Walsall Council

Former Allens Centre, Willenhall

Transport Statement

111256

JANUARY 2023

RSK GENERAL NOTES

Project No.: 111256-TS (01)

Title: Former Allens Centre, Willenhall, Transport Statement

Client: Walsall Council

Date: 30 January 2023

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Status: Final (Revision 01)

Author	M Mackay/J Hassel	**Reviewer**	Ian Wickett
Date:	30.01.23	Date:	30.01.23

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1 INTRODUCTION

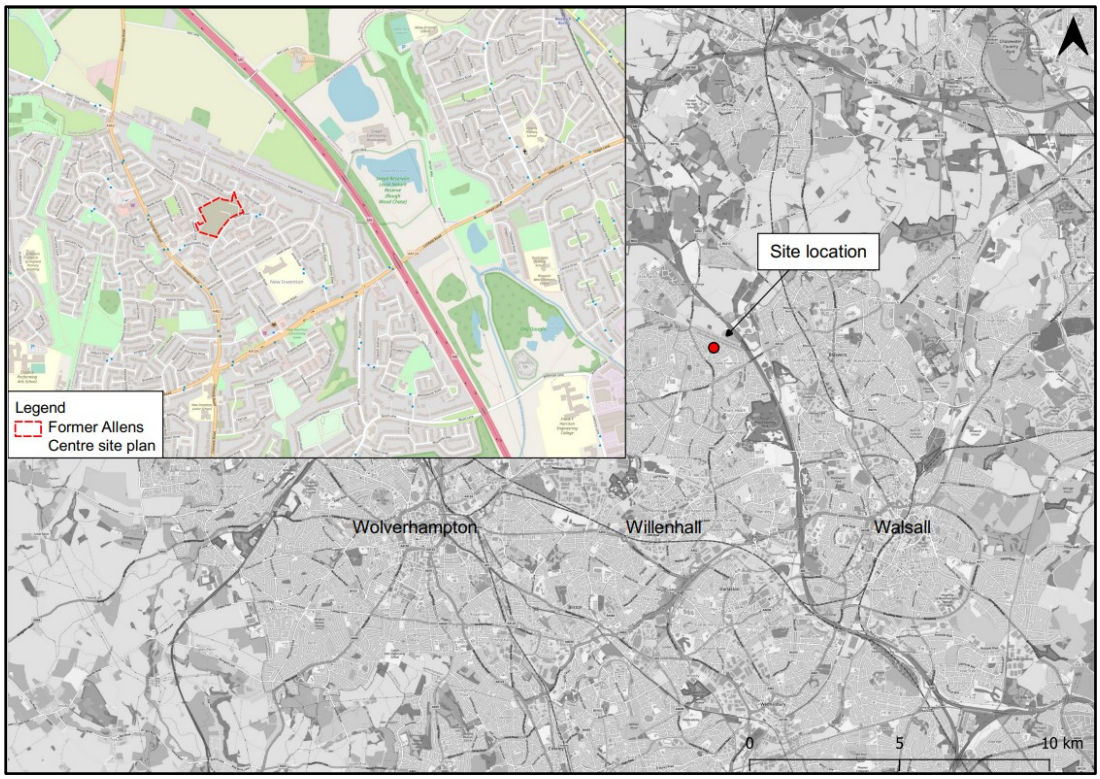
RSK has been instructed to prepare a Transport Statement (TS) on behalf of Walsall Council to support the proposals of up to 59 residential units at the site of the former Allens Centre off Hilton Road, Willenhall.

1.1 Site location

The site is located near the Short Heath residential area, northeast of Willenhall town centre. Just over 500 metres west of the M6, the site occupies 1.2 hectares of land and has the development potential to accommodate up to 59 dwellings. The development is bound by Hilton Road, Dorchester Road, and Moxhull Close, whilst being situated in an extensive developed residential neighbourhood.

The site's location is illustrated below in Figure 1.1.

Figure 1.1: Site location plan



1.2 Structure of report

This report appraises the transport-related aspects of the proposed development to ensure it meets the requirements of the local highway authority, Walsall Council. The remainder of the report will be structured as follows:

- Chapter 2 will highlight national, regional, and local policy relevant to the development;

- Chapter 3 will describe the baseline context of the site;
- Chapter 4 will assess the local accessibility;
- Chapter 5 will discuss the development proposals;
- Chapter 6 will assess the anticipated trip generation of the site; and
- Chapter 7 provides our summary and conclusions.

2 POLICY

It is necessary to understand the national, regional, and local planning policies which relate to the development. Therefore, the following chapter sets them out and demonstrates how the development of the site would be able to meet these key policies.

2.1 National policy

2.1.1 National Planning Policy Framework, 2021

The revised National Planning Policy Framework (NPPF) sets out the current national planning policy and outlines the important role in what transport policies play in facilitating and enhancing sustainable development.

Paragraph 110 of this NPPF states that *"in assessing sites that may be allocated for development in plans, or specific applications for development it 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;*
- *the design of streets, parking areas, other transport elements and the content of associated standards reflects current national guidance, including the National Design Guide and the National Model Design Code; 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 managed to an acceptable degree."*

This TS has been designed to promote sustainable transport among residents and reduce any potential impacts of the development of the local transport network.

2.2 Regional policy

2.2.1 Transport for West Midlands Transport Strategy, 2041

The Transport for West Midlands (TfWM) Transport Strategy *'Movement of Growth'* sets out West Midlands long term goals for transport for up to 2041. Through supporting the West Midlands Combined Authority (WMCA), the updated Local Transport Plan (LTP) sets out policies to *'promote safe, integrated, efficient and economic transport'.* Sustainable travel is being maximised via plans to *'improve accessibility, reduce traffic, and electrify transport'*

To achieve this, it is important that new developments are located in areas where there is good access to public transport so as to reduce car travel. Additionally, new developments must also be fully integrated into walking and cycling networks, with walking and cycling being encouraged as a primary mode of transport. The strategy proposes the idea of *'15 minute neighbourhoods'*, in which essential amenities can be accessed within 15 minutes via walking or cycling. A 45 minute region is also discussed, in which secondary services can be accessed within 45 minutes using various modes of public transport.

The development proposals are in line with the strategy, given that the site is located in a residential area with accessible services within close proximity. There is access to a range of public transport links alongside safe walking and cycling networks and, via these routes, further opportunities and services are available.

2.2.2 Black Country ULEV Transport Strategy, 2030

The Black Country Ultra-Low Emission Vehicle (ULEV) strategy recommends the infrastructure and policies required across the Black Country to accelerate the uptake of ULEVs, in anticipation of a nationwide 2035 ban on the sale of petrol and diesel vehicles. The objective for the Black Country region, which includes Willenhall, Walsall, Sandwell and Dudley, is to *'lead the West Midlands on the road to net-zero by accelerating and amplifying the EV transition'* ready for the national ban in 2035.

To achieve this, the strategy sets out the following timeline of change for the area:

- *In 2022, install the first rapid & ultra-rapid charging hubs, all new council cars/vans will be EVs, and publish the Public Transport Decarbonisation Plan*
- *By 2023, refresh planning policy and all new taxi/PHV licenses will be EV*
- *By 2024, council sites will be equipped with chargepoints*
- *By 2025, >90% of Black Country land area will be under a 5 minute drive from a rapid chargepoint. Also, there will have been 380 standard and 110 fast chargepoints installed, and the ULEV vision and strategy will be refreshed*
- *By 2028, the Wolverhampton Council Net-Zero Target will have been reached*
- *By 2030, there will be ~1500 standard and ~300 fast chargepoints installed. £20M to £50M total annual savings will be made from the emissions reduction and the Walsall Council Net-Zero Target will have been reached*

2.2.3 WMCA's WM2041 carbon budget and pathway

In order to achieve the TfWM Transport Strategy, the local delivery of WMCA's WM2041 carbon budget and pathway has been set out using the 2030 travel demand and fleet composition predictions. As part of this plan, several proposals relevant to Willenhall include:

- *One in five commuting, shopping, and personal business trips replaced by internet*
- *Half of all trips shortened by 50%, doubling of public transport journeys, eight-fold increase in wheeling*
- *75% of drivers apply eco-driving principles, accelerate electric vehicle uptake by 5 years*

These can collectively lead to a *'35% reduction in distance travelled by car and CO2 per vehicle mile, reducing carbon emissions by ~70% by 2030'*. The above interventions will support residents in making sustainable travel choices which align with the ambition of the overall transport strategy.

2.3 Local policy

2.3.1 Walsall Council Unitary Development Plan

Walsall Council's Unitary Development Plan (UDP) was set to only cover until 2011. However, many of the policies have been saved and still currently stand. The Council has ensured that the UDP has been prepared in coordination with the UDPs, Structure and Local Plans of relevant authorities, including Willenhall. Chapter 7 of the UDP covers transport in which the Council *'will seek to ensure that Walsall's transport system serves the wider aims of … sustainable development'.* The following strategies have been set out which aim to achieve transport sustainability:

- Improve facilities for bus services, such as bus stations and stops, whilst encouraging park and ride schemes;
- Actively promote new and improved passenger rail (Metro) and freight services in the Borough. Existing and potential rail corridors will be safeguarded for rail and/or Metro use;
- Seek to ensure that there is a variety of facilities within easy walking distance of people's homes, to encourage walking as a sustainable and healthy form of transport. Measures to help pedestrians will be promoted in the design of new developments, with safety and security considerations in mind;
- Promote cycling in the Borough as an important and beneficial mode of travel. In particular, it will seek to integrate cycling facilities with other transport modes, and with other environmental impacts.

The development proposals aim to support the strategies listed above, as well as the ones located within regional policies. The development is situated in an accessible location, encouraging the uptake of active travel and public transport. The site is also in close proximity to a range of local amenities, thus reducing the need to travel by car.

3 BASELINE CONTEXT

3.1 Local highway network

3.1.1 Hilton Road

Hilton Road is a two-way single carriageway that runs in a crescent shape and bounds the site to the south. The road leads to a T junction to the southeast of the site, connecting to Davis Road, which is intersected by Heath Road and Stretton Road further north. Other roads that intersect Hilton Road include Dorchester Road, Beacon Road and Sandland Road. The eastern end of Hilton Road continues southwards as Jones Road. Although not directly adjoining the site, Moxhull Close is to the southwest, Radstock Road to the northwest and Sherringham Drive to the north.

Hilton Road is fully tarmacked, has regular speed bumps and several “SLOW” signs. All previously stated roads along with Hilton Road, are subject to 20mph speed limits and benefit from footways on both sides, as well as street-lighting. Around the various junctions, there are double-yellow line parking restrictions, however there are several unrestricted parking laybys, further north on Hilton Road. Figure 3.1 below shows one of the speed bumps on Hilton Road, and an unrestricted parking layby with the site on the left-hand side.

Figure 3.1 Hilton Road with the site on the left

Contains Google Maps data © 2022

Hilton Road along with Dorchester Road offers two bus stops within 100m from the site. Both ‘Bloomfield Drive’ and the ‘Milestone’ bus stops offer information regarding several bus services, which provide access to Walsall.

3.1.2 A462

Essington Road (A462) is located 300m west of the proposed site and can be accessed via Hilton Road and Dorchester Road. 600m south of the site, there is a roundabout which connects Essington Road and Lichfield Road, both of which give access to Willenhall town centre to the south.

Essington Road is subject to a 30mph speed limit and has several bus stops located throughout, all giving information regarding services to Walsall and Wolverhampton. The Dorchester Road 'Flag and Pole' bus stop can be seen in Figure 3.2 below.

Figure 3.2 A462 with Dorchester Road on the right

Contains Google Maps data © 2022

3.1.3 M6

The M6 is located around 600m east of the proposed development and gives access to the north of England and across the West Midlands. The nearest motorway junction to the site, as shown in Figure 3.3, is junction 10 which is around a 10-minute drive from the site.

Figure 3.3 Exit 10 on the M6

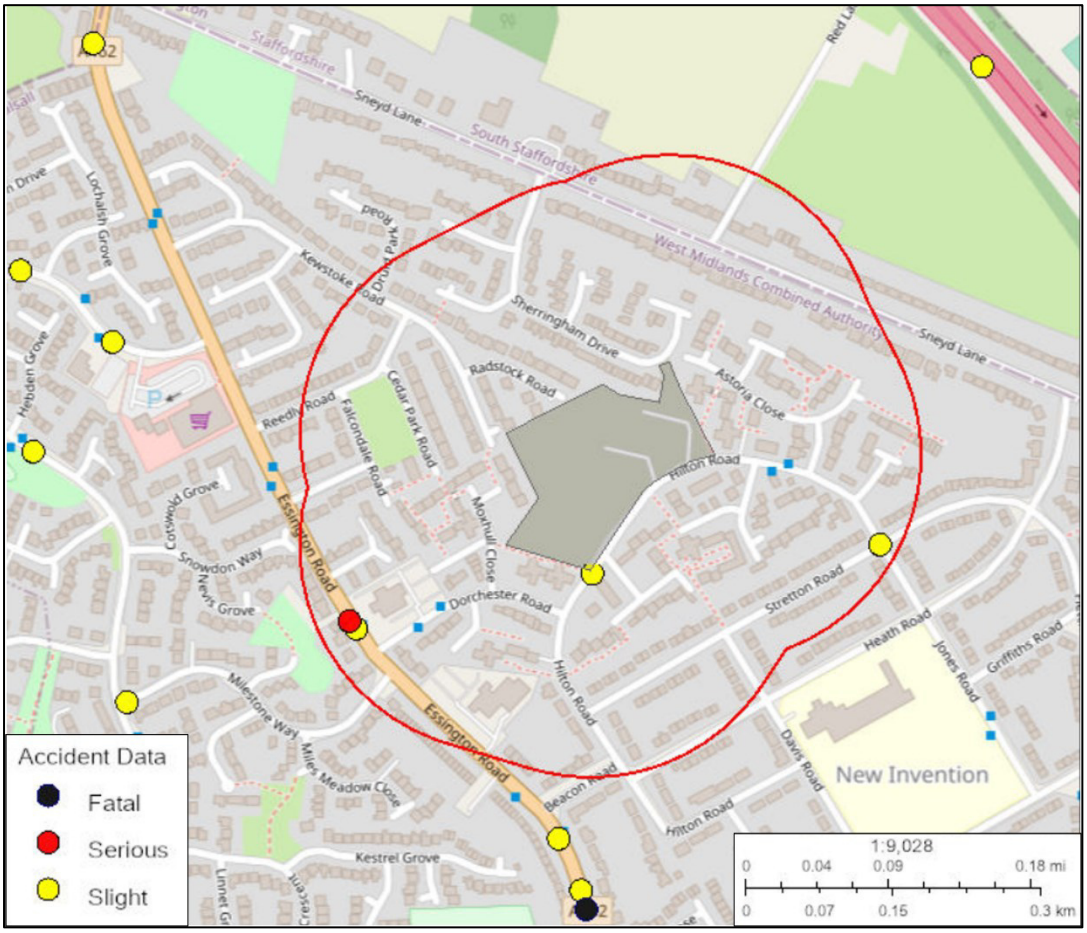
Contains Google Maps data © 2022

3.2 Accident analysis

A review of accident data covering the most recent five-year period has been undertaken using data available from the Department for Transport's (DfT) STATS 19 database. This covers the five-year period between 2017-2021 and provides the user with map-based data including the date of the accident recorded, the number of vehicles and casualties involved, and the details of the severity of any injuries resulting from the accident.

The study area encompasses a 200m radius from the proposed site and can be seen below in Figure 3.4.

Figure 3.4 Accident study area



OpenStreetMap

Within the study area, a total of four accidents occurred, with one categorised as 'serious', and the remaining three categorised as 'slight' in severity. There were no fatalities within 200m of the site, although it is noted that there was one located on the A462 around 350m south of the site.

The 'serious' incident occurred on the A462, on a Saturday evening in 2018 when it was raining. It involved three cars including a young driver and resulted in four casualties. The 'slight' incident at the same junction involved two vehicles and a cyclist and was also on a Saturday evening in 2018. The incident directly south of the site on Hilton Road involved two cars and the remaining incident within 200m of the site, involved a heavy goods vehicle.

Overall, the data shows that there were no existing highway safety issues that would impact the development. A full report of the accident data can be found in Appendix 4.

4 ACCESSIBILITY

4.1 Walking

The roads within the site's vicinity offer 2m wide footways on either side, street lighting and operate at a 20mph speed limit. Along with multiple speed bumps on surrounding roads, this provides a safe network for pedestrian accessibility within the vicinity of the site.

Away from the road network there are several footway connections to surrounding roads, often offering shorter traffic-free routes to reach local facilities. As shown in Figure 4.1, there is a pedestrian footway which bounds the southwest of the site and connects Hilton Road and Moxhull Close. The 85m long footway benefits from streetlighting and is wide enough for wheelchair access.

Figure 4.1 Footpath, view from Hilton Road

Contains Google Map data © 2022

There is also a footpath located south of the site that connects Hilton Road to Davis Road giving access to Brookhill Close and Fairlawn Close. It is 170m long and has bollards at the access point, prompting cyclists to dismount. Figure 4.2 shows the southern end of the footpath access point, on Davis Road, where Beacon Primary School is located nearby. Therefore, the footpath reduces the walking distance from the proposed site to the school from 5 minutes to 2 minutes. With the bollards and reduced journey time, the footpath provides a convenient pedestrian route reducing road use, promoting safety and accessibility.

Figure 4.2 Footpath, from Davis Road

Contains Google Map Data © 2022

Another footpath is located to the northeast of the site and connects Hilton Road to Sherringham Drive. At around 100m long, the footpath improves pedestrian accessibility between neighbouring streets, avoiding trafficked roads and therefore improving pedestrian safety.

4.1.1 Coppice Farm Park and Field

Coppice Farm Park and Field can be accessed via a 10-minute walk from the proposed site and provides opportunities for recreation and further access to Saint Alban's Primary School and Coppice Performing Arts School. The footway through the park benefits from metal bollards restricting motorised vehicle access and streetlighting; both of which increase pedestrian safety and accessibility. This can be seen in Figure 4.3 below.

Figure 4.3 Footway entering Coppice Farm Park and Field

Contains Google Map data © 2022

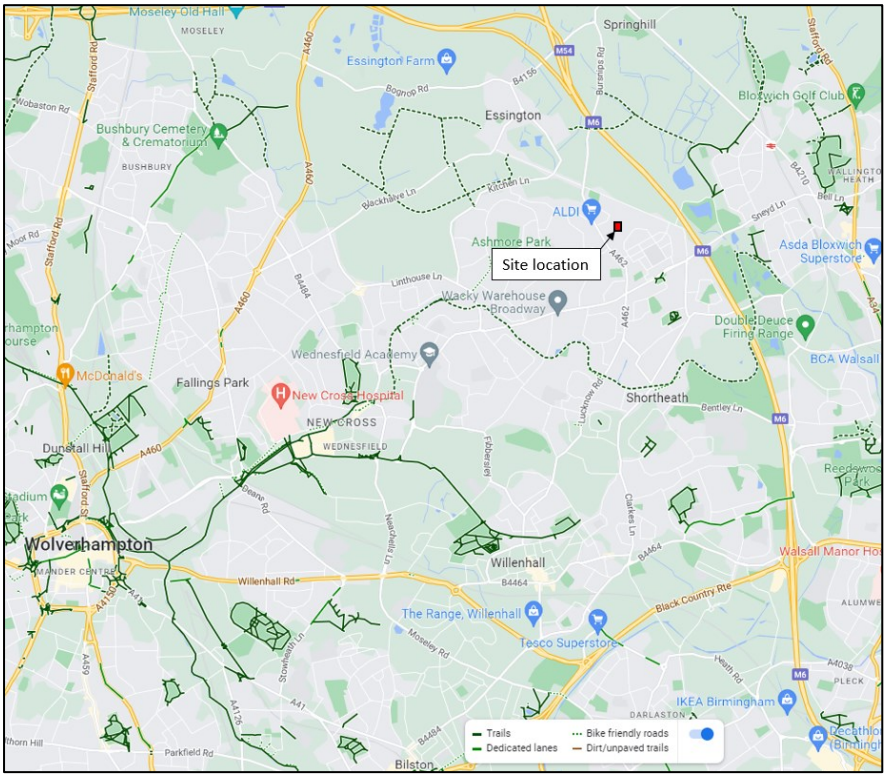
4.2 Cycling

There are several suitable cycling routes within a 5km vicinity of the proposed site location. Figure 4.4 and Figure 4.5 show the bike friendly route along the Wyrley and Essington Canal which runs 2km south of the site. The towpath is suitable for cycling and walking allowing access to Wolverhampton within 30-minutes cycling distance.

To the north of the site lies another bike friendly route which begins in Essington and connects to the Cannock Chase Nature Reserve to the northeast. Chasewater can also be reached via these bike friendly routes and has a shared cycle and pedestrian footway which surrounds the reservoir.

Overall, these cycle routes along with the 20mph roads surrounding the site, provide a good network of cycle infrastructure and connect to a range of facilities in Wolverhampton, and surrounding suburbs.

Figure 4.4 Local cycle routes



Contains Google Maps data © 2022

Figure 4.5 Towpath along the Wyrley and Essington Canal

Contains Google Map data © 2022

4.3 Public transport

4.3.1 Bus

The closest set of bus stops are all located within 300m of the proposed development on Essington Road, Dorchester Road, and Hilton Road. These 'Flag and Pole' bus stops provide information regarding several bus services to Walsall, Wolverhampton, and the surrounding areas. The local routes and operating times can be seen in Table 4.1 below.

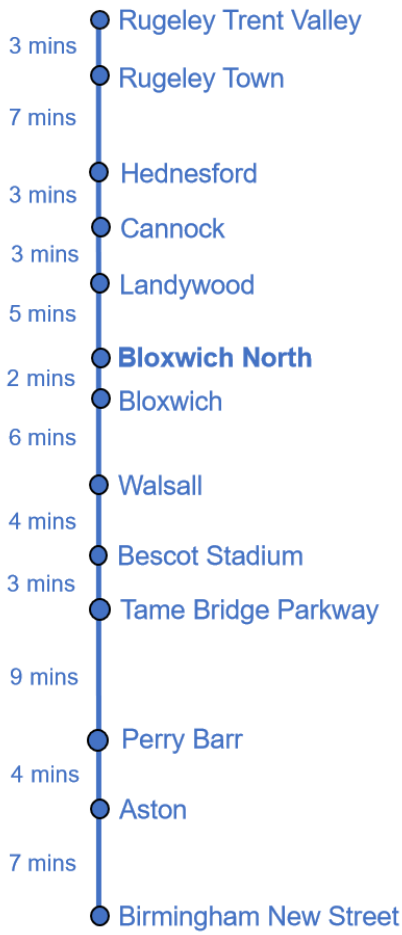
Table 4.1 Local bus services

Service	Route	First bus from site	Last bus from site	Mon-Sat	Sun
41	Willenhall – New Invention – Keats Road – Granbourne Road – Reedswood - Walsall	06:08	22:57	Every 30 minutes	Every hour
59	Wolverhampton – Rookery Street – Lewis Grove – Ashmore Park – Griffiths Dr / Higgs Rd – Colman Avenue – New Cross Hospital – Wolverhampton	05:54	23:28	Every 10 minutes	Every 20 minutes
69	Wolverhampton – New Cross Hospital – Wood End – Griffiths Drive – New Invention – Darwin Road - Walsall	09:13	18:58	Every 30 minutes	Every hour

4.3.2 Rail

The most accessible railway station to the site is Bloxwich North, located approximately 2.4km northeast of the proposed development. This station is operated by West Midlands Railway, and can be accessed via a 6-minute drive, or a 9 minute cycle. There is a free car park at the station holding up to 26 cars, and is open 24 hours, 7 days a week. Alternatively, it takes 23 minutes to travel by bus, or 30 minutes to reach the station via walking. Bloxwich North offers regular services to several destinations including Rugeley Trent Valley, Walsall, and Birmingham New Street. Figure 4.6 provides an overview of the local destinations accessible directly from Bloxwich North station.

Figure 4.6 Local rail destinations



4.4 Access to services

The majority of services accessible from the site are located in Willenhall town centre, which can be reached via a 15-minute cycle/bus journey. For example, there are several drink and food outlets, including takeaways, supermarkets, and industrial estates. An Aldi supermarket is less than a 10 minutes' walk from the site, as well as Essingtons Neighbourhood convenience store lying within 3 minutes walking distance.

In terms of medical facilities, a pharmacy, dental practice and a local GP are all located within 600m of the site. The nearest hospital is located 2.4km east in Bloxwich and can be accessed via a 24-minute direct bus journey. Other essential services such as post offices and an ATM are within 500m, with the nearest banks being in Bloxwich and Willenhall town centre.

Several schools are also situated nearby, including Beacon Primary School, 300m south of the site, Bloxwich Academy, 1.75km to the southeast and Coppice Performing Arts School located 1km southwest of the site.

There are numerous religious facilities in the area, including three churches less than 1.7km from the site location. The Corpus Christian Roman Catholic Church can be access via a 21-minute walk or a 6 minute cycle.

Finally, there are a number of recreational services accessible from the proposed site. This includes the New Invention Community Green, Short Heath Park, and as previously mentioned, Coppice Farm Park and Field, all of which are accessible in less than 20 minutes walking distance. Three golf clubs are all within the local vicinity of the site, as well as numerous football and rugby clubs.

4.5 Overall accessibility

Overall, the site caters reasonably well for pedestrians/cyclists, with good access to public transport and other general amenities. There are good and realistic pedestrian links, with a good cycling network leading down to Walsall and Wolverhampton, along with frequent bus services. In addition to these modes, Bloxwich North railway station enhances accessibility to Birmingham where connecting trains can reach more widespread destinations. Finally, the range of local amenities, which will likely cater for the majority of residents' needs, are mostly accessible within a 30-minute walk.

5 DEVELOPMENT PROPOSALS

5.1 Land use

The illustrative masterplan proposals comprise the construction of up to 59 residential units on the derelict land and is formed of 35 houses (mixed 2 and 3 bedrooms) and 24 apartments (mixed 1 and 2 bedrooms). It is anticipated that a mix of affordable housing will be provided. The internal layout will be designed to current standards, ensuring access is available for all anticipated vehicle types, including waste collection and household deliveries. The illustrative masterplan site layout is provided at Appendix 1.

5.2 Parking

Local Parking standards have been set out within Walsall Council's Unitary Development Plan (UDP), 2005. The maximum car parking standards for residential use can be seen below in Table 5.1.

Table 5.1 Local parking standards

Type	Maximum car parking
1, 2 and 3 bedroom houses	2 spaces per unit
4+ bedroom houses	3 spaces per unit

There are no cycle parking standards set out in the UDP, although there are minimum disabled parking standards: '*10% of all parking spaces should be reserved for disabled parking, with a minimum of 1 reserved space… As specified in PPG13, parking for disabled people will be additional to the general level of parking permitted under the maximum parking standards'*.

The parking spaces provided for the proposed development comply with these maximum standards.

5.3 Site access

Vehicular and pedestrian site access will be located south of the site, on Hilton Road. The access road will provide a carriageway of 5.5m in width, with footways of 2m width either side. Use will be made of the internal road geometry along with vertical and other horizontal features, where appropriate, to achieve a maximum vehicle speed of 20mph within the development.

The drawing enclosed at Appendix 2 (Ref 111256-10-SK03) illustrates the proposed main access junction which relocates the existing Allens Centre junction several metres west pulling it away from the adjacent council property. This enables a 2m wide footway to be provided on both sides of the junction into the site. The junction orientation also offers an improvement to the existing access with the access road now perpendicular to Hilton Road.

The proposed site access will comfortably achieve visibility splays of 2.4 x 43m in both directions, appropriate for a 30mph speed limit on Hilton Road. Notably, Hilton Road benefits from traffic calming that reduces the risk of higher speeds.

Drawing 111256-10-SK02 also enclosed at Appendix 3 illustrates vehicle tracking demonstrating that the development road layout is accessible by a Council Waste Services 10.7m long refuse collection vehicle.

5.4 Pedestrian and cycle connectivity

As noted earlier, the surrounding residential area benefits from several traffic-free pedestrian routes, often also available to cyclists. The proposals will ensure that such routes are maintained and improved, where possible. This will include the retention and improvement of the route between Hilton Road and Sherringham Drive that passes through the site.

6 TRIP GENERATION

In order to assess the potential impacts of the development, the number of trips by all modes generated by residential use has been estimated using an industry standard database. This is based on the proposal for 59 units.

6.1 Trip rates

The TRICS database (version 7.8.2) has been utilised to derive the likely numbers of trips expected for the site for residential development.

Selection criteria for the comparator sites is as follows:

- Land use, 'Residential', sub-category, 'affordable/local authorities houses';
- Mainland UK excluding Ireland;
- Up to 280 units;
- Weekday surveys; and
- 'Suburban Area' and 'Edge of Town' location types.

A summary of the trip rates is shown below in Table 6.1 with the full TRICS output provided in Appendix 3.

Table 6.1 Residential trip rates: all modes, per unit

	Vehicles		Cycling		Walking		Public Transport		People	
	Arr	Dep	Arr	Dep	Arr	Dep	Arr	Dep	Arr	Dep
AM Peak 08:00-09:00	0.141	0.276	0.006	0.032	0.077	0.032	0	0.128	0.263	0.897
PM Peak 17:00-18:00	0.237	0.147	0.026	0.013	0.026	0.013	0.071	0.013	0.635	0.359

Contains TRICS 7.8.2 Data

6.2 Trip generation

Application of these trip rates to the proposed development of 59 residential units will generate trips as summarised in Table 6.2.

Table 6.2 Trip generation: all modes

	Vehicles		Cycling		Walking		Public Transport		People	
	Arr	Dep	Arr	Dep	Arr	Dep	Arr	Dep	Arr	Dep
AM Peak 08:00-09:00	8	16	0	2	5	2	0	6	16	53
PM Peak 17:00-18:00	14	9	2	1	2	1	4	1	37	21

Based on the above trip generation, the proposed development would be likely to generate an additional 8 vehicular arrivals and 16 departures in the AM peak period. In the PM peak period, it is estimated that the proposed dwellings will generate an additional 14 vehicular arrivals and 9 departures. The additional vehicle movements during peak periods, dispersed across multiple routes from the site, are likely to have little impact on capacity or safety of the local highway network, and as a result, no junction capacity assessments have been carried out.

7 SUMMARY AND CONCLUSIONS

This TS has been undertaken on behalf of Walsall Council to support the proposals of up to 59 residential units on the former Allens Centre, on Hilton Road, Willenhall.

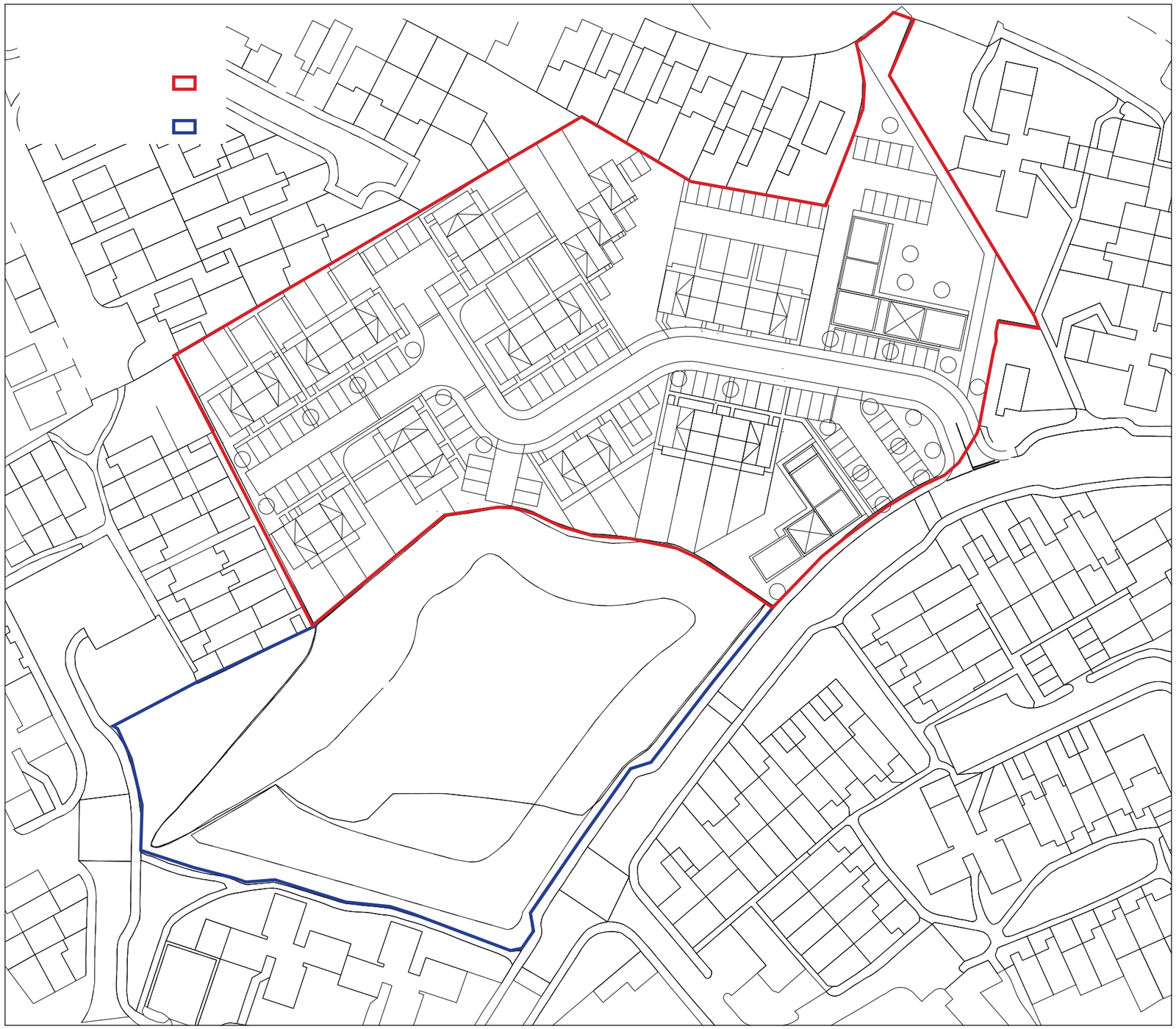
A review of the accident data shows no significant issues with the local highway safety provision that is likely to affect or be affected by the proposed development. Moreover, the site caters well for pedestrians/cyclists, with good access to public transport and everyday general amenities.

The development proposals will provide adequate access arrangements for vehicles, pedestrians and cyclists, with an internal layout designed to current standards. Car parking will be provided to meet local authority standards.

Finally, the trip generation of the site during the peak period is likely to have little impact on capacity or safety of the local highway network. And as a result, no junction capacity assessments have been carried out.

On the above basis, it is considered that the proposed development is acceptable from a transport perspective.

APPENDIX 1
ILLUSTRATIVE MASTERPLAN LAYOUT



Numbers and mix

59 dwellings in total

17x 2 bed houses
18x 3 bed houses

15x 1 bed apartments
9x 2 bed apartments

Total:

15x 1 bed (22%)
30x 2 bed (47%)
18x 3 bed (31%)

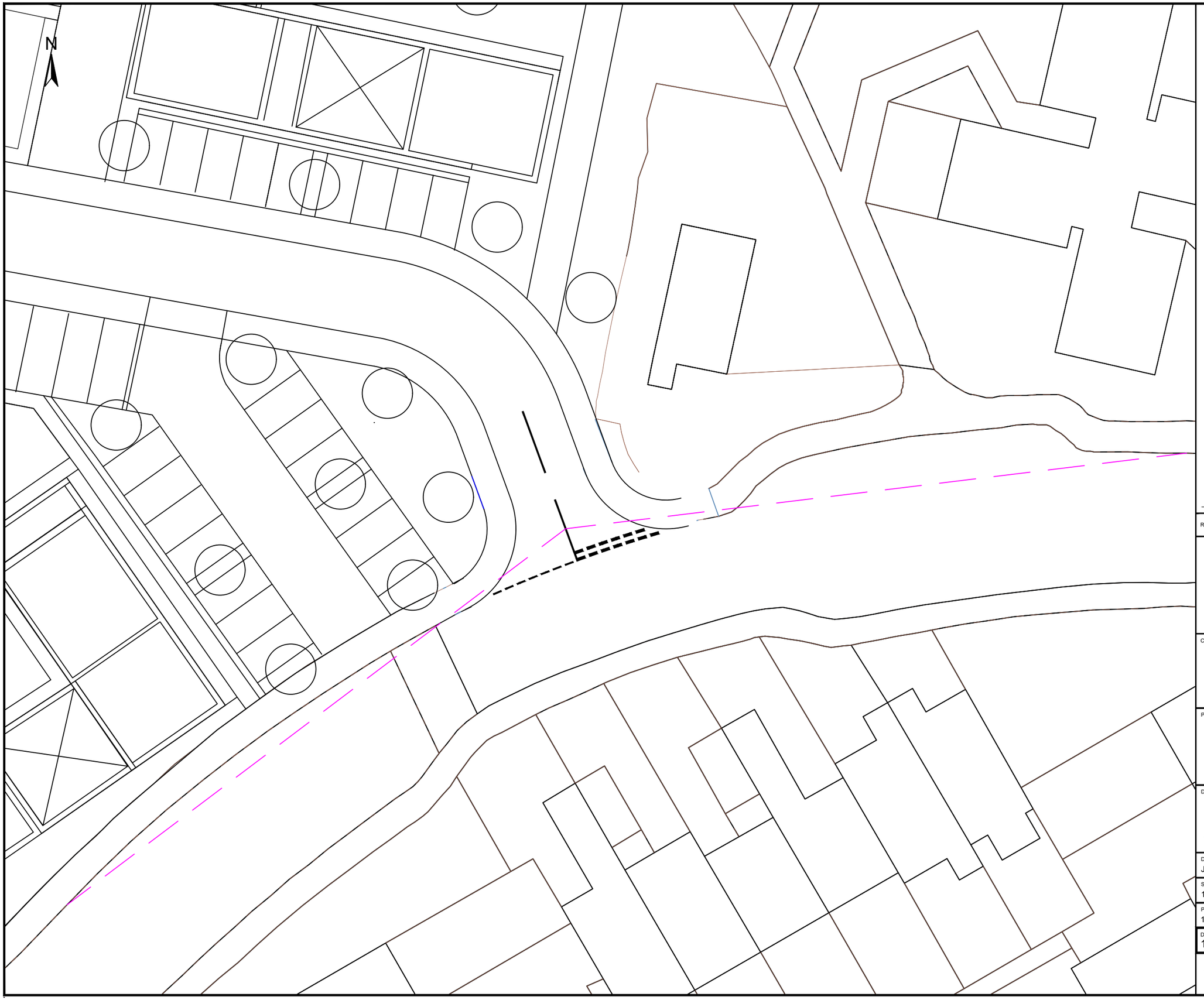
Parking

1x space per 1 bed
2x space per 2+ bed
7 visitor spaces

113 parking spaces in total

Lambert Smith Hampton

APPENDIX 2
ILLUSTRATIVE SITE ACCESS JUNCTION



Rev.	Date	Amendment	Drawn	Chkd.	Appd.
—	—	—	—	—	—

RSK

Fourways House
57 Hilton Street
Manchester
M1 2EJ

Tel: +44 (0) 161 236 2757

Email: communications@rsk.co.uk
Web: www.rsk.co.uk

Client

Project Title

Former Allens Centre

Hilton Road, Willenhall

Drawing Title

Site Access
Illustrative Layout
(2.4m x 43m visibility splay shown)

Drawn	Date	Checked	Date	Approved	Date
JH	JAN23	IW	JAN23	JH	JAN23

Scale	Orig Size	Dimensions
1:250	A3	METRES

Project No.	Drawing File
111256	

Drawing No.	Rev.
111256-10-SK03	—

Scale

0 2.5 5 10 15

APPENDIX 3
RCV TRACKING DRAWING

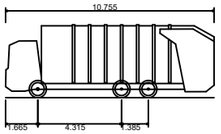
N

N

Legend

Body Oversail

Wheel Track



Phoenix 2 Duo Recycler (P2-12W with Elite 6x2 MS chassis)

Overall Length	10.755m
Overall Width	2.530m
Overall Body Height	3.756m
Min Body Ground Clearance	0.309m
Track Width	2.530m
Lock to lock time	4.00s
Kerb to Kerb Turning Radius	11.450m

Rev.	Date	Amendment	Drawn	Chkd.	Appd.
—	—	—	—	—	—

RSK

Fourways House
57 Hilton Street
Manchester
M1 2EJ

Tel: +44 (0) 161 236 2757

Email: communications@rsk.co.uk
Web: www.rsk.co.uk

Client

Walsall Council

Project Title

Former Allens Centre

Hilton Road, Willenhall

Drawing Title

Proposed Site Access
Swept Path Analysis
Refuse Vehicle 10.7m

Drawn	Date	Checked	Date	Approved	Date
JW	20/01/23	JH	20/01/23	JH	20/01/23

Scale	Orig Size	Dimensions
1:500_XREF	A3	METRES

Project No.	Drawing File
111256	

Drawing No.	Rev.
111256-10-SK02	—

Scale

0 5 10 20 30

APPENDIX 4
TRICS OUTPUTS

Calculation Reference: AUDIT-453201-220819-0855

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use : 03 - RESIDENTIAL
Category : B - AFFORDABLE/LOCAL AUTHORITY HOUSES

MULTI-MODAL TOTAL VEHICLES

Selected regions and areas:

01	**GREATER LONDON**		
	BN	BARNET	1 days
05	**EAST MIDLANDS**		
	LE	LEICESTERSHIRE	1 days
07	**YORKSHIRE & NORTH LINCOLNSHIRE**		
	WY	WEST YORKSHIRE	2 days
08	**NORTH WEST**		
	MS	MERSEYSIDE	1 days

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

Primary 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: No of Dwellings
Actual Range: 16 to 54 (units:)
Range Selected by User: 14 to 280 (units:)

Parking Spaces Range: All Surveys Included

Parking Spaces per Dwelling 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: 01/01/10 to 04/11/21

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:

Tuesday	2 days
Thursday	2 days
Friday	1 days

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

Selected survey types:

Manual count	5 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:

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

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	4
Built-Up Zone	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:

C3	5 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 500m Range:
All Surveys Included

Population within 1 mile:

1,001 to 5,000	1 days
10,001 to 15,000	1 days
25,001 to 50,000	2 days
50,001 to 100,000	1 days

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

Population within 5 miles:

5,001 to 25,000	1 days
75,001 to 100,000	2 days
250,001 to 500,000	1 days
500,001 or More	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	4 days
1.1 to 1.5	1 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	5 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	4 days
0 None	1 days

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

LIST OF SITES relevant to selection parameters

1 **BN-03-B-01** **SEMI-DETACHED & TERRACED** **BARNET**
LUTHER CLOSE
EDGWARE

Edge of Town
Residential Zone
Total No of Dwellings: 19
Survey date: THURSDAY *04/11/21* *Survey Type: MANUAL*

2 **LE-03-B-01** **SEMI-DETACHED & TERRACED** **LEICESTERSHIRE**
COLEMAN ROAD
LEICESTER

Suburban Area (PPS6 Out of Centre)
Residential Zone
Total No of Dwellings: 38
Survey date: FRIDAY *22/10/21* *Survey Type: MANUAL*

3 **MS-03-B-01** **TERRACED** **MERSEYSIDE**
TARBOCK ROAD
LIVERPOOL
SPEKE
Edge of Town
Residential Zone
Total No of Dwellings: 16
Survey date: TUESDAY *18/06/13* *Survey Type: MANUAL*

4 **WY-03-B-02** **MIXED HOUSES** **WEST YORKSHIRE**
WHITEACRE STREET
HUDDERSFIELD
DEIGHTON
Edge of Town
Residential Zone
Total No of Dwellings: 54
Survey date: TUESDAY *17/09/13* *Survey Type: MANUAL*

5 **WY-03-B-03** **TERRACED HOUSES** **WEST YORKSHIRE**
LINCOLN GREEN ROAD
LEEDS

Suburban Area (PPS6 Out of Centre)
Built-Up Zone
Total No of Dwellings: 29
Survey date: THURSDAY *19/09/13* *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/B - AFFORDABLE/LOCAL AUTHORITY HOUSES

MULTI-MODAL TOTAL VEHICLES

Calculation factor: 1 DWELLS

BOLD print indicates peak (busiest) period

Total People to Total Vehicles ratio (all time periods and directions): 2.58

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	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	5	31	0.051	5	31	0.115	5	31	0.166
08:00 - 09:00	5	31	0.141	**5**	**31**	**0.276**	5	31	0.417
09:00 - 10:00	5	31	0.199	5	31	0.231	5	31	0.430
10:00 - 11:00	5	31	0.167	5	31	0.192	5	31	0.359
11:00 - 12:00	5	31	0.115	5	31	0.096	5	31	0.211
12:00 - 13:00	5	31	0.122	5	31	0.109	5	31	0.231
13:00 - 14:00	5	31	0.103	5	31	0.128	5	31	0.231
14:00 - 15:00	5	31	0.167	5	31	0.135	5	31	0.302
15:00 - 16:00	5	31	0.167	5	31	0.160	5	31	0.327
16:00 - 17:00	5	31	0.128	5	31	0.147	5	31	0.275
17:00 - 18:00	5	31	0.237	5	31	0.147	5	31	0.384
18:00 - 19:00	5	31	0.173	5	31	0.090	5	31	0.263
19:00 - 20:00	**1**	**19**	**0.316**	1	19	0.158	**1**	**19**	**0.474**
20:00 - 21:00	1	19	0.158	1	19	0.105	1	19	0.263
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			2.244			2.089			4.333

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.*

Parameter summary

Trip rate parameter range selected:	16 - 54 (units:)
Survey date date range:	01/01/10 - 04/11/21
Number of weekdays (Monday-Friday):	5
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 show. 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 03 - RESIDENTIAL/B - AFFORDABLE/LOCAL AUTHORITY HOUSES

MULTI-MODAL CYCLISTS

Calculation factor: 1 DWELLS

BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	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	5	31	0.000	5	31	0.006	5	31	0.006
08:00 - 09:00	5	31	0.006	**5**	**31**	**0.032**	5	31	0.038
09:00 - 10:00	5	31	0.006	5	31	0.019	5	31	0.025
10:00 - 11:00	5	31	0.006	5	31	0.000	5	31	0.006
11:00 - 12:00	5	31	0.006	5	31	0.013	5	31	0.019
12:00 - 13:00	5	31	0.013	5	31	0.006	5	31	0.019
13:00 - 14:00	5	31	0.000	5	31	0.000	5	31	0.000
14:00 - 15:00	5	31	0.013	5	31	0.006	5	31	0.019
15:00 - 16:00	**5**	**31**	**0.026**	5	31	0.006	5	31	0.032
16:00 - 17:00	5	31	0.013	5	31	0.006	5	31	0.019
17:00 - 18:00	5	31	0.026	5	31	0.013	**5**	**31**	**0.039**
18:00 - 19:00	5	31	0.000	5	31	0.000	5	31	0.000
19:00 - 20:00	1	19	0.000	1	19	0.000	1	19	0.000
20:00 - 21:00	1	19	0.000	1	19	0.000	1	19	0.000
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			0.115			0.107			0.222

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 03 - RESIDENTIAL/B - AFFORDABLE/LOCAL AUTHORITY HOUSES

MULTI-MODAL PEDESTRIANS

Calculation factor: 1 DWELLS

BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	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	5	31	0.032	5	31	0.115	5	31	0.147
08:00 - 09:00	5	31	0.077	**5**	**31**	**0.359**	5	31	0.436
09:00 - 10:00	5	31	0.122	5	31	0.128	5	31	0.250
10:00 - 11:00	5	31	0.128	5	31	0.147	5	31	0.275
11:00 - 12:00	5	31	0.096	5	31	0.147	5	31	0.243
12:00 - 13:00	5	31	0.167	5	31	0.096	5	31	0.263
13:00 - 14:00	5	31	0.096	5	31	0.096	5	31	0.192
14:00 - 15:00	5	31	0.192	5	31	0.160	5	31	0.352
15:00 - 16:00	**5**	**31**	**0.340**	5	31	0.167	**5**	**31**	**0.507**
16:00 - 17:00	5	31	0.122	5	31	0.115	5	31	0.237
17:00 - 18:00	5	31	0.250	5	31	0.167	5	31	0.417
18:00 - 19:00	5	31	0.147	5	31	0.141	5	31	0.288
19:00 - 20:00	1	19	0.053	1	19	0.000	1	19	0.053
20:00 - 21:00	1	19	0.053	1	19	0.000	1	19	0.053
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			1.875			1.838			3.713

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 03 - RESIDENTIAL/B - AFFORDABLE/LOCAL AUTHORITY HOUSES

MULTI-MODAL PUBLIC TRANSPORT USERS

Calculation factor: 1 DWELLS

BOLD print indicates peak (busiest) period

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	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	5	31	0.000	5	31	0.032	5	31	0.032
08:00 - 09:00	5	31	0.000	**5**	**31**	**0.128**	5	31	0.128
09:00 - 10:00	5	31	0.013	5	31	0.045	5	31	0.058
10:00 - 11:00	5	31	0.000	5	31	0.006	5	31	0.006
11:00 - 12:00	5	31	0.019	5	31	0.013	5	31	0.032
12:00 - 13:00	5	31	0.013	5	31	0.019	5	31	0.032
13:00 - 14:00	5	31	0.032	5	31	0.019	5	31	0.051
14:00 - 15:00	5	31	0.038	5	31	0.026	5	31	0.064
15:00 - 16:00	**5**	**31**	**0.115**	5	31	0.019	**5**	**31**	**0.134**
16:00 - 17:00	5	31	0.019	5	31	0.013	5	31	0.032
17:00 - 18:00	5	31	0.071	5	31	0.006	5	31	0.077
18:00 - 19:00	5	31	0.019	5	31	0.000	5	31	0.019
19:00 - 20:00	1	19	0.000	1	19	0.000	1	19	0.000
20:00 - 21:00	1	19	0.000	1	19	0.000	1	19	0.000
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			0.339			0.326			0.665

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 03 - RESIDENTIAL/B - AFFORDABLE/LOCAL AUTHORITY HOUSES

MULTI-MODAL TOTAL PEOPLE

Calculation factor: 1 DWELLS

BOLD print indicates peak (busiest) period

Total People to Total Vehicles ratio (all time periods and directions): 2.58

	ARRIVALS			DEPARTURES			TOTALS		
Time Range	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	5	31	0.083	5	31	0.301	5	31	0.384
08:00 - 09:00	5	31	0.263	**5**	**31**	**0.897**	**5**	**31**	**1.160**
09:00 - 10:00	5	31	0.397	5	31	0.532	5	31	0.929
10:00 - 11:00	5	31	0.340	5	31	0.436	5	31	0.776
11:00 - 12:00	5	31	0.263	5	31	0.295	5	31	0.558
12:00 - 13:00	5	31	0.359	5	31	0.269	5	31	0.628
13:00 - 14:00	5	31	0.244	5	31	0.276	5	31	0.520
14:00 - 15:00	5	31	0.500	5	31	0.365	5	31	0.865
15:00 - 16:00	**5**	**31**	**0.731**	5	31	0.429	5	31	1.160
16:00 - 17:00	5	31	0.340	5	31	0.372	5	31	0.712
17:00 - 18:00	5	31	0.635	5	31	0.359	5	31	0.994
18:00 - 19:00	5	31	0.436	5	31	0.282	5	31	0.718
19:00 - 20:00	1	19	0.474	1	19	0.158	1	19	0.632
20:00 - 21:00	1	19	0.263	1	19	0.105	1	19	0.368
21:00 - 22:00									
22:00 - 23:00									
23:00 - 24:00									
Total Rates:			5.328			5.076			10.404

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 5
ACCIDENT SCREENING REPORT