrial Zone		
	Total Gross floor area:	4083 sqm	
	Survey date: FRIDAY	18/05/18	Survey Type: MANUAL
5	LN-02-B-02	BUSINESS PARK	LINCOLNSHIRE
	CARDINAL CLOSE		
	LINCOLN		
	Edge of Town		
	Industrial Zone		
	Total Gross floor area:	5000 sqm	
	Survey date: THURSDAY	25/06/15	Survey Type: MANUAL
6	WO-02-B-02	BUSINESS PARK	WORCESTERSHIRE
	BIRMINGHAM ROAD		
	NEAR BROMSGROVE		
	LICKEY END		
	Neighbourhood Centre (PPS6 Local Centre)		
	Village		
	Total Gross floor area:	4187 sqm	
	Survey date: TUESDAY	26/06/18	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/B - BUSINESS PARK

MULTI-MODAL VEHICLES**Calculation factor: 100 sqm****Estimated TRIP rate value per 100 SQM shown in shaded columns****BOLD print indicates peak (busiest) period**

Time Range	ARRIVALS				DEPARTURES				TOTALS			
	No. Days	Ave. GFA	Trip Rate	Estimated Trip Rate	No. Days	Ave. GFA	Trip Rate	Estimated Trip Rate	No. Days	Ave. GFA	Trip Rate	Estimated 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	6	3219	0.668	0.668	6	3219	0.119	0.119	6	3219	0.787	0.787
08:00 - 09:00	6	3219	1.937	1.937	6	3219	0.342	0.342	6	3219	2.279	2.279
09:00 - 10:00	6	3219	1.015	1.015	6	3219	0.580	0.580	6	3219	1.595	1.595
10:00 - 11:00	6	3219	0.673	0.673	6	3219	0.595	0.595	6	3219	1.268	1.268
11:00 - 12:00	6	3219	0.632	0.632	6	3219	0.564	0.564	6	3219	1.196	1.196
12:00 - 13:00	6	3219	0.632	0.632	6	3219	0.704	0.704	6	3219	1.336	1.336
13:00 - 14:00	6	3219	0.720	0.720	6	3219	0.652	0.652	6	3219	1.372	1.372
14:00 - 15:00	6	3219	0.492	0.492	6	3219	0.709	0.709	6	3219	1.201	1.201
15:00 - 16:00	6	3219	0.419	0.419	6	3219	0.564	0.564	6	3219	0.983	0.983
16:00 - 17:00	6	3219	0.482	0.482	6	3219	1.362	1.362	6	3219	1.844	1.844
17:00 - 18:00	6	3219	0.311	0.311	6	3219	1.595	1.595	6	3219	1.906	1.906
18:00 - 19:00	6	3219	0.223	0.223	6	3219	0.518	0.518	6	3219	0.741	0.741
19:00 - 20:00												
20:00 - 21:00												
21:00 - 22:00												
22:00 - 23:00												
23:00 - 24:00												
Total Rates:			8.204	8.204			8.304	8.304			16.508	16.508

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.

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Parameter summary

Trip rate parameter range selected:	1500 - 5000 (units: sqm)
Survey date date range:	01/01/10 - 26/06/18
Number of weekdays (Monday-Friday):	6
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	0
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are shown. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

TRIP RATE for Land Use 02 - EMPLOYMENT/B - BUSINESS PARK

MULTI-MODAL CYCLISTS**Calculation factor: 100 sqm****Estimated TRIP rate value per 100 SQM shown in shaded columns****BOLD print indicates peak (busiest) period**

Time Range	ARRIVALS				DEPARTURES				TOTALS			
	No. Days	Ave. GFA	Trip Rate	Estimated Trip Rate	No. Days	Ave. GFA	Trip Rate	Estimated Trip Rate	No. Days	Ave. GFA	Trip Rate	Estimated 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	6	3219	0.031	0.031	6	3219	0.000	0.000	6	3219	0.031	0.031
08:00 - 09:00	6	3219	0.083	0.083	6	3219	0.000	0.000	6	3219	0.083	0.083
09:00 - 10:00	6	3219	0.047	0.047	6	3219	0.005	0.005	6	3219	0.052	0.052
10:00 - 11:00	6	3219	0.010	0.010	6	3219	0.000	0.000	6	3219	0.010	0.010
11:00 - 12:00	6	3219	0.010	0.010	6	3219	0.021	0.021	6	3219	0.031	0.031
12:00 - 13:00	6	3219	0.016	0.016	6	3219	0.021	0.021	6	3219	0.037	0.037
13:00 - 14:00	6	3219	0.005	0.005	6	3219	0.010	0.010	6	3219	0.015	0.015
14:00 - 15:00	6	3219	0.010	0.010	6	3219	0.036	0.036	6	3219	0.046	0.046
15:00 - 16:00	6	3219	0.010	0.010	6	3219	0.047	0.047	6	3219	0.057	0.057
16:00 - 17:00	6	3219	0.010	0.010	6	3219	0.031	0.031	6	3219	0.041	0.041
17:00 - 18:00	6	3219	0.000	0.000	6	3219	0.072	0.072	6	3219	0.072	0.072
18:00 - 19:00	6	3219	0.005	0.005	6	3219	0.005	0.005	6	3219	0.010	0.010
19:00 - 20:00												
20:00 - 21:00												
21:00 - 22:00												
22:00 - 23:00												
23:00 - 24:00												
Total Rates:			0.237	0.237			0.248	0.248			0.485	0.485

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.

TRIP RATE for Land Use 02 - EMPLOYMENT/B - BUSINESS PARK

MULTI-MODAL PEDESTRIANS**Calculation factor: 100 sqm****Estimated TRIP rate value per 100 SQM shown in shaded columns****BOLD print indicates peak (busiest) period**

Time Range	ARRIVALS				DEPARTURES				TOTALS			
	No. Days	Ave. GFA	Trip Rate	Estimated Trip Rate	No. Days	Ave. GFA	Trip Rate	Estimated Trip Rate	No. Days	Ave. GFA	Trip Rate	Estimated 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	6	3219	0.041	0.041	6	3219	0.036	0.036	6	3219	0.077	0.077
08:00 - 09:00	6	3219	0.119	0.119	6	3219	0.078	0.078	6	3219	0.197	0.197
09:00 - 10:00	6	3219	0.083	0.083	6	3219	0.052	0.052	6	3219	0.135	0.135
10:00 - 11:00	6	3219	0.047	0.047	6	3219	0.078	0.078	6	3219	0.125	0.125
11:00 - 12:00	6	3219	0.052	0.052	6	3219	0.083	0.083	6	3219	0.135	0.135
12:00 - 13:00	6	3219	0.072	0.072	6	3219	0.161	0.161	6	3219	0.233	0.233
13:00 - 14:00	6	3219	0.290	0.290	6	3219	0.223	0.223	6	3219	0.513	0.513
14:00 - 15:00	6	3219	0.088	0.088	6	3219	0.104	0.104	6	3219	0.192	0.192
15:00 - 16:00	6	3219	0.072	0.072	6	3219	0.057	0.057	6	3219	0.129	0.129
16:00 - 17:00	6	3219	0.083	0.083	6	3219	0.109	0.109	6	3219	0.192	0.192
17:00 - 18:00	6	3219	0.098	0.098	6	3219	0.093	0.093	6	3219	0.191	0.191
18:00 - 19:00	6	3219	0.026	0.026	6	3219	0.047	0.047	6	3219	0.073	0.073
19:00 - 20:00												
20:00 - 21:00												
21:00 - 22:00												
22:00 - 23:00												
23:00 - 24:00												
Total Rates:			1.071	1.071			1.121	1.121			2.192	2.192

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.

TRIP RATE for Land Use 02 - EMPLOYMENT/B - BUSINESS PARK

MULTI-MODAL PUBLIC TRANSPORT USERS**Calculation factor: 100 sqm****Estimated TRIP rate value per 100 SQM shown in shaded columns****BOLD print indicates peak (busiest) period**

Time Range	ARRIVALS				DEPARTURES				TOTALS			
	No. Days	Ave. GFA	Trip Rate	Estimated Trip Rate	No. Days	Ave. GFA	Trip Rate	Estimated Trip Rate	No. Days	Ave. GFA	Trip Rate	Estimated 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	6	3219	0.052	0.052	6	3219	0.000	0.000	6	3219	0.052	0.052
08:00 - 09:00	6	3219	0.321	0.321	6	3219	0.000	0.000	6	3219	0.321	0.321
09:00 - 10:00	6	3219	0.181	0.181	6	3219	0.005	0.005	6	3219	0.186	0.186
10:00 - 11:00	6	3219	0.078	0.078	6	3219	0.000	0.000	6	3219	0.078	0.078
11:00 - 12:00	6	3219	0.016	0.016	6	3219	0.016	0.016	6	3219	0.032	0.032
12:00 - 13:00	6	3219	0.072	0.072	6	3219	0.016	0.016	6	3219	0.088	0.088
13:00 - 14:00	6	3219	0.047	0.047	6	3219	0.052	0.052	6	3219	0.099	0.099
14:00 - 15:00	6	3219	0.026	0.026	6	3219	0.072	0.072	6	3219	0.098	0.098
15:00 - 16:00	6	3219	0.000	0.000	6	3219	0.093	0.093	6	3219	0.093	0.093
16:00 - 17:00	6	3219	0.005	0.005	6	3219	0.192	0.192	6	3219	0.197	0.197
17:00 - 18:00	6	3219	0.026	0.026	6	3219	0.347	0.347	6	3219	0.373	0.373
18:00 - 19:00	6	3219	0.005	0.005	6	3219	0.083	0.083	6	3219	0.088	0.088
19:00 - 20:00												
20:00 - 21:00												
21:00 - 22:00												
22:00 - 23:00												
23:00 - 24:00												
Total Rates:			0.829	0.829			0.876	0.876			1.705	1.705

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.

TRIP RATE for Land Use 02 - EMPLOYMENT/B - BUSINESS PARK

MULTI-MODAL TOTAL PEOPLE**Calculation factor: 100 sqm****Estimated TRIP rate value per 100 SQM shown in shaded columns****BOLD print indicates peak (busiest) period**

Time Range	ARRIVALS				DEPARTURES				TOTALS			
	No. Days	Ave. GFA	Trip Rate	Estimated Trip Rate	No. Days	Ave. GFA	Trip Rate	Estimated Trip Rate	No. Days	Ave. GFA	Trip Rate	Estimated 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	6	3219	0.984	0.984	6	3219	0.161	0.161	6	3219	1.145	1.145
08:00 - 09:00	6	3219	2.801	2.801	6	3219	0.502	0.502	6	3219	3.303	3.303
09:00 - 10:00	6	3219	1.610	1.610	6	3219	0.782	0.782	6	3219	2.392	2.392
10:00 - 11:00	6	3219	1.098	1.098	6	3219	0.891	0.891	6	3219	1.989	1.989
11:00 - 12:00	6	3219	0.999	0.999	6	3219	0.854	0.854	6	3219	1.853	1.853
12:00 - 13:00	6	3219	1.041	1.041	6	3219	1.155	1.155	6	3219	2.196	2.196
13:00 - 14:00	6	3219	1.362	1.362	6	3219	1.191	1.191	6	3219	2.553	2.553
14:00 - 15:00	6	3219	0.777	0.777	6	3219	1.186	1.186	6	3219	1.963	1.963
15:00 - 16:00	6	3219	0.673	0.673	6	3219	0.942	0.942	6	3219	1.615	1.615
16:00 - 17:00	6	3219	0.720	0.720	6	3219	2.221	2.221	6	3219	2.941	2.941
17:00 - 18:00	6	3219	0.539	0.539	6	3219	2.636	2.636	6	3219	3.175	3.175
18:00 - 19:00	6	3219	0.383	0.383	6	3219	0.803	0.803	6	3219	1.186	1.186
19:00 - 20:00												
20:00 - 21:00												
21:00 - 22:00												
22:00 - 23:00												
23:00 - 24:00												
Total Rates:			12.987	12.987			13.324	13.324			26.311	26.311

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-349901-200225-0251

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 03 - RESIDENTIAL
 Category : A - HOUSES PRIVATELY OWNED
 VEHICLES

Selected regions and areas:

02	SOUTH EAST	
	ES EAST SUSSEX	2 days
	EX ESSEX	1 days
	HC HAMPSHIRE	2 days
	SC SURREY	1 days
	WS WEST SUSSEX	1 days
03	SOUTH WEST	
	DC DORSET	1 days
	SM SOMERSET	1 days
05	EAST MIDLANDS	
	LN LINCOLNSHIRE	1 days
06	WEST MIDLANDS	
	SH SHROPSHIRE	2 days
	ST STAFFORDSHIRE	1 days
	WK WARWICKSHIRE	1 days
	WM WEST MIDLANDS	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: Number of dwellings
 Actual Range: 16 to 99 (units:)
 Range Selected by User: 6 to 100 (units:)

Parking Spaces Range: All Surveys Included

Bedrooms per Dwelling Range: All Surveys Included

Percentage of dwellings privately owned: All Surveys Included

Public Transport Provision:

Selection by: Include all surveys

Date Range: 01/01/11 to 25/09/19

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	4 days
Tuesday	1 days
Wednesday	4 days
Thursday	5 days
Friday	1 days

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

Selected survey types:

Manual count	15 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 undertaking using machines.

Selected Locations:

Edge of Town Centre	2
Edge of Town	13

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	15
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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.

Secondary Filtering selection:

Use Class:

C3 15 days

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order 2005 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 1 mile:

1,001 to 5,000	1 days
5,001 to 10,000	3 days
10,001 to 15,000	2 days
15,001 to 20,000	4 days
20,001 to 25,000	2 days
25,001 to 50,000	3 days

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

25,001 to 50,000	1 days
50,001 to 75,000	1 days
75,001 to 100,000	4 days
100,001 to 125,000	1 days
125,001 to 250,000	4 days
250,001 to 500,000	4 days

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.5 or Less	1 days
0.6 to 1.0	3 days
1.1 to 1.5	11 days

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.

Travel Plan:

Yes	4 days
No	11 days

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

No PTAL Present	14 days
2 Poor	1 days

This data displays the number of selected surveys with PTAL Ratings.

LIST OF SITES relevant to selection parameters

1	DC-03-A-08	BUNGALOWS	DORSET
	HURSTDENE ROAD		
	BOURNEMOUTH		
	CASTLE LANE WEST		
	Edge of Town		
	Residential Zone		
	Total Number of dwellings:	28	
	Survey date: MONDAY	24/03/14	Survey Type: MANUAL
2	ES-03-A-02	PRIVATE HOUSING	EAST SUSSEX
	SOUTH COAST ROAD		
	PEACEHAVEN		
	Edge of Town		
	Residential Zone		
	Total Number of dwellings:	37	
	Survey date: FRIDAY	18/11/11	Survey Type: MANUAL
3	ES-03-A-05	MIXED HOUSES & FLATS	EAST SUSSEX
	RATTLE ROAD		
	NEAR EASTBOURNE		
	STONE CROSS		
	Edge of Town		
	Residential Zone		
	Total Number of dwellings:	99	
	Survey date: WEDNESDAY	05/06/19	Survey Type: MANUAL
4	EX-03-A-02	DETACHED & SEMI-DETACHED	ESSEX
	MANOR ROAD		
	CHIGWELL		
	GRANGE HILL		
	Edge of Town		
	Residential Zone		
	Total Number of dwellings:	97	
	Survey date: MONDAY	27/11/17	Survey Type: MANUAL
5	HC-03-A-21	TERRACED & SEMI-DETACHED	HAMPSHIRE
	PRIESTLEY ROAD		
	BASINGSTOKE		
	HOUNDMILLS		
	Edge of Town		
	Residential Zone		
	Total Number of dwellings:	39	
	Survey date: TUESDAY	13/11/18	Survey Type: MANUAL
6	HC-03-A-22	MIXED HOUSES	HAMPSHIRE
	BOW LAKE GARDENS		
	NEAR EASTLEIGH		
	BISHOPSTOKE		
	Edge of Town		
	Residential Zone		
	Total Number of dwellings:	40	
	Survey date: WEDNESDAY	31/10/18	Survey Type: MANUAL
7	LN-03-A-04	DETACHED & SEMI-DETACHED	LINCOLNSHIRE
	EGERTON ROAD		
	LINCOLN		
	Edge of Town Centre		
	Residential Zone		
	Total Number of dwellings:	30	
	Survey date: MONDAY	29/06/15	Survey Type: MANUAL
8	SC-03-A-04	DETACHED & TERRACED	SURREY
	HIGH ROAD		
	BYFLEET		
	Edge of Town		
	Residential Zone		
	Total Number of dwellings:	71	
	Survey date: THURSDAY	23/01/14	Survey Type: MANUAL
9	SH-03-A-05	SEMI-DETACHED / TERRACED	SHROPSHIRE
	SANDCROFT		
	TELFORD		
	SUTTON HILL		
	Edge of Town		
	Residential Zone		
	Total Number of dwellings:	54	
	Survey date: THURSDAY	24/10/13	Survey Type: MANUAL

LIST OF SITES relevant to selection parameters (Cont.)

10	SH-03-A-06 ELLESMERE ROAD SHREWSBURY	BUNGALOWS		SHROPSHIRE
	Edge of Town Residential Zone Total Number of dwellings:		16	
	Survey date: THURSDAY		22/05/14	Survey Type: MANUAL
11	SM-03-A-01 WEMBDON ROAD BRIDGWATER NORTHFIELD	DETACHED & SEMI		SOMERSET
	Edge of Town Residential Zone Total Number of dwellings:		33	
	Survey date: THURSDAY		24/09/15	Survey Type: MANUAL
12	ST-03-A-08 SILKMORE CRESCENT STAFFORD MEADOWCROFT PARK	DETACHED HOUSES		STAFFORDSHIRE
	Edge of Town Residential Zone Total Number of dwellings:		26	
	Survey date: WEDNESDAY		22/11/17	Survey Type: MANUAL
13	WK-03-A-02 NARBERTH WAY COVENTRY POTTERS GREEN	BUNGALOWS		WARWICKSHIRE
	Edge of Town Residential Zone Total Number of dwellings:		17	
	Survey date: THURSDAY		17/10/13	Survey Type: MANUAL
14	WM-03-A-05 COUNDON ROAD COVENTRY	TERRACED & DETACHED		WEST MIDLANDS
	Edge of Town Centre Residential Zone Total Number of dwellings:		89	
	Survey date: MONDAY		21/11/16	Survey Type: MANUAL
15	WS-03-A-10 TODDINGTON LANE LITTLEHAMPTON WICK	MIXED HOUSES		WEST SUSSEX
	Edge of Town Residential Zone Total Number of dwellings:		79	
	Survey date: WEDNESDAY		07/11/18	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 03 - RESIDENTIAL/A - HOUSES PRIVATELY OWNED
VEHICLES

Calculation factor: 1 DWELLS

BOLD print indicates peak (busiest) period

Time Range	ARRIVALS			DEPARTURES			TOTALS		
	No. Days	Ave. DWELLS	Trip Rate	No. Days	Ave. DWELLS	Trip Rate	No. Days	Ave. DWELLS	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	15	50	0.089	15	50	0.295	15	50	0.384
08:00 - 09:00	15	50	0.122	15	50	0.307	15	50	0.429
09:00 - 10:00	15	50	0.143	15	50	0.158	15	50	0.301
10:00 - 11:00	15	50	0.126	15	50	0.152	15	50	0.278
11:00 - 12:00	15	50	0.146	15	50	0.167	15	50	0.313
12:00 - 13:00	15	50	0.142	15	50	0.128	15	50	0.270
13:00 - 14:00	15	50	0.167	15	50	0.156	15	50	0.323
14:00 - 15:00	15	50	0.140	15	50	0.164	15	50	0.304
15:00 - 16:00	15	50	0.229	15	50	0.158	15	50	0.387
16:00 - 17:00	15	50	0.256	15	50	0.130	15	50	0.386
17:00 - 18:00	15	50	0.265	15	50	0.123	15	50	0.388
18:00 - 19:00	15	50	0.225	15	50	0.111	15	50	0.336
19:00 - 20:00	1	97	0.062	1	97	0.052	1	97	0.114
20:00 - 21:00	1	97	0.031	1	97	0.021	1	97	0.052
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:		2.143			2.122			4.265	

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.

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Parameter summary

Trip rate parameter range selected: 16 - 99 (units:)
 Survey date range: 01/01/11 - 25/09/19
 Number of weekdays (Monday-Friday): 15
 Number of Saturdays: 0
 Number of Sundays: 0
 Surveys automatically removed from selection: 0
 Surveys manually removed from selection: 0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are shown. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.