



University Academy Long Sutton

Transport Assessment

Bowmer and Kirkland Ltd

06 March 2024

→ The Power of Commitment



Project name		University Academy, Long Sutton					
Document title		University Academy Long Sutton Transport Assessment					
Project number		12625779					
File name		University Academy Transport Assessment v1.7.docx					
Status Code	Revision	Author	Reviewer		Approved for issue		
			Name	Signature	Name	Signature	Date
S3	Draft	A Gandham	P Longman		D Hurren		30/01/24
S4	Final	A Gandham	P Longman		D Hurren		06/03/24
[Status code]							
[Status code]							

Gutteridge Haskins & Davey Limited | CN 05528602

Floor 10, 25 Farringdon StreetLondon, EC4A 4AB, United Kingdom

T +44 203 077 7900 | **F** +44 203 077 7901 | **E** londonmail@ghd.com | **ghd.com**

© GHD 2024

This document is and shall remain the property of GHD. The document may only be used for the purpose for which it was commissioned and in accordance with the Terms of Engagement for the commission. Unauthorised use of this document in any form whatsoever is prohibited.

Contents

1.	Introduction	1
1.1	Background	1
1.2	Development Proposals	2
1.3	Purpose of this Report	2
1.4	Scope and Limitations	2
1.5	Report Structure	2
2.	Transport Policy and Guidance	3
2.1	Introduction	3
2.2	National Policy	3
2.2.1	National Planning Policy Framework, 2021	3
2.2.2	The Strategic Road Network and the Delivery of Sustainable Development – Department for Transport Circular 02/13	4
2.3	Local Policy	5
2.3.1	Lincolnshire Local Transport Plan 5	5
2.3.2	South East Lincolnshire Local Plan 2011-2036 (adopted March 2019)	5
2.3.2.1	Lincolnshire Local Plan (2011-2036) Parking and Accessibility Standards	6
2.4	Other Guidance	7
2.5	Policy Response	7
3.	Baseline Transport Conditions	8
3.1	Introduction	8
3.2	Site Location	8
3.3	Sustainable Modes	9
3.3.1	Walking	9
3.3.2	Cycling	10
3.3.3	Bus services	10
3.3.4	Rail services	10
3.4	Local Highway Conditions	11
3.4.1	Little London	11
3.4.2	Daniel's Gate	11
3.4.3	Daniel's Crescent	11
3.4.4	Park Road	11
3.4.5	Back Lane	11
3.5	Accident Analysis	12
3.6	Summary	12
4.	Existing School Operation	13
4.1	Introduction	13
4.2	Occupancy and Hours of Operation	14
4.2.1	Student and staff numbers	14
4.2.2	Operating times	14
4.3	Access Arrangements	14
4.4	Vehicle Parking	15
4.5	Cycle Parking	15
4.6	Waste Strategy	15

4.7	Delivery and Servicing	15
4.8	Travel Behaviour	16
4.8.1	Students	16
4.8.2	Staff	17
5.	Development Proposals	19
5.1	Introduction	19
5.2	Overview	20
5.3	Access Proposals	20
5.4	Vehicle Parking Proposals	20
5.5	Cycle Parking	21
5.6	Delivery and Servicing Arrangements	21
5.7	Waste Strategy	21
5.8	Emergency Services	22
5.9	School Travel Plan	22
5.10	Construction Management Plan	23
5.11	Conclusion	23
6.	Predicted Travel Behaviour	24
6.1	Introduction	24
6.2	Trip Generation	24
6.2.1	Students	24
6.2.2	Staff	25
6.3	Conclusions	25
7.	Transport Impact	26
7.1	Introduction	26
7.2	Pedestrian Impact	26
7.3	Cycling Impact	26
7.4	Public Transport/ School Bus Impact	26
7.5	Highway Impact	27
7.6	Parking Impact	27
7.7	Road Safety	27
7.8	Conclusion	28
8.	Summary and Conclusions	29
8.1	Summary	29
8.2	Conclusion	30

Table index

Table 2-1	The Minimum vehicle and cycle parking standards for schools in the Local Plan	6
Table 3-1	Summary of Local Bus Services	10
Table 4-1	University Academy Start and Finish Times	14
Table 4-2	Comparison of Facilities Start and Finish Times	14
Table 4-3	Existing Student Trips by Mode	16
Table 4-4	Existing Staff Trips by Mode	17
Table 4-5	Existing Staff Arrival and Departure Times	18

Table 5-1	Proposed staff/visitor parking	20
Table 6-1	Proposed Student Trips by Mode	24

Figure index

Figure 1-1	Site Location Map	1
Figure 3-1	Site Location	8
Figure 3-2	Public Rights of Way in the Vicinity of the Site	9
Figure 3-3	Personal Injury Accident locations in the vicinity of the site (most recent five-year period)	12
Figure 4-1	Existing Site Layout	13
Figure 5-1	Proposed Site Layout: Transport	19

Appendices

Appendix A	Proposed Site Layout
Appendix B	Swept Path Analyses: Vehicle access and parking
Appendix C	Swept Path Analyses: Service, delivery and emergency vehicles

1. Introduction

1.1 Background

Gutteridge Haskins & Davey Limited (GHD) has prepared this Transport Assessment (TA) report in support of a planning application for the proposed redevelopment of University Academy at 84 Little London, Long Sutton, Spalding PE12 9LF (henceforth referred to as the site). The location of the site is illustrated in Figure 1-1.

Figure 1-1 Site Location Map



Base Image Source: Google Earth, accessed December 2023

University Academy is a secondary school for students aged 11-16 and is part of the University of Lincoln Academy Trust. The school has consented capacity for 720 students and 103 full time equivalent (FTE) staff.

The site is bound by Little London and residential properties to the west and agricultural Land to the north, east and south. The vehicular access to the site is provided off Little London via a one-way loop with separate access and egress. The site currently provides 48 staff and 10 visitors car parking spaces.

1.2 Development Proposals

The proposals comprise of demolition of existing University Academy buildings and erection of a new school building with capacity for 750 students and 103 FTE staff. The proposal seeks the minor increase in capacity of the school from 720 to 750 students but there is no increase in staff numbers.

The existing vehicular access arrangement will be retained. Improved pedestrian access segregated from vehicular traffic will be provided. Separate bus and parent drop-off/pick-up areas will be provided on the loop road. Appendix A includes the proposed development plan.

1.3 Purpose of this Report

This TA reviews the existing transport and highway conditions in the vicinity of the site and the surrounding area, identifies the transport and highway impacts, determines whether the proposal would have a material impact on the local highway network and outlines any mitigation measures necessary to address the impacts identified.

This TA has been prepared in accordance with the scope of work agreed with Lincolnshire County Council Highways via email dated 19th December 2023.

A School Travel Plan¹ and a Construction Management Plan² have also been prepared to support the application submission.

1.4 Scope and Limitations

This report has been prepared by GHD for *Bowmer and Kirkland Ltd* and may only be used and relied on by *Bowmer and Kirkland Ltd* for the purpose agreed between GHD and *Bowmer and Kirkland Ltd* as set out in this report.

GHD otherwise disclaims responsibility to any person other than *Bowmer and Kirkland Ltd* arising in connection with this report. GHD also excludes implied warranties and conditions, to the extent legally permissible.

The services undertaken by GHD in connection with preparing this report were limited to those specifically detailed in the report and are subject to the scope limitations set out in the report.

The opinions, conclusions and any recommendations in this report are based on conditions encountered and information reviewed at the date of preparation of the report. GHD has no responsibility or obligation to update this report to account for events or changes occurring subsequent to the date that the report was prepared.

The opinions, conclusions and any recommendations in this report are based on assumptions made by GHD described in this report. GHD disclaims liability arising from any of the assumptions being incorrect.

1.5 Report Structure

Following this introduction, the remainder of this TA is structured as follows:

Chapter 2	Transport policy and guidance
Chapter 3	Baseline transport conditions
Chapter 4	Existing school operation
Chapter 5	Development proposals
Chapter 6	Predicted travel behaviour
Chapter 7	Transport impact
Chapter 8	Summary and Conclusions

¹ University Academy, Long Sutton School Travel Plan (GHD, ##### 2024)

² University Academy Long Sutton, Spalding Construction Management Plan (CMP) (Bowmer + Kirkland, ##### 2024)

2. Transport Policy and Guidance

2.1 Introduction

This Chapter provides a review of relevant national, regional, and local policy and guidance documents that has influenced the development proposals and the Transport Assessment. The policy documents reviewed in this Chapter are as follows:

- a. National Planning Policy Framework (2021)
- b. The Strategic Road Network and the Delivery of Sustainable Development – Department for Transport Circular 02/13
- c. Draft Lincolnshire Local Transport Plan 5
- d. South East Lincolnshire Local Plan 2011-2036 (March 2019)
- e. Travel Plans, Transport Assessment and Statements (2014).

2.2 National Policy

2.2.1 National Planning Policy Framework, 2021

The National Planning Policy Framework (NPPF) sets out the Government's planning policies for England and how these are expected to be applied. It provides a framework within which locally prepared plans for housing and other development can be produced.

Paragraph 111 states that:

"It is important that a sufficient choice of school places is available to meet the needs of existing and new communities. Local planning authorities should take a proactive, positive and collaborative approach to meeting this requirement, and to development that will widen choice in education. They should:

- a) give great weight to the need to create, expand or alter schools through the preparation of plans and decisions on applications; and*
- b) work with school promoters, delivery partners and statutory bodies to identify and resolve key planning issues before applications are submitted."*

Paragraph 104 sets out the transport issues which should be addressed within Development Plans and decisions 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".*

Paragraph 105 of Chapter 9 'Promoting sustainable transport' states:

"Significant development should be focused on locations which are or can be made sustainable, through limiting the need to travel and offering a genuine choice of transport modes. This can help to reduce congestion and emissions and improve air quality and public health".

Whilst considering sites for specific development proposals, paragraph 110 outlines that 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;*
- *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 mitigated to an acceptable degree”.*

Paragraph 111 states that:

“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”.

Within this context Paragraph 112 finds that applications for development should:

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

2.2.2 The Strategic Road Network and the Delivery of Sustainable Development – Department for Transport Circular 02/13

The Department for Transport (DfT) Circular explains how the Highways Agency (now Highways England) will participate in all stages of the planning process with Government Offices, regional and local planning authorities, local highway/transport authorities, public transport providers and developers to ensure national and regional aims and objectives can be aligned and met.

The Circular sets out that proposals should only be prevented or refused on transport grounds where the residual cumulative impacts of development are severe.

It is identified that a robust travel plan that promotes use of sustainable modes is an effective means of managing the impact of development on the road network and reducing the need for major transport infrastructure.

Highways England expects the promoters of development to put forward initiatives that manage down the traffic impact of proposals to support the promotion of sustainable transport and the development of accessible sites.

2.3 Local Policy

2.3.1 Lincolnshire Local Transport Plan 5

The Lincolnshire Local Transport Plan 5 (LTP) is designed to cover the short term (2022 to 2026), medium term (up to 2034) and long term (up to 2050) times for transport and highways for the entire county. The LTP provides links from the spatially based local plans and transport policy into higher level policy strategy documents covering socio-economic, environmental and health agendas. The LTP 5 aims to provide a comprehensive and integrated transport system that is safe, sustainable and accessible to all users.

The main objectives of the Lincolnshire LTP 5 are:

1. *Supporting economic growth*
 - a. Support the vitality and viability of our town centres and rural communities.
 - b. *Improve connectivity to jobs and employment opportunities.*
2. *Future ready, green transport*
 - a. *Deliver sustainable development by ensuring that new developments are designed to reduce the need to travel, minimise car use and support the use of more sustainable modes.*
3. *Promote thriving environments*
 - a. *Develop opportunities to both protect and enhance the built and natural environment.*
 - b. *Minimise waste and make the best use of available resources.*
 - c. *Provide sustainable access to Lincolnshire's wonderful environment and heritage.*
4. *Supporting safety, security and a healthy lifestyle*
 - a. Increase confidence in a safer and more secure transport network.
 - b. *Improve the health of our communities through the provision for active travel.*
5. *Promoting high aspirations*
 - a. *Improve connectivity and access to education, healthcare and leisure.*
 - b. *Improve the accessibility of the transport system and in particular access onto public transport.*
6. *Improve quality of life*
 - a. *Improve the quality of place and reduce the overall negative impacts of transport on people's lives.*

2.3.2 South East Lincolnshire Local Plan 2011-2036 (adopted March 2019)

The adopted Local Plan has been produced in partnership with Boston Borough, South Holland District and Lincolnshire County Councils who have worked together to create a single Local Plan for South East Lincolnshire. The Local Plan sets out the development of South East Lincolnshire ensuring key spatial issues are addressed.

There are two main transport priorities stated in the local plan:

- *To improve accessibility for all to jobs, services and facilities by sustainable and public transport, to make travel as easy and affordable as possible, both within the area and along key links to and from South East Lincolnshire.*
- *To improve South East Lincolnshire's highway infrastructure, to tackle congestion, improve road safety and make journeys as easy as possible particularly for those living in rural areas and to enhance efficiencies for business.*

This Local Plan reinforces the national approach promoting sustainable alternatives to the car through new development in Policy 33. In terms of road based transport, this will be by:

“Working with the Local Highway Authority to militate against congestion at pinch points and continuing to actively manage roads under its control.”

For cycling, walking and other sustainable transport this will be by:

“1. protecting existing footpaths, cycle routes and public rights of way from development;”

“2. improving connectivity to create a more coherent walking and cycling network through the provision of new multi-user routes”

“3. ensuring that major new developments provide for walking and cycling routes and/or links to existing networks, to key public transport corridors and to transport interchanges;”

“4. protecting the ‘key public transport corridors’ and supporting the ongoing provision, and, where appropriate, extension of bus services, in partnership with bus operators.”

The local plan sets out an approach to parking provision for vehicles and cycles with the aim of promoting sustainable transport choices and providing attractive and safe environments whilst ensuring that sufficient parking is provided to meet local needs. Policy 36 states that:

“All new development, including change of use, should provide vehicle and cycle parking, in accordance with the minimum Parking Standards adopted by the Local Planning Authorities.”

Policy 36 mentions that parking for residents, employees and visitors should be integral to the design and form of all new development and should ensure that:

1. *“parking spaces are fit for their intended use in terms of size and design;”*
2. *“for major non-residential development:*
 - a. *secure, covered, convenient storage for bicycles for employees should be provided close to an entrance to the building. Changing and shower facilities should be provided where possible;*
 - b. *secure, covered bicycle storage for visitors are located close to the main entrance to the building;*
 - c. *where more than 50 parking spaces are provided, at least one double electric vehicle charge point will be required (2 spaces). For each additional 50 parking spaces, one double charging point should be provided up to a maximum of three (6 spaces)”*

2.3.2.1 Lincolnshire Local Plan (2011-2036) Parking and Accessibility Standards

The adopted Local Plan provides the minimum vehicle and cycle parking standards that should be used in accordance with guidance in Policy 36.

The parking standards required for the proposed land use is presented in Table 2-.

Table 2-1 *The Minimum vehicle and cycle parking standards for schools in the Local Plan*

Type of Development	Car Parking Standard	Cycle Parking Standard
Nursery, primary or secondary schools (D1)	1 space per 2 staff	1 space per 3 employees Students to be assessed on a site-by-site basis

2.4 Other Guidance

Where appropriate a range of other technical reference documents have been consulted in developing the assessment and mitigation proposals. These include:

- a. Inclusive Mobility – A Guide to Best Practice on Access to Pedestrian and Transport Infrastructure, (DfT, 2021).
- b. The Manual for Streets, (Department for Communities and Local Government (DCLG) / DfT, 2007)
- c. The Manual for Streets 2, CIHT, 2010 – a companion guide to Manual for Streets (DCLG / DfT, 2010); and
- d. Travel Plan Guidelines, (DfT, various dates).

2.5 Policy Response

The transport policy requirements outlined in the NPPF and the Local Plan are acknowledged. The car parking will be expanded and rationalised to provide accessible and EV spaces. A separate bus drop-off area and parents drop off lane/area will be provided to improve the efficiency and safety during drop-offs and pick-ups.

In accordance with the NPPF and Local Plan, there is an opportunity to increase cycle usage for both staff and students living at cycle distance to the school. Cycling is currently one of the least used modes of travel to and from University Academy and given the rural location it can be challenging to increase cycle usage. However, the school will introduce travel plan measures to encourage cycling among other sustainable modes of transport.

3. Baseline Transport Conditions

3.1 Introduction

A site visit and desktop study has been undertaken to review of the baseline transport conditions surrounding the site. This includes a review of the site location, accessibility by sustainable modes, local highway conditions and accident analysis in the vicinity of the site. This Chapter provides a summary of this work and informs the assessment of the impact of the development and the proposed mitigation measures.

3.2 Site Location

The site is located at 84 Little London, Long Sutton, Spalding PE12 9LF. Figure 3-1 illustrates the location the site. The site currently comprises of the existing University Academy Building, forecourt, parking and playing fields.

Figure 3-1 **Site Location**



Base Image Source: Google Earth, accessed December 2023

The site is bounded by a fenced dog exercise area (run as a business) and agricultural land to the north'. To the east the land is in agricultural use and adjoining the site boundary to the south is land with an extant planning permission for residential development and land which is currently in use as a solar farm.. The site is approximately 22km east of Spalding and 24km west of King's Lynn.

The site is accessible on foot via Little London with pedestrian footways available both north and south of the site. Vehicular access to the site is provided via a one-way loop off Little London. The section of road along the site frontage is a designated School Safety Zone with vehicle speeds restricted to 20mph. Both Peele Leisure Centre

and Rainbow Nursery are located within the site boundary, however, are accessed via a separate access road off Little London.

3.3 Sustainable Modes

3.3.1 Walking

Pedestrian footways are provided on both sides of Little London within the vicinity of the site with street lighting available at regular intervals. The section of Little London along the site frontage is a School Safety Zone with vehicle speed restricted to 20mph. The footway network in Long Sutton is comprehensive and connects the site to residential areas of Long Sutton.

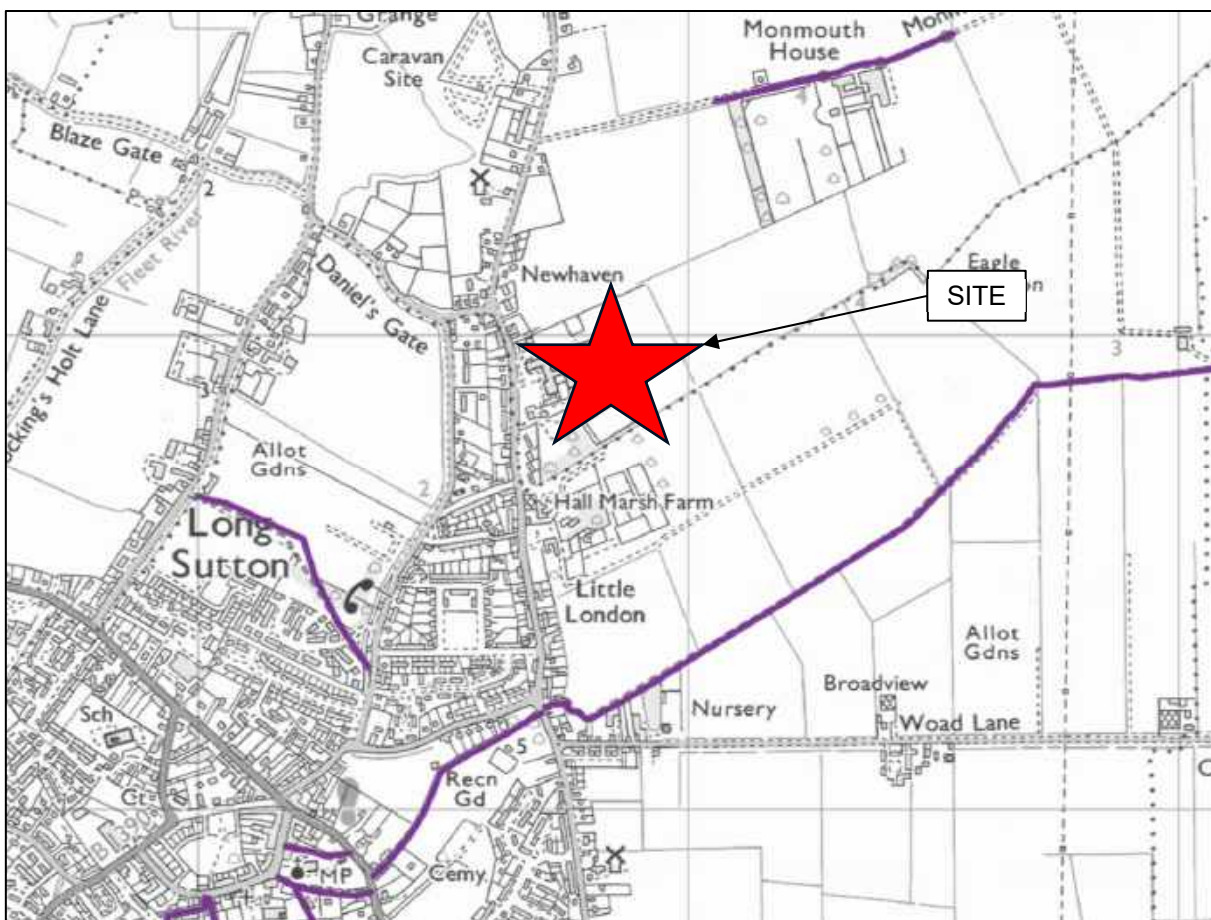
There are a number of crossing facilities that pedestrians travelling to and from school can use including:

- Signalised crossing located east of the B1359 / Market Place junction.
- Raised speed table approximately 30m north of St Mary's Church bus station.
- Raised speed table at Market Place intersection with the B1359.
- Raised speed table at Bull Lane intersection with the B1359.
- Raised speed table approximately 60m north of Market Court bus station.

The majority of pedestrian crossings in the vicinity of the school are informal crossings with dropped kerbs. The pedestrian crossing in front of the school on Little London is also an informal crossing with dropped kerbs and tactile paving.

There are no Public Rights of Way (PRoW) paths passing through the site. However, there are a number of PRoW footpaths in the wider area as demonstrated in Figure 3-2 **Error! Reference source not found.**

Figure 3-2 Public Rights of Way in the Vicinity of the Site



Base Image Source: Lincolnshire County Council, accessed December 2023

3.3.2 Cycling

There is no cycling infrastructure in the immediate vicinity of the school therefore cyclists are expected to share the main carriageway with motorised vehicles. However, the rural location and low trafficked roads provide a convenient and safe environment to encourage cycling to and from the school.

Large residential areas of Long Sutton, Lutton, Sutton Bridge and Fleet Hargate are within easy cycling distance from the school. National cycle route 1 routes 1km west from the site.

3.3.3 Bus services

The nearest bus stop to the site is located on the loop road within the school premises. The school is served by a school bus service S123S between Long Sutton and Gedney Hill.

The Market Court bus stop which is approximately 1.2km south from the site and is served by Bus service 505 interconnect. The northbound bus stop is provided with shelter, seating, yellow bus box, timetable and refuse bin. The southbound bus stop is provided with a flag, yellow bus box, and timetable. Table 3- shows the frequency and destinations of bus services from these stops.

Table 3-1 Summary of Local Bus Services

Bus route	Destination	Frequency	
		AM Peak	PM Peak
S132S	towards Long Sutton - University Academy	1 bus Departure: 7:40	-
	towards Gedney Hill	-	1 bus Departure: 15:30
505 interConnect	towards Kings Lynn	120min	20-60 min
	towards Spalding	20-90 min	3-40 min

As the public transport services to the site are limited, students are bused to the school using eight dedicated school buses, two minibuses and two car taxis. Two of eight buses are directly contracted by the school and paid by the parents for use of service. The remaining services are contracted by the local authority. The two minibuses and two car taxis are primarily used for transporting students with special needs. However, it should be noted that there are no designated bus bays or accessible bays for the two minibuses and two car taxis used for transport students with special needs.

3.3.4 Rail services

There are no rail services within the vicinity of the site.

Spalding railway is the closest railway station being located approximately 24km west of the site. The railway service operating in Spalding railway station is the East Midlands Railway. It provides services between Peterborough and Doncaster with 14 services provided in each direction for the duration of the day.

King's Lynn railway station is approximately 27km east of the site and is the northern terminus of the Fen Line in the east of England. Great Northern operates services from this station providing 27 services in each direction to Cambridge and London Kings Cross. The bus service 505-interConnect connections from site to Spalding and King's Lynn railway stations.

3.4 Local Highway Conditions

This section provides a description of the local highway network and key routes around the site.

3.4.1 Little London

Little London is a single carriageway road subject to a speed limit of 30mph for the majority of its length. However, the section of Little London along the site frontage is a designated School Safety Zone with vehicle speed restricted to 20mph.

Little London provides pedestrian and vehicular access to the site. Parking is restricted along the site frontage by means of zig-zag lines. On street parking is permitted beyond the zig-zag lines on Little London which reduces the effective width of the road to a single lane for vehicle movements.

Beyond village limits to the north, Little London becomes Lutton Gowts and is subject to a 40mph speed limit. To the south, Little London becomes Roman Bank and is subject to a 30 mph speed limit. On street parking is permitted on Roman Bank which reduces the effective width to a single lane for moving vehicles.

3.4.2 Daniel's Gate

There are two sections to Daniel's Gate: one section runs north south roughly parallel to the west of Little London and the second routes east-west between Little London and Limewalk in the west, connecting with the northern end of the north-south section of Daniel's Gate.

The road has a posted speed limit of 30mph where the section of road is parallel to Little London. The northern section of Daniel's Gate is subject to 60mph speed limit. There are no parking restrictions along Daniel's Gate.

3.4.3 Daniel's Crescent

Daniel's Crescent connects Little London to the east with Daniel's Gate to the west. Daniel's Crescent is a residential street subject to a speed limit of 30mph.

There are no parking restrictions along Daniel's Crescent. There are no traffic calming measures along Daniel's Crescent.

3.4.4 Park Road

Park Road connects to Little London to the east with B1359 Market Street to the west. Park Road is a residential street subject to a speed limit of 30mph.

There are no parking restrictions along Park Road except at the junction with B1359 Market Street. On street parking limits the capacity of Park Road to a single lane. There are no traffic calming measures along Park Road.

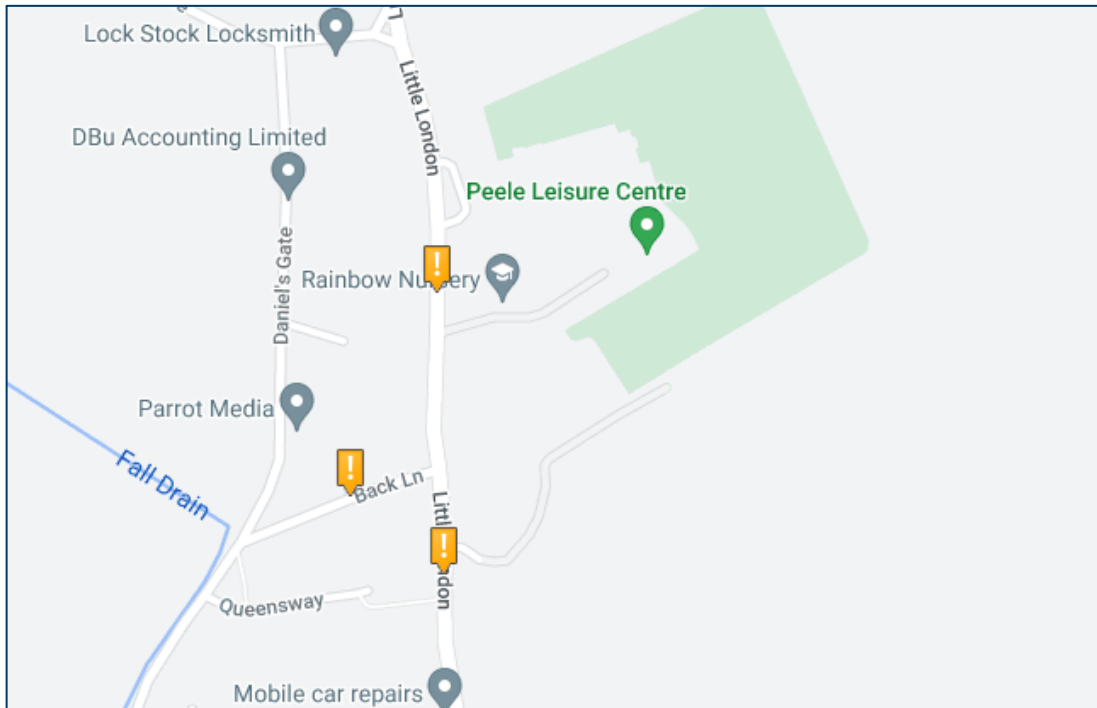
3.4.5 Back Lane

Back Lane is a residential street connecting Little London to the east and Daniels Gate to the west. Back Lane is subject to a speed limit of 30mph. On street parking is permitted on Back Lane which reduces the effective width of the road to a single lane for vehicular movements.

3.5 Accident Analysis

Personal Injury Accident (PIA) data was obtained from the Crashmap website for the most recent five-year period available on the highway network surrounding the site. Figure 3-3 **Error! Reference source not found.** demonstrates the location of the accidents with respect to the site.

Figure 3-3 Personal Injury Accident locations in the vicinity of the site (most recent five-year period)



Base Image Source: Crashmap, accessed December 2023

Over the five-year period, three accidents with a slight" severity level occurred in close proximity to the site. Based on the date and location of these accidents, it is determined that each incident is isolated and does not suggest a recurring pattern. Consequently, it is concluded that the area surrounding the site does not exhibit an accident problem consistent with potential safety issue with the geometric layout of the highway.

3.6 Summary

The site is accessible for pedestrians with a comprehensive footway network throughout Long Sutton. Although there is limited cycling infrastructure, the rural location and low trafficked routes provide a safe and convenient environment for cycling.

While public transport provision in the vicinity of the site is limited there are dedicated school bus services for transporting students. There are dedicated minibuses and taxi services used for transporting students with special needs, however there are no designated bus bays and accessible parking bays for minibuses and car taxis.

There are no railway stations close to University Academy. The nearest railways stations to the school are Spalding and King's Lynn railway stations.

The stretch of road in Little London along the site frontage is a designated school safety zone with vehicle speed limit restricted to 20mph. An analysis of PIA data suggests there is no accident problem related to the geometric layout of the highway within the surrounding road network.

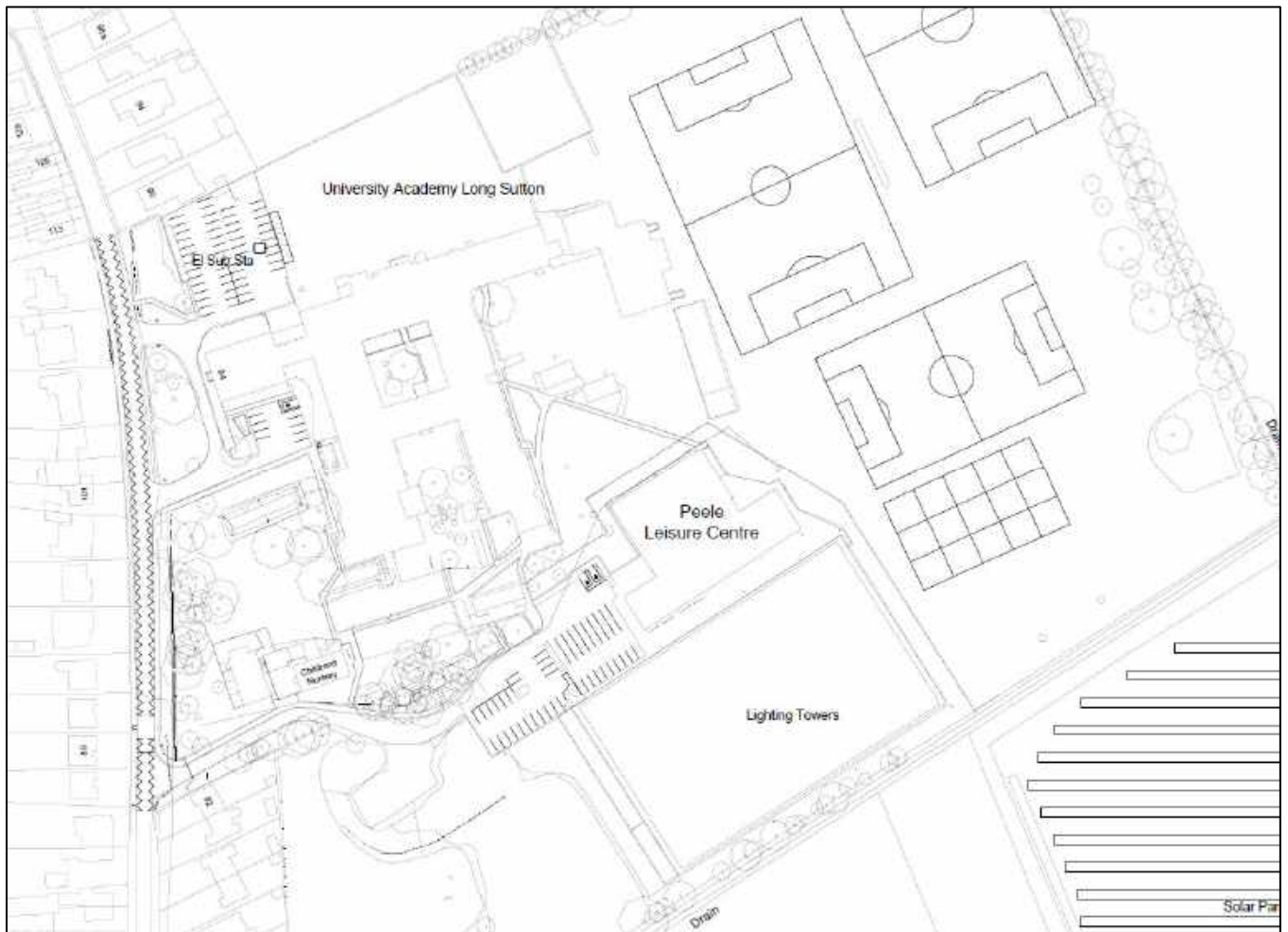
4. Existing School Operation

4.1 Introduction

This section of the report describes the existing operation of the school in terms of on-site facilities, opening hours and students and staff travel patterns.

Figure 4-1 presents the existing site layout.

Figure 4-1 Existing Site Layout



4.2 Occupancy and Hours of Operation

The school site consists of a teaching block, the staff/ visitor car parks and wider school grounds.

4.2.1 Student and staff numbers

The school is a secondary school and currently (i.e. academic year 2023/2024) operates with 721 students on roll. The school has a total of 103 FTE staff including both teaching staff and supporting staff that work on full-time, or part-time basis.

4.2.2 Operating times

The operational hours of the school including after-school clubs are outlined in Table 4-1. The school does not run a breakfast club.

Table 4-1 University Academy Start and Finish Times

Session/Group	Start	Finish
School day	08:15	15:20
After-school club	15:20	16:30

The start and finish times of the school are staggered with the neighbouring Rainbow Nursery and Peele Leisure Centre as shown in Table 4-2.

Table 4-2 Comparison of Facilities Start and Finish Times

Facility	Start	Finish
University Academy	08:15	15:20
Rainbow Nursery	07:30	18:00
Peele Leisure Centre	07:00	21:00

4.3 Access Arrangements

The site is currently accessed from Little London providing separate access and egress for vehicles and a pedestrian/cycle only access just north of the vehicle access. A loop road between the vehicle access and egress provides a drop-off/pick-up location for parents. Railings at the kerbside on the loop road prevent students from stepping off the kerb into the loop road except for at two designated locations. This assists the safe management of drop-offs/pick-ups by staff positioned next to the railings. It also limits the capacity of the facility to a maximum of two vehicles dropping-off/picking-up at one time.

The loop road is also used as a drop-off for buses in the AM period. The width of the loop road prevents vehicles from passing one another with the result that, when buses are parked on the loop road and students are alighting, significant congestion occurs which blocks back onto Little London.

In the PM peak, buses pick students up from the school playground, which is accessed off the loop road. This arrangement requires management by school staff to prevent vehicle/student conflict when buses access/egress the playground.

It should be noted that any highway impacts generated by the school occur over short periods with impacts in the PM period generally occurring outside of the network peak period.

4.4 Vehicle Parking

The school currently provides 58 on-site parking spaces for staff/visitors at two locations: ten spaces, including one accessible space, directly outside the main school entrance and 48 spaces in an area adjacent to the school playground. Both areas are accessed off the loop road. There are no EV charging spaces on the site. The school has no dedicated motorcycle parking spaces.

On a typical day both staff and visitor's car park normally become full and staff/visitors use Peele Leisure Centre Car park and its over flow car park area for parking. The Peele Leisure Centre car park is accessed off Little London to the south of the loop road egress.

There are no dedicated coach parking spaces, however hardstanding area of school grounds or loop road are used during annual sporting events and school trips for coaches set down and pick up students.

4.5 Cycle Parking

Cycle parking in the form of covered, secure Sheffield Stands are provided for students and staff within the school premises split in two cycle sheds at different locations. There are currently 50 cycle parking spaces for the students and 10 cycle parking spaces for the staff. Site observations indicate that cycle parking is underutilised and this is supported by the results of the travel demand survey undertaken in December 2023, as reported in section 4.8. One shower and changing facility with lockers is available for staff.

4.6 Waste Strategy

The refuse storage/collection points are located at the northeastern corner of the staff car park. The school receives refuse collections once per week, which includes recycling and general waste. This occurs on Thursday early in the morning, around 06:30.

4.7 Delivery and Servicing

Approximately 10 delivery/servicing trips occur on a daily basis with pick-up/drop-off occurring in the visitors' car park. Typical deliveries include catering supplies and school ordered supplies that are delivered in transit vans with maximum size of vehicle used is a 10-ton truck.

4.8 Travel Behaviour

4.8.1 Students

For the purpose of establishing the modal share and trip generation for the school, a travel survey was undertaken by the school on 8th December 2023. The results are presented in Table 4-3.

Table 4-3 Existing Student Trips by Mode

Travel Mode	Mode Share	Person Trips
Car	24%	171
Taxi	3%	24
Minibus	2%	16
Motorcycle	0%	1
Bus	52%	376
Rail	0%	0
Walk	17%	119
Cycle	2%	13
Other	0%	0
If Other, please specify	0%	0
Total	100%	721

Table 4-3 indicates that the majority of students travel to the school by bus/minibus and this amounts for 54% of all trips. The second most common mode of travel is by car (including car sharing) and this accounts for 24%. Approximately 17% of students travel to the school on foot. Therefore, a total of 73% of students travel to and from school using sustainable travel modes.

The school currently generates 171 person car trips from students. The results of the travel survey recorded an average car share rate of 2.3 students per car and if this is taken to account, this results in 74 ($171 \div 2.3$) car trips currently generated by students.

As per the travel survey, approximately 2% of the students cycle to the school which equates to 13 students. However, it is acknowledged that use of cycling is expected to be variable dependent on the day, time of year and other matters such as weather conditions.

As mentioned above, the school runs after-school clubs. Attendance levels at the after-school club on a typical weekday is 80 students. This means that students that attend these clubs travel after the school peak periods and the number of students leaving the school at peak times will be lower than outlined above.

4.8.2 Staff

A staff travel survey was undertaken by the school at the same time as the student survey in December 2023 and the results have been used to establish the existing staff travel profile. Table 4-4 shows the calculated mode share for staff.

Table 4-4 Existing Staff Trips by Mode

Travel Mode	Mode Share	Person Trips
Car Driver	94%	97
Car Passenger	3%	4
Motorcycle	0%	0
Taxi	0%	0
Minibus	0%	0
Bus	0%	0
Rail	0%	0
Cycle	0%	0
Walk	2%	2
Total	100%	103

Table 4-4 shows that the majority of staff (101) travel by car: 97 as Car Drivers and four as Car Passengers. The survey results indicated that all Car Passengers travelled with other staff as car drivers, thus the school currently generated 97 car trips by staff.

As such, it is understood that currently the school generates demand for 97 car parking spaces throughout the day. This is more than the 48 on-site car parking spaces currently provided. It is understood that a considerable proportion of staff work on part-time bases and there may be some fluctuation in demand generated by staff during the day.

Table 4-5 shows staff arrival and departure times as derived from the staff surveys.

Table 4-5 *Existing Staff Arrival and Departure Times*

Time of Day	Arrivals (%)	Departures (%)
Before 07:30	32%	0%
07:30 to 08:00	40%	0%
08:00 to 08:30	25%	0%
After 10:30	3%	0%
15:00 to 15:30	0%	1%
15:30 to 16:00	0%	21%
16:00 to 16:30	0%	23%
16:30 to 17:00	0%	21%
17:00 to 17:30	0%	13%
17:30 to 18:00	0%	6%
18:00 to 18:30	0%	5%
18:30 to 19:00	0%	7%
After 19:00	0%	3%

Based on the travel survey data, it is understood that 72% of staff typically arrive at school before 8:00 and 66% depart before 17:00 and 15% after 18:00 thereby spreading the demand and avoiding the network peak hour/ congestion.

5. Development Proposals

5.1 Introduction

This Chapter of the report describes the development proposals related to transport. A plan illustrating the proposed layout of the development is contained in Appendix A of this report. Figure 5-1 provides an extract from the proposed layout showing the transport-related infrastructure.

Figure 5-1 Proposed Site Layout: Transport



5.2 Overview

The development proposal involves demolition of existing school buildings and erection of a new three-storey school building with improved facilities including additional areas for students with special educational needs and disabilities (SEND) and for exam requirements.

The proposal seeks the minor increase in capacity of the school from 720 to 750 students (age 11 to 16 years old). The current number of school staff is 103FTE. There is no increase in staff numbers as a result of the proposals.

The target opening date for the new school building is December 2025.

5.3 Access Proposals

A new pedestrian/cycle access is proposed off Little London along the northern boundary of the site providing students/parents accessing the site by these modes with a safe route from Little London to the main school entrance.

The existing separate vehicle access/egress points off Little London will be retained. Parents will use the loop road in its existing location to access a new drop-off/pick-up facility along the south edge of the loop road adjacent to the vehicle egress. Swept path analyses of vehicles accessing/egressing the facility is provided in **Error! Reference source not found..** The facility will provide capacity for three vehicles at a time. Students will be able to wait safely behind barriers on a footway which provides a route to/from the main school entrance that does not require them to cross areas used by vehicles.

A separate drop-off/pick-up facility for buses will be provided off the loop road with space for up to eight buses. Swept path analyses of buses access/egressing the facility is provided in **Error! Reference source not found..** This arrangement provides students with a safe route from the drop-off facility to the main school entrance without the need for them to cross areas used by vehicles. On pick-up, the arrangement enables students to be held safely on the MUGA pitch to be released into the pick-up facility when buses arrive.

5.4 Vehicle Parking Proposals

South East Lincolnshire parking standards recommend minimum staff car parking provision of 1 space for every 2 staff. There is no recommendation for visitors' parking spaces. As per the standard the minimum car parking required at the site for 103 staff is 52 spaces.

In response to the parking demand, the proposals increase the total on-site parking provision to 64 car parking spaces for staff/visitors. This level of provision exceeds the South East Lincolnshire minimum standard and represents the maximum number of spaces that can be provided on-site in the context of the constraints imposed by the other infrastructure requirements of the new school.

The proposed 64 car parking spaces have been rationalised to provide accessible and EV car parking spaces. **Error! Reference source not found.** shows the allocation for the proposed 64 car parking spaces.

Table 5-1 Proposed staff/visitor parking

Type of Space	Proposed parking
Standard spaces	54
EV charging spaces (active)	2
Accessible spaces (car)	6
Accessible spaces (minibus)	2
Total	64

The DfT guidance for inclusive mobility requires 5% of all parking spaces to be accessible for disabled drivers/passengers. The eight accessible spaces (six for cars/taxis and two for minibuses) proposed is over and above the DfT recommendation and reflects the level requested by the school to meet demand considering the high proportion of SEND students at the school.

Electric Vehicle Charging Points (EVCPs) are proposed. South East Lincolnshire parking standards requires least one double EVCP (2 spaces) where more than 50 parking spaces are provided. For each additional 50 parking spaces, one double Charging Point is required up to a maximum of 3 (6 spaces). Therefore, two EV charging spaces will be provided which meets the standard.

As the majority of the students travel by bus, eight bus parking bays will be provided on the loop for bus drop offs and pickups. The drop off area can also be used for coach parking during the annual sporting events and during school trips.

Swept path analyses of vehicles accessing and egressing the car, minibus and bus parking spaces are contained in Appendix B.

5.5 Cycle Parking

South East Lincolnshire parking standards requires a minimum of 1 cycle parking space to be provided for every 3 staff and that student cycle parking provision is assessed on a site-by-site basis. Based on the staff numbers (103 staff), a total 34 cycle parking spaces would be required to meet the standard for staff. A total of 13 spaces would meet the current demand for student cycle parking.

Figure 5-1 shows 40 cycle parking spaces in the form of Sheffield stands would be provided adjacent to the MUGA pitch. The 40 spaces are far in excess of the current demand and is therefore considered a robust level of initial provision. Figure 5-1 shows that space would be allocated to allow for the future expansion of provision if demand requires it. Cycle parking provision for the school will be reviewed regularly through the STP process and funding for additional storage will be sought when required.

5.6 Delivery and Servicing Arrangements

No additional delivery and servicing trips are anticipated as a result of the minor increase in student capacity of the proposed School. The school will seek to consolidate deliveries to maintain or reduce in the number of delivery vehicles accessing the site.

Deliveries will continue to take place on-site as per the current arrangement. Vehicles will enter the loop road from its northern end then park in the area in which the bus bays are located. The delivery items will be offloaded and trolleyed to reception or kitchen area as required. The vehicles will then exit the site via the loop road egress back onto Little London Road.

Swept path analysis has been undertaken to demonstrate servicing vehicles are able to access and egress the site in a forward gear. The drawings are attached at Appendix C.

5.7 Waste Strategy

It is anticipated that the school refuse and recycling collections will continue to take place as per the current arrangement and no increase in the number of refuse vehicle trips to the site is expected. Any additional refuse and recycling generated would be collected by existing vehicles servicing the site.

Refuse vehicles will enter the loop road from its northern end, follow the alignment of loop road and park in the area in which the bus bays are located. A bin store is located adjacent to the MUGA pitch within the recommended maximum 25m distance from this area. The refuse bins will be trolleyed to the refuse vehicle for collection. The refuse vehicles will then exit via the loop road egress.

Swept path analysis has been undertaken to demonstrate refuse vehicle are able to access and egress in a forward gear. The drawings are attached at Appendix C.

5.8 Emergency Services

Emergency vehicles will be able to access the school grounds and buildings through the existing access off Little London. Swept path analysis has been undertaken to demonstrate that a fire engine can access 15% of the building façade and that an ambulance can access the school grounds. The drawings are attached at Appendix C.

5.9 School Travel Plan

The school intends to use the opportunity offered by the enhanced transport and educational facilities proposed for the new development to encourage sustainable, safe travel. A School Travel Plan has been produced to accompany the application submission setting out a range of measures to address transport impacts produced by the school and to promote sustainable travel and reduce car usage. The School Travel Plan has been produced as a separate document. The objectives of the STP are as follows:

- a. Make sure that the whole school community is aware of the STP and its objectives.
- b. To influence staff travel behaviour away from single car occupancy journeys, encouraging car share, walking, cycling and the use of public transport for journeys to and from the school as far as practical.
- c. To minimise the impact on the local community of traffic associated with staff by minimising noise, pollution and congestion.
- d. To show a commitment to improving traffic conditions within the local area associated with the proposed school redevelopment.
- e. To reduce the adverse effects on health associated with increased vehicle use.
- f. To reduce air pollution and the consumption of fossil fuels.
- g. To increase the attractiveness, and hence the proportion of journeys made to and from the site by sustainable modes, of transport such as cycling.
- h. To reduce the cost to staff on their journey to the school by promoting alternatives that are both cheaper and more environmentally friendly.
- i. To demonstrate commitment to promoting sustainable transport choices and reducing the traffic impact of the development on the local community.

The Travel Plan contains an extensive list of initiatives to support the objectives. Some of the primary initiatives are as follows:

- a. Local authority and school transport for students enabling travel by buses rather than the private car. The school will highlight this to families in pre-joining information.
- b. Staff to marshal forecourt and access area during morning and afternoon peak to prevent conflict between students and vehicular movements.
- c. Introduction of car sharing policy for staff to encourage car sharing by allocated dedicated parking spaces.
- d. Introduction of car parking policy which prioritises car parking allocation for car sharers and staff who live furthest away from the site.
- e. Provision of 40 cycle parking spaces to encourage staff and students to cycle to school.
- f. Implementation of cycle to work scheme for staff in which school contributes towards staff bicycle purchase.
- g. Cycling awareness program for staff, parents and students sharing knowledge on local cycle routes and facilities.
- h. Free bike training program for staff and students to support learning and safety requirements.

Mode shift targets to reduce single occupancy car use, encourage car sharing, improved road safety and cycle awareness programme has been proposed as part of the Travel Plan.

5.10 Construction Management Plan

A Construction Management Plan (CMP) has been prepared by Bowmer + Kirkland. This document describes how Bowmer + Kirkland intend to manage the Construction Phase of the project to meet the requirements of the South Holland District Council and the Department for Education, utilising best practice and to help cut congestion on local roads whilst easing pressure on the environment.

The objectives of the CMP are as follows:

- a. Demonstrate that construction materials can be delivered, and waste removed, in a safe, efficient, and environmentally friendly way.
- b. Help cut congestion on local roads and ease pressure on the environment.
- c. Improve the reliability of deliveries to the site.
- d. Reduce freight operators' fuel costs.
- e. Avoid the deposition of dust and construction material onto the public highway.
- f. Reduce the risk for people plant interface within working adjacent to a live school environment.

The CMP contains list of measures to support the objectives. Some of the measures are as follows:

- a. Limit the number of deliveries per day to 10-14 vehicles per day.
- b. Identify and liaise with other contractors in the vicinity of the site and will co-ordinate deliveries and removals from the site in order to minimise impacts on the road network.
- c. Normal working hours will limited be 7.30am – 6.00pm Monday to Friday and 7:30am – 1:00pm on Saturdays with working operations commencing at 08.00am. There will be no working on Sundays or Bank Holidays to minimise disruption to local community.
- d. Wheel cleaning facilities will be provided in a designated area within the contractor's compound area. A mechanical road sweeper will be used throughout the construction programme, as required, to ensure the public highways local to the site are kept clean & free of debris.
- e. Continual review of our sub-contractor method statements throughout every aspect of the construction sequence will ensure that adequate noise, dust and vibration dampening is always used across the construction site.

5.11 Conclusion

The development proposal entails the demolition of existing school buildings and the construction of a new three-story school building with enhanced facilities, including areas for students with special educational needs and disabilities (SEND) and exam requirements. The school's capacity is planned to increase slightly from 720 to 750 students aged 11 to 16, with no change in staff numbers. Access plans include a pedestrian/cycle route from Little London and separate facilities for vehicle drop-off/pick-up, bus parking, and 64 on-site parking spaces, including accessible and Electric Vehicle (EV) spaces. The project also addresses cycle parking, delivery arrangements, waste strategy, and emergency service access.

The proposals provide accessible car parking spaces and two EVCP spaces which meets and exceed requirements of South East Lincolnshire parking standards. Proposed cycle parking provision is well above the current demand, and future expansion is considered based on demand. The delivery and servicing arrangements aim to minimise disruptions, with a forward-gear access plan demonstrated through swept path analysis. The waste strategy anticipates no increase in refuse vehicle trips, utilising the existing arrangement. Emergency services' access to the school grounds and the new building is demonstrated through swept path analysis, ensuring 15% building façade accessibility for a fire engine and access for an ambulance. Overall, the proposal emphasises safety, accessibility, and sustainability in the school development.

6. Predicted Travel Behaviour

6.1 Introduction

The proposed development is anticipated to result in a minor increase in student travel demand, but staff travel demand will remain unchanged. The predicted trip generation of the proposed school is described below on the basis of the existing travel behaviour documented in Section 4.8 and based on the assumption that students and staff will continue to travel in the same way in the future years.

6.2 Trip Generation

6.2.1 Students

The student trips expected to be generated by the school were calculated using the travel survey received from the school. The future student trip generation based on 750 students and the net increase in trips have been outlined in Table 6-1.

Table 6-1 Proposed Student Trips by Mode

Travel Mode	Mode share	Number of Trips		
		Existing	Proposed	Net Increase
Car	24%	171	178	7
Taxi	3%	24	25	1
Minibus	2%	16	16	0
Motorcycle	0%	1	1	0
Bus	52%	376	391	15
Rail	0%	0	0	0
Walk	17%	119	124	5
Cycle / Scooter	2%	13	14	1
Other	0%	0	0	0
If Other, please specify	0%	0	0	0
Total	100%	721	750	29

Table 6-1 indicates that an additional 7 students will arrive by car, one by taxi and 22 will arrive by sustainable modes of travel. Applying a car share rate of 2.3, as defined by the student survey and reported in section 4.8.1, this would result in an additional 4 vehicle trips (3 trips by car and 1 by taxi).

It should also be noted that typically 80 students attend after-school club, and effectively travel after the afternoon peak period. It is reasonable to assume that this trend will continue following the redevelopment of school.

6.2.2 Staff

As there is no increase in staff numbers as a result of the proposal, no increase in staff trips is anticipated. Assuming staff continue to travel as per existing travel patterns, the future staff trip generation remains as previously shown in Table 4-4.

6.3 Conclusions

Following the proposed development, a minor increase in student travel demand is expected but there would be no increase in staff travel. The majority of additional trips will be by non-car modes, and particularly by bus and walking. An increase of 3 car trips associated with drop-off/pick-up of students is expected.

The implementation of measures and targets set as part of School Travel Plan will result in further reduction in vehicular trips and actual trips will be lower than trips mentioned above. The impact of increased demand for travel has been assessed in Chapter 7.

7. Transport Impact

7.1 Introduction

This section of the report considers the impact of the proposals on the local transport networks in terms of highway impact, parking, road safety, buses, cyclists and pedestrians.

7.2 Pedestrian Impact

Following the school redevelopment, existing pedestrian desire lines are unlikely to change significantly. The pedestrian demand is anticipated to increase for students by 5 trips. However, this demand will be spread to multiple routes and throughout the morning and afternoon school peak hours.

The site visit identified that the footways in the area are generally wide and can accommodate estimated additional trips. The capacity of local footways is not considered to be materially impacted by minor increase in demand for student travel once demand is distributed across the many routes available.

The proposed development layout shows a new wide footway/cycleway would be provided along the northern boundary and a segregated footway/cycleway to the south of loop road, both of which will enable safe and convenient access for pedestrians. Additionally, footway arrangement in the drop off area will mean the students can access the school without the need to cross vehicle routes further enhancing safety.

7.3 Cycling Impact

There is limited cycling infrastructure along Little London and in Long Sutton in general. However, the rural location and low trafficked routes provide a convenient and safe environment for cycling for students and staff.

The current level of cycle usage is low: 13 students and no staff currently cycle to/from the site. As a result of the proposed school redevelopment one new cycling trip is anticipated by students. The proposals would have a negligible additional effect due to cyclists.

As described above, the proposed development would provide a wide shared footway/cycleway along the northern boundary and a segregated footway/cycleway to the south of the loop road, both of which will enable safe and convenient access for cyclists and avoid the need to share the access with vehicular traffic to approach the site.

In future it is anticipated that the number of students or staff cycling to/from the site may increase as a result of the Travel Plan measures. Whilst it is acknowledged that perceived safety risk by students/parents along rural routes and road crossings are barriers for cycling to school, attitudes to cycling is considered a greater barrier. Soft measures to change attitudes to cycling rather than physical improvements are considered in section 5.9 of this report as it is expected these would have a greater likelihood of increasing cycling amongst students and staff.

7.4 Public Transport/ School Bus Impact

A total of 15 additional student trips on buses are expected to be generated as a result of the small expansion in student numbers. Due to the number of dedicated school buses and available public transport, trips are expected to be widely dispersed. An increase in 15 student trips over 8 dedicated school buses and 2 minibuses would equate to less than two additional students per bus/minibus.

No capacity constraints on bus/minibus services were observed during site visits. However, the capacity and layout of the existing loop road means that buses dropping off on the loop road in the AM can be delayed in accessing the drop-off facility. In addition, buses dropping-off at the facility cause delay for parents dropping off and leads to blocking back and congestion on the highway. Consequently, a separate bus drop-off area is proposed to provide safe and efficient for boarding and alighting of students and to relieve congestion and reduce delay.

7.5 Highway Impact

As described in section 5.3, the new site layout will provide additional drop-off/pick-up capacity for parents and buses that will have a positive impact in reducing congestion on the highway network.

The new parent drop-off/pick-up facility provides capacity for three vehicles to access it at one time as opposed to two at the existing facility. In addition, the separation of the bus and parent drop-off/pick-up areas means that buses will not block parents from accessing the site in the AM peak. The combined dwell time of all buses accessing the site and unloading students was considerable and led blocking back of parent vehicles onto the highway. The removal of buses from the loop road used by the parents, along with the relocation of the parent drop-off/pick-up facility to the southern side of the loop road provides significant extra capacity both in terms of parent vehicles accessing the site and the length of on-site queue storage capacity. The proposals are therefore expected to represent a benefit in terms of the reduction in impact on the highway, particularly in the AM peak.

It is estimated that the proposed school redevelopment will generate an additional 4 car trips associated with drop-off and collection of students above the existing levels based on existing student trip generation and mode share patterns.

In Chapter 3 we described the roads in the vicinity of the site used by vehicles accessing the site. The additional 4 vehicle trips would be distributed over these roads. Therefore, these additional trips would not result in a significant additional adverse impact on the operation of the surrounding highway network including site access junctions in comparison with the existing case. As previously mentioned, it should be noted that any residual highway impacts generated by the school occur over short periods with impacts in the PM period generally occurring outside of the network peak period.

The school will implement mitigation measures through the School Travel Plan to encourage students and parents to share the journey to the school with other students as far as possible, encourage park and walk and encourage increased levels of walking and cycling for those living within a reasonable distance.

7.6 Parking Impact

The school car park will be expanded, reorganised and rationalised with provision for disabled spaces, car sharing and EV parking. As there is no increase in staff numbers, proposed expansion and rationalisation of car park will reduce the need for staff to use Peele Leisure Centre car park and its overflow car park.

The provision of significantly more accessible parking spaces, both for cars and minibuses, outside the main school entrance will represent a significant improvement on the existing case for users of the site requiring these facilities.

7.7 Road Safety

The proposal is expected to generate an increase in pedestrian demand by 5 above the current demand. As described in the above sections, an increase of 4 vehicle trips is predicted to be generated by students in the morning and afternoon school peak periods respectively.

A review of the PIA data indicated that three accidents with a "slight" severity level occurred in close proximity to the site. Based on the date and location of these accidents, it is determined that each incident is isolated and does not suggest a recurring pattern. Consequently, it is concluded that the area surrounding the site does not exhibit a consistent accident problem related to the geometric layout of the highway.

The site visit identified that the footways in the area are generally wide for the level of demand and low trafficked road offer ample opportunities to cross the roads safely during peak periods. The local footway and road networks are considered safe. Local road safety is not expected to be materially impacted due to minor increase in demand for student travel once demand is distributed across the many routes available.

Regardless of the above, to mitigate any residual risk of accidents, due to the increased student numbers, it is proposed that road safety mitigation measures will be implemented in the School Travel Plan and are outlined in section 5.9.

7.8 Conclusion

The proposed redevelopment of the school is anticipated to result in a small number of additional car and bus trips, with pedestrian and cycling trips being impacted to a lesser extent. Trips related to parent drop-off and collection activities are expected to be managed within the loop road. A dedicated bus drop-off area provides essential additional capacity to reduce the congestion on Little London.

Regarding pedestrian trips, on-site observations suggest that these can be accommodated within the existing footway. The proposed redevelopment is not expected to significantly affect existing desire lines. Given the rural location, low-traffic routes create a safe and convenient environment for local cyclists. Nevertheless, it is recognized that certain barriers exist, and it is recommended to implement mitigation measures, particularly addressing attitudes toward cycling through the School Transport Plan.

8. Summary and Conclusions

8.1 Summary

University Academy is a secondary school currently attended by 721 students and 103 FTE staff members. The proposal is seeking to expand capacity of the school by 30 additional student places. No increase in staff is expected as a result of the proposal.

The area surrounding the school has a comprehensive footway network and provides good permeability through the area. Pedestrian facilities are well used and all routes cope well with existing demand for the school based on site observations.

The area surrounding the school has limited cycle facilities, but the rural location and low trafficked routes provide a safe environment for cycling. The site is served by local bus services and eight dedicated school buses.

Traffic, parking and road safety conditions are typical of routes close to schools in rural areas. Demand from the school causes noticeable effects with congestion on Little London particularly in the AM peak when buses set down students on the loop road in the morning peak.

Analysis of PIA data for the most recent five-year period shows that three accidents occurred close to the site with a “slight” severity level, given the location and date of accidents it is concluded that there is no accident problem in the area caused by the existing highway layout.

The proposed redevelopment does not seek to substantially change the access and servicing arrangements of the school. A new building is proposed but access arrangements would remain unchanged. Car parking will be reorganised to accommodate additional accessible parking EVCP spaces. Standard car parking is being rationalised to accommodate these proposals, which is considered beneficial from the perspective of improving the transport sustainability of the site. Overall, on site parking provision would increase from 58 to 64.

Provision of new separate bus and parent drop-off/pick-up facilities will significantly improve the efficiency of drop off and pickups during school peak hours. The new layout and footway arrangement will prevent conflict between students and vehicle further improving safety and convenience as well as reducing delay and congestion.

The development accords with transport planning policies which seeks to locate development where it is accessible by walking, cycling and public transport and increased transport sustainability can be promoted.

Student and staff travel behaviour surveys were undertaken in December 2023. A review of the survey results showed that the majority of students travel by bus and on foot, and only 24% by car, including car sharing. The school currently generates a total of 74 student car trips in the morning and afternoon school peak periods. Following the school redevelopment, it is anticipated that additional 3 car trips will be generated by students in school peak periods.

Data for staff showed that 94% travel by car, including car sharing and currently generate demand for 97 parking spaces. There is no change in travel and parking demand for staff as a result of proposed school redevelopment. The proposed increase and rationalisation of parking is expected to result in a reduction in the use of the Peele Leisure Centre car park as an overflow car park for staff and visitors.

The effects of the development amount to a low amount of additional bus and vehicle trips, and to a lesser extent additional pedestrian, and cycle trips. With regard to pedestrian trips based on site visit observations it is considered that these are expected to be accommodated within the capacity of the existing footway network. Pedestrian desire lines are not expected to be materially affected by the proposals. Trips on bus and parking demand for drop-off and collection can be accommodated within the proposed new bus drop off and parent drop off lane/area.

The School has produced a Travel Plan to support the planning application. The Travel Plan outlines a number of measures and targets adopted by the school to reduce car use and promote sustainable travel to the site.

8.2 Conclusion

The additional number of students that could attend the school following the implementation of the development proposals is expected to have a negligible adverse impact on the transport networks compared to the existing situation.

The mitigation measures proposed in the design of the site proposals along with the measures proposed in the School Travel Plan is expected to reduce the impact of the existing site operations.

The proposals therefore considered to represent an overall benefit to the school and the local community.

Appendices

Appendix A

Proposed Site Layout



- LEGEND**
- Tarmac [Vehicular Grade]
 - Tarmac [Pedestrian Grade - allowance for maintenance & emergency vehicle access]
 - Permeable Tarmac [Pedestrian Grade - allowance for maintenance & emergency vehicle access]
 - Block/Flag Paving Type 1
 - Block/Flag Paving Type 2
 - Block/Flag Paving Type 3
 - Concrete Hardstanding [to bin store enclosure, LPG & ASHP]
 - Porous Macadam Surfacing to MUGA [markings 3x Netball & Tennis]
 - Bin Store Timber Enclosure with matching lockable gates [Concrete Base]
 - Solar PV Canopy [268m²]
 - External Canopy [108m²]
 - Handrails (1.2mm High)
 - Low Side Wall to Steps
 - 2.4m High Weldmesh Security Fencing [with matching lockable gates where necessary]
 - 3.0m High Games Court Fencing [with matching lockable gates where necessary]
 - 1.8m High Timber Closeboard Fence [with matching lockable gates where necessary]
 - 1.2m High Timber Fence [with matching lockable gates where necessary]
 - 1.0m High Pedestrian Guard Rail
 - Existing Fence & Gates Retained
 - Sports Pitches
 - Amenity Grass
 - Species Rich Grassland
 - Flower Rich Perennial Planting
 - Native Structure Planting
 - Native Hedge Planting
 - Rain Garden / Bio-Retention
 - Proposed Standard Trees
 - Existing Trees To Be Retained [within and/or overhanging site boundary]
 - Existing Trees To Be Removed
 - Existing Spot Height
 - Outline Proposed Spot Height [Footpath]
 - Outline Proposed Spot Height [Carriageway]
 - Accessible Parking Bay [8no.]
 - Electric Vehicle Bay [2no.]
 - Electric Vehicle Charge Point [1no.]
 - Vehicle Bollard

NOTES:
Proposed steps and path sloped to be fitted with handrails. Defer to Security Strategy and Urban Greening

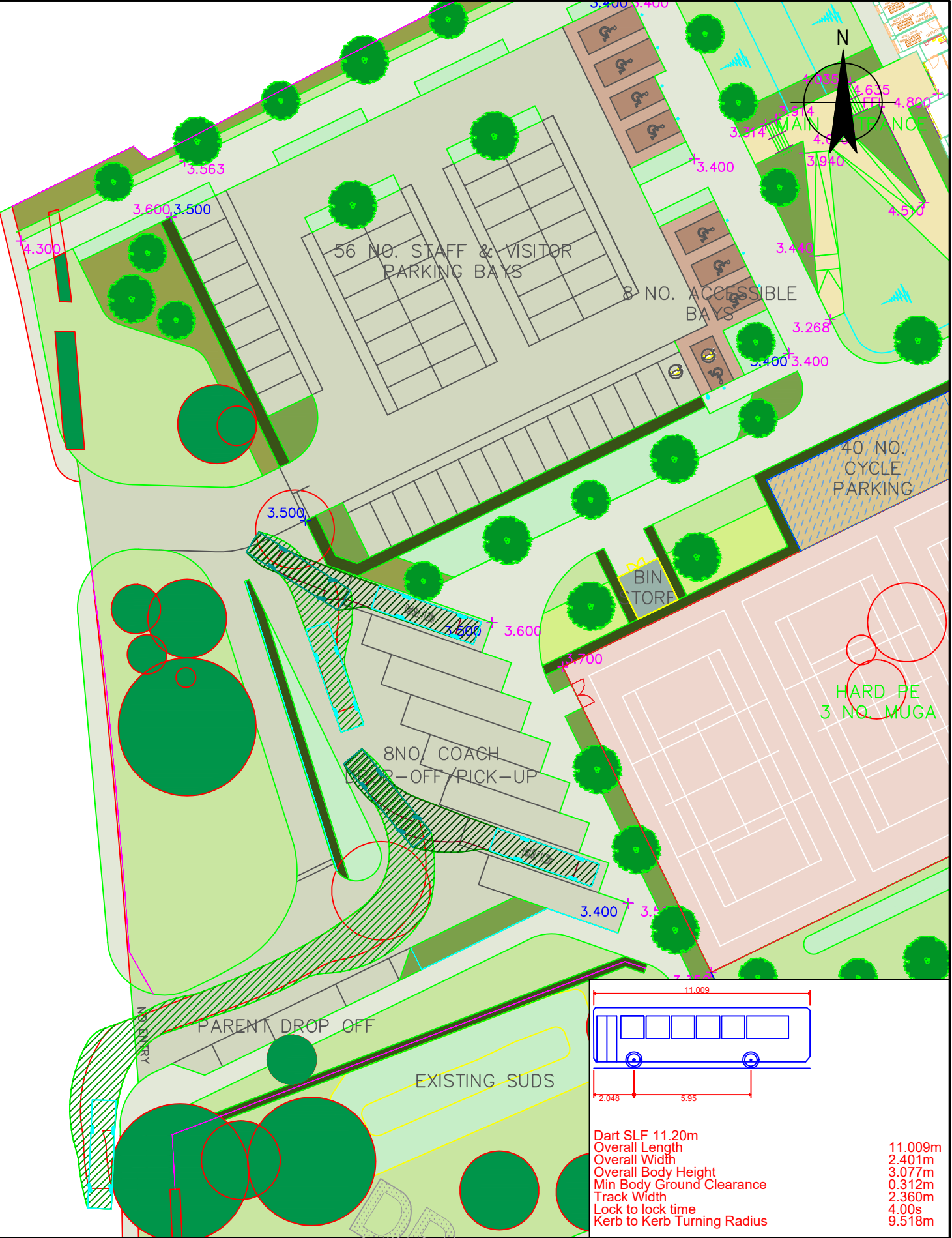
Factor plan. Defer to building bulletin 103 plan.
Existing external furniture i.e seats, benches and litter bins scheme subject to suitability.

NOTES	REVISION P04 DATE 08.01.24 BY KP CHECKED JE	REVISION P01 DATE 04.12.23 BY YL CHECKED JE	CLIENT Bowmer + Kirkland PROJECT University Academy Long Sutton DRAWING TITLE Whole Site Plan DRAWING No. SRP1155-ONE-ZZ-ZZ-D-L-0003 REVISION P06 STATUS PRELIMINARY SCALE 1:500 @ A0 DATE 04.12.23 DRAWN BY YL
	Updated in accordance with CEM4 feedback	First issue	
	REVISION P05 DATE 16.01.24 BY KP CHECKED JE	REVISION P02 DATE 11.12.23 BY YL CHECKED JE	
	Updated in accordance with CEM5 feedback	Updated in accordance with comments received	
	REVISION P06 DATE 23.01.24 BY KP CHECKED JE	REVISION P03 DATE 19.12.23 BY KP CHECKED JE	
	Updated in accordance with comments received	Updated in accordance with CEM3 feedback	

SAILORS BETHEL, HORATIO STREET NEWCASTLE UPON TYNE, NE1 2PE | WWW.ONE-ENVIRONMENTS.CO.UK

Appendix B

Swept Path Analyses: Vehicle access and parking



NOTES: DO NOT SCALE FROM THIS DRAWING

1. VEHICLE TRACKING FOR DISCUSSION ONLY. IT DOES NOT TAKE INTO ACCOUNT OBSTACLES SUCH AS KERBLINES WHICH ARE TO BE ASSESSED DURING THE DESIGN.

GHD

1st Floor, 1 Farnham Road,
Guildford, GU2 4RG,
United Kingdom
T +44 (0)20 3077 7986
E UKmail@ghd.com
W www.ghd.com

Gutteridge Haskins & Davey Limited

Conditions of Use: This document may only be used by GHD's client (and any other person who GHD has agreed can use this document) for the purpose for which it was prepared and must not be used by any other person or for any other purpose.

Project No.
xxxxxxxxxxxxxxxxxxxx

Client
BOWMER AND KIRKLAND LTD

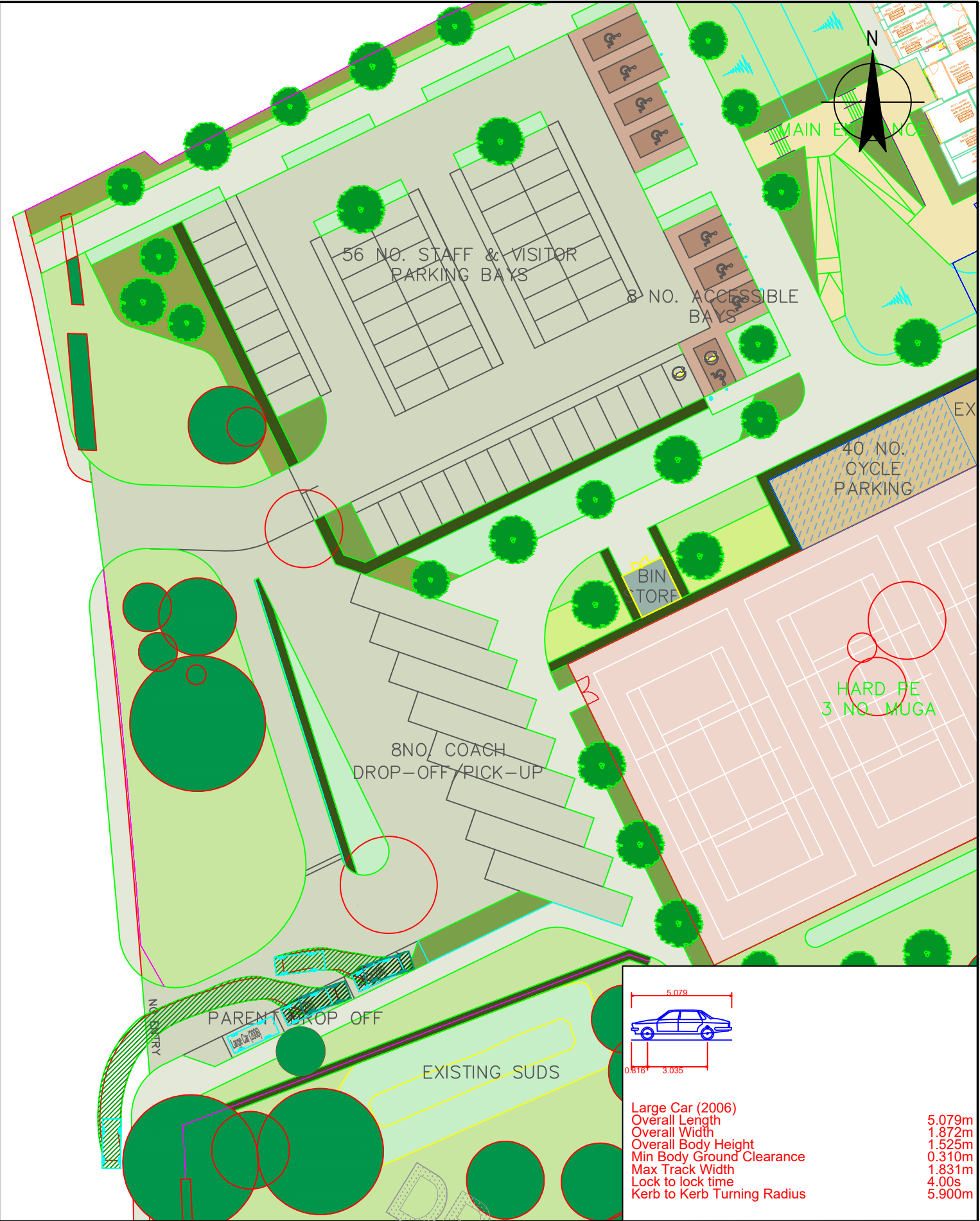
Project
UNIVERSITY ACADEMY LONG SUTTON

Drawing Title
BUS SWEEP PATH ANALYSIS

Drawing No.
N1356-ONE-ZZ-XX-M2-L-0001_Site

Size
A3

Rev
P01



NOTES: DO NOT SCALE FROM THIS DRAWING

1. VEHICLE TRACKING FOR DISCUSSION ONLY. IT DOES NOT TAKE INTO ACCOUNT OBSTACLES SUCH AS KERBLINES WHICH ARE TO BE ASSESSED DURING THE DESIGN.

GHD

1st Floor, 1 Farnham Road,
Guildford, GU2 4RG,
United Kingdom
T 44 (0)20 3077 7986
E UKEmail@ghd.com
W www.ghd.com

Gutteridge Haskins & Davey Limited
Conditions of Use: This document may only be used by GHD's client (and any other person who GHD has agreed can use this document) for the purpose for which it was prepared and must not be used by any other person or for any other purpose.

Project No.
xxxxxxxxxxxxxxxxxxxx

Client
BOWMER AND KIRKLAND LTD

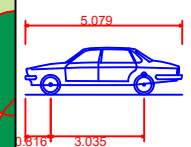
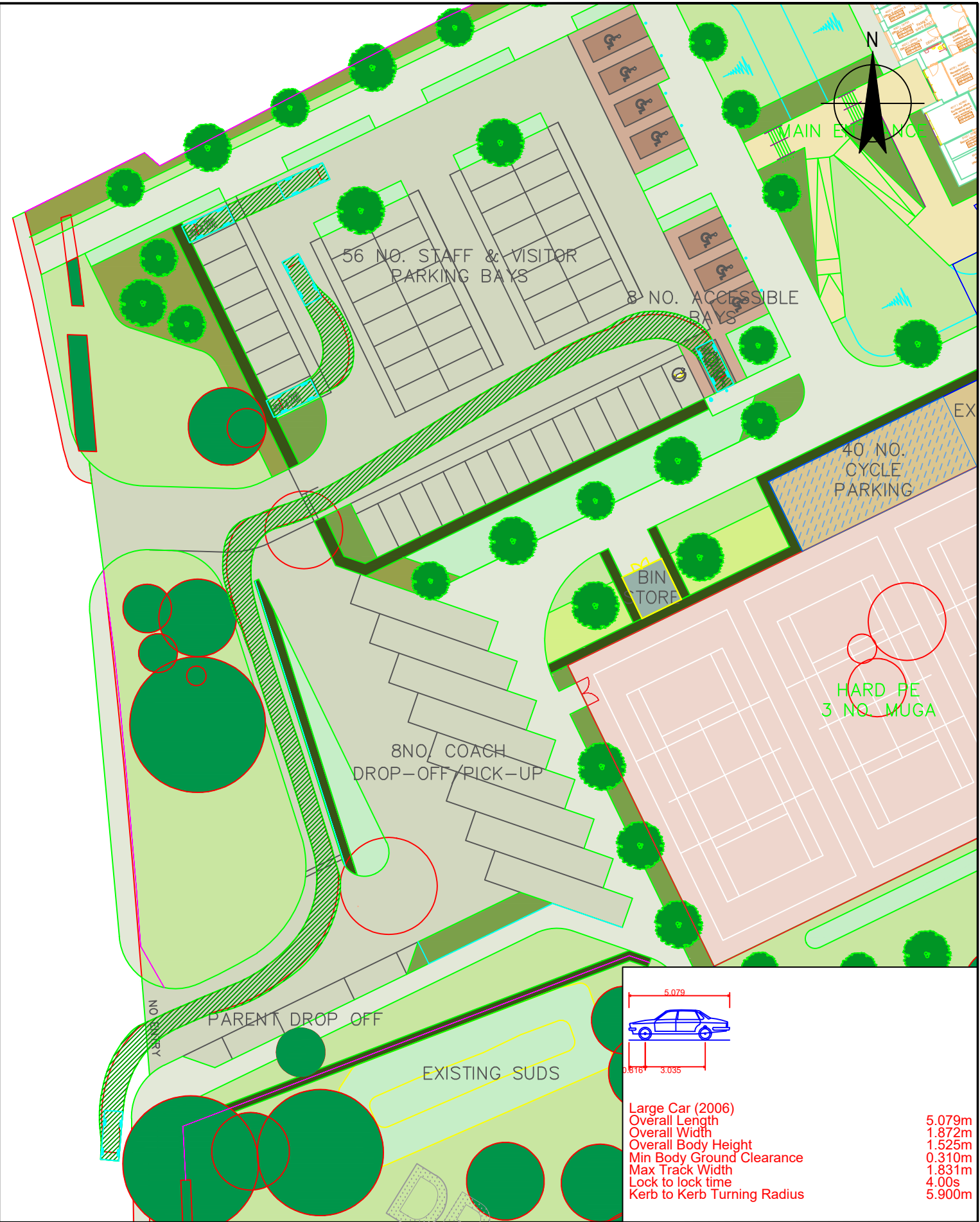
Project
UNIVERSITY ACADEMY LONG SUTTON

Drawing Title
**LARGE CAR SWEEP
PATH ANALYSIS**

Drawing No.
N1356-ONE-ZZ-XX-M2-L-0001_Site

Size
A3

Rev
P01



Large Car (2006)	5.079m
Overall Length	1.872m
Overall Width	1.525m
Overall Body Height	0.310m
Min Body Ground Clearance	1.831m
Max Track Width	4.00s
Lock to lock time	5.900m
Kerb to kerb Turning Radius	

NOTES: DO NOT SCALE FROM THIS DRAWING

1. VEHICLE TRACKING FOR DISCUSSION ONLY. IT DOES NOT TAKE INTO ACCOUNT OBSTACLES SUCH AS KERBLINES WHICH ARE TO BE ASSESSED DURING THE DESIGN.



1st Floor, 1 Farnham Road,
Guildford, GU2 4RG,
United Kingdom
T 44 (0)20 3077 7986
E UKmail@ghd.com
W www.ghd.com



www.ghd.com

Gutteridge Haskins & Davey Limited

Conditions of Use: This document may only be used by GHD's client (and any other person who GHD has agreed can use this document) for the purpose for which it was prepared and must not be used by any other person or for any other purpose.

Project No. xxxxxxxxxxxxxxxxxxxxxx

Client

BOWMER AND KIRKLAND LTD

Project

UNIVERSITY ACADEMY LONG SUTTON

Drawing Title

LARGE CAR SWEEP
PATH ANALYSIS

Drawing No.

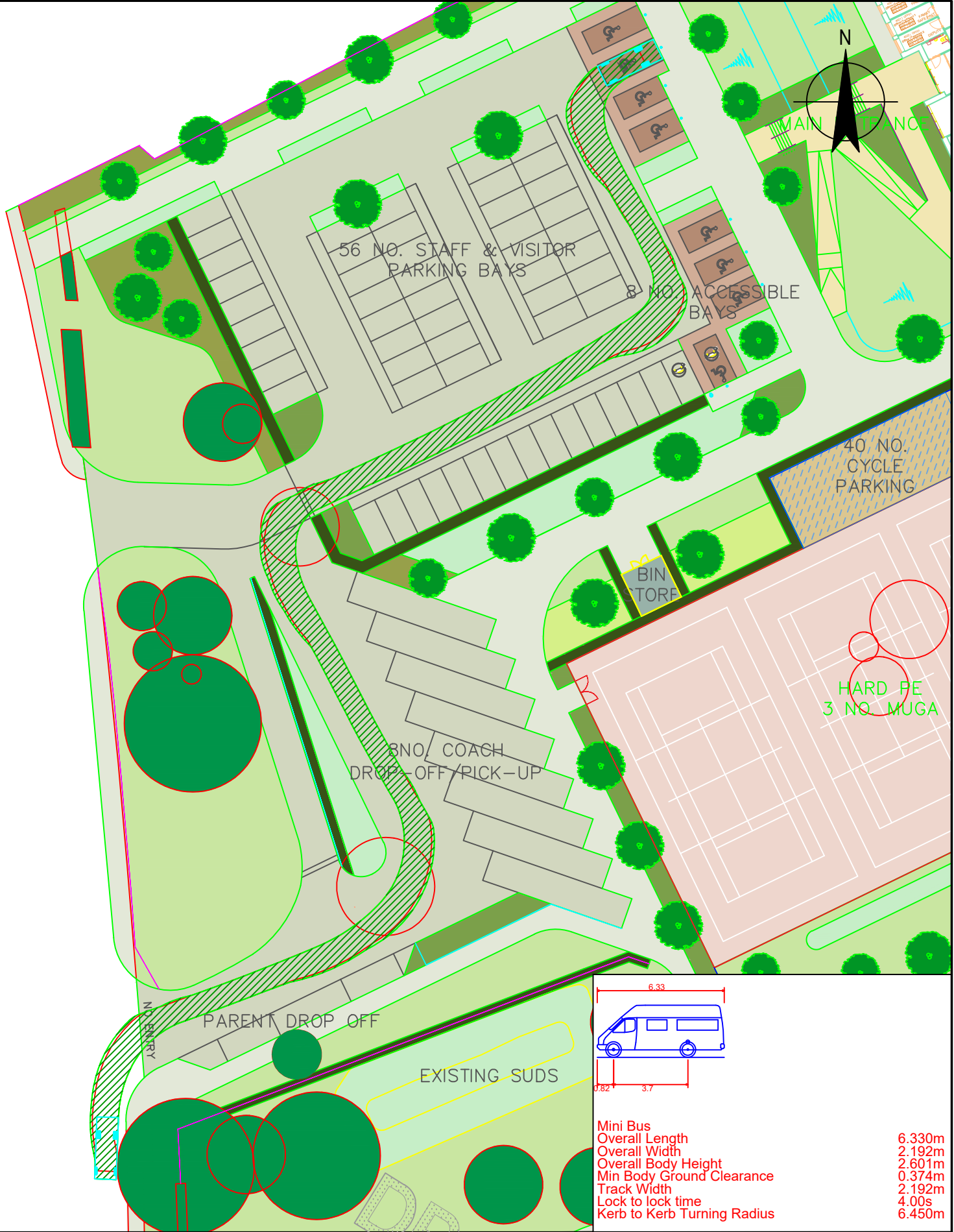
N1356-ONE-ZZ-XX-M2-L-0001_Site

Size

A3

Rev

P01



NOTES: DO NOT SCALE FROM THIS DRAWING

1. VEHICLE TRACKING FOR DISCUSSION ONLY. IT DOES NOT TAKE INTO ACCOUNT OBSTACLES SUCH AS KERBLINES WHICH ARE TO BE ASSESSED DURING THE DESIGN.



1st Floor, 1 Farnham Road,
Guildford, GU2 4RG,
United Kingdom
T 44 (0)20 3077 7986
E UKmail@ghd.com
W www.ghd.com



www.ghd.com

Gutteridge Haskins & Davey Limited

Conditions of Use: This document may only be used by GHD's client (and any other person who GHD has agreed can use this document) for the purpose for which it was prepared and must not be used by any other person or for any other purpose.

Project No. xxxxxxxxxxxxxxxxxxxx

Client

BOWMER AND KIRKLAND LTD

Project

UNIVERSITY ACADEMY LONG SUTTON

Drawing Title

MINI BUS SWEPT PATH ANALYSIS

Drawing No.

N1356-ONE-ZZ-XX-M2-L-0001_Site

Size

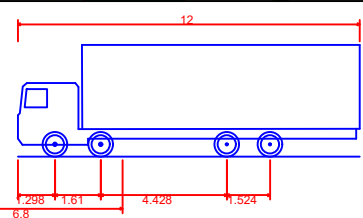
A3

Rev

P01

Appendix C

**Swept Path Analyses: Service, delivery
and emergency vehicles**



Rigid Truck	12.000m
Overall Length	2.500m
Overall Width	3.928m
Overall Body Height	0.412m
Min Body Ground Clearance	2.471m
Track Width	6.00s
Lock to lock time	11.900m
Kerb to Kerb Turning Radius	

NOTES: DO NOT SCALE FROM THIS DRAWING

1. VEHICLE TRACKING FOR DISCUSSION ONLY. IT DOES NOT TAKE INTO ACCOUNT OBSTACLES SUCH AS STATS AND KERBLINES WHICH ARE TO BE ASSESSED DURING THE DESIGN.

1st Floor, 1 Farnham Road,
Guildford, GU2 4RG,
United Kingdom
T 44 (0)20 3077 7986
E UKmail@ghd.com
W www.ghd.com

Gutteridge Haskins & Davey Limited
Conditions of Use: This document may only be used by GHD's client (and any other person who GHD has agreed can use this document) for the purpose for which it was prepared and must not be used by any other person or for any other purpose.

Project No.
xxxxxxxxxxxxxxxxxxxx

Client
BOWMER AND KIRKLAND LTD

Project
UNIVERSITY ACADEMY LONG SUTTON

Drawing Title
**12M RIGID TRUCK
SWEEP PATH
ANALYSIS**

Drawing No.
N1356-ONE-ZZ-XX-M2-L-0001_Site

Size
A3

Rev
P01



NOTES: DO NOT SCALE FROM THIS DRAWING

1. VEHICLE TRACKING FOR DISCUSSION ONLY. IT DOES NOT TAKE INTO ACCOUNT OBSTACLES SUCH AS STATS AND KERBLINES WHICH ARE TO BE ASSESSED DURING THE DESIGN.



1st Floor, 1 Farnham Road,
Guildford, GU2 4RG,
United Kingdom
T 44 (0)20 3077 7986
E UKmail@ghd.com
W www.ghd.com



www.ghd.com

Client
BOWMER AND KIRKLAND LTD

Project
UNIVERSITY ACADEMY LONG SUTTON

Drawing Title
**REFUSE VEHICLE
SWEEP PATH
ANALYSIS**

Drawing No.
N1356-ONE-ZZ-XX-M2-L-0001_Site

Size
A3

Rev
P01



NOTES: DO NOT SCALE FROM THIS DRAWING

1. VEHICLE TRACKING FOR DISCUSSION ONLY. IT DOES NOT TAKE INTO ACCOUNT OBSTACLES SUCH AS KERBLINES WHICH ARE TO BE ASSESSED DURING THE DESIGN.

1st Floor, 1 Farnham Road,
Guildford, GU2 4RG,
United Kingdom
T 44 (0)20 3077 7986
E UKMail@ghd.com
W www.ghd.com

www.ghd.com

Gutteridge Haskins & Davey Limited

Conditions of Use: This document may only be used by GHD's client (and any other person who GHD has agreed can use this document) for the purpose for which it was prepared and must not be used by any other person or for any other purpose.

Project No.
xxxxxxxxxxxxxxxxxxxxxx

Client
BOWMER AND KIRKLAND LTD

Project
UNIVERSITY ACADEMY LONG SUTTON

Drawing Title
FIRE TENDER
SWEEP PATH
ANALYSIS - ENTRY

Drawing No.
N1356-ONE-ZZ-XX-M2-L-0001_Site

Size
A3

Rev
P01



NOTES: DO NOT SCALE FROM THIS DRAWING

1. VEHICLE TRACKING FOR DISCUSSION ONLY. IT DOES NOT TAKE INTO ACCOUNT OBSTACLES SUCH AS KERBLINES WHICH ARE TO BE ASSESSED DURING THE DESIGN.

1st Floor, 1 Farnham Road,
Guildford, GU2 4RG,
United Kingdom
T +44 (0)20 3077 7986
E UKMail@ghd.com
W www.ghd.com

Gutteridge Haskins & Davey Limited
Conditions of Use: This document may only be used by GHD's client (and any other person who GHD has agreed can use this document) for the purpose for which it was prepared and must not be used by any other person or for any other purpose.

Project No.
xxxxxxxxxxxxxxxxxxxx

Client
BOWMER AND KIRKLAND LTD

Project
UNIVERSITY ACADEMY LONG SUTTON

Drawing Title
**FIRE TENDER
SWEEP PATH
ANALYSIS - EXIT**

Drawing No.
N1356-ONE-ZZ-XX-M2-L-0001_Site

Size
A3

Rev
P01



NOTES: DO NOT SCALE FROM THIS DRAWING

1. VEHICLE TRACKING FOR DISCUSSION ONLY. IT DOES NOT TAKE INTO ACCOUNT OBSTACLES SUCH AS KERBLINES WHICH ARE TO BE ASSESSED DURING THE DESIGN.



1st Floor, 1 Farnham Road,
Guildford, GU2 4RG,
United Kingdom
T 44 (0)20 3077 7986
E UKmail@ghd.com
W www.ghd.com



www.ghd.com

Gutteridge Haskins & Davey Limited

Conditions of Use: This document may only be used by GHD's client (and any other person who GHD has agreed can use this document) for the purpose for which it was prepared and must not be used by any other person or for any other purpose.

Project No.
xxxxxxxxxxxxxxxxxxxxxx

Client

BOWMER AND KIRKLAND LTD

Project

UNIVERSITY ACADEMY LONG SUTTON

Drawing Title

**VEHICLE FIRE TENDER
SWEEP PATH
ANALYSIS**

Drawing No.

N1356-ONE-ZZ-XX-M2-L-0001_Site

Size

A3

Rev

P01



NOTES: DO NOT SCALE FROM THIS DRAWING

1. VEHICLE TRACKING FOR DISCUSSION ONLY. IT DOES NOT TAKE INTO ACCOUNT OBSTACLES SUCH AS KERBLINES WHICH ARE TO BE ASSESSED DURING THE DESIGN.

GHD

1st Floor, 1 Farnham Road,
Guildford, GU2 4RG,
United Kingdom
T +44 (0)20 3077 7986
E UKMail@ghd.com
W www.ghd.com

Gutteridge Haskins & Davey Limited

Conditions of Use: This document may only be used by GHD's client (and any other person who GHD has agreed can use this document) for the purpose for which it was prepared and must not be used by any other person or for any other purpose.

Project No. xxxxxxxxxxxxxxxxxxxxxx

Client

BOWMER AND KIRKLAND LTD

Project

UNIVERSITY ACADEMY LONG SUTTON

Drawing Title

**AMBULANCE
SWEEP PATH
ANALYSIS - ENTRY**

Drawing No.

N1356-ONE-ZZ-XX-M2-L-0001_Site

Size

A3

Rev

P01



NOTES: DO NOT SCALE FROM THIS DRAWING

1. VEHICLE TRACKING FOR DISCUSSION ONLY. IT DOES NOT TAKE INTO ACCOUNT OBSTACLES SUCH AS KERBLINES WHICH ARE TO BE ASSESSED DURING THE DESIGN.



1st Floor, 1 Farnham Road,
Guildford, GU2 4RG,
United Kingdom
T +44 (0)20 3077 7986
E UKmail@ghd.com
W www.ghd.com



www.ghd.com

Gutteridge Haskins & Davey Limited

Conditions of Use: This document may only be used by GHD's client (and any other person who GHD has agreed can use this document) for the purpose for which it was prepared and must not be used by any other person or for any other purpose.

Project No. xxxxxxxxxxxxxxxxxxxxxx

Client

BOWMER AND KIRKLAND LTD

Project

UNIVERSITY ACADEMY LONG SUTTON

Drawing Title

**AMBULANCE
SWEEP PATH
ANALYSIS - EXIT**

Drawing No.

N1356-ONE-ZZ-XX-M2-L-0001_Site

Size

A3

Rev

P01



ghd.com

→ **The Power of Commitment**