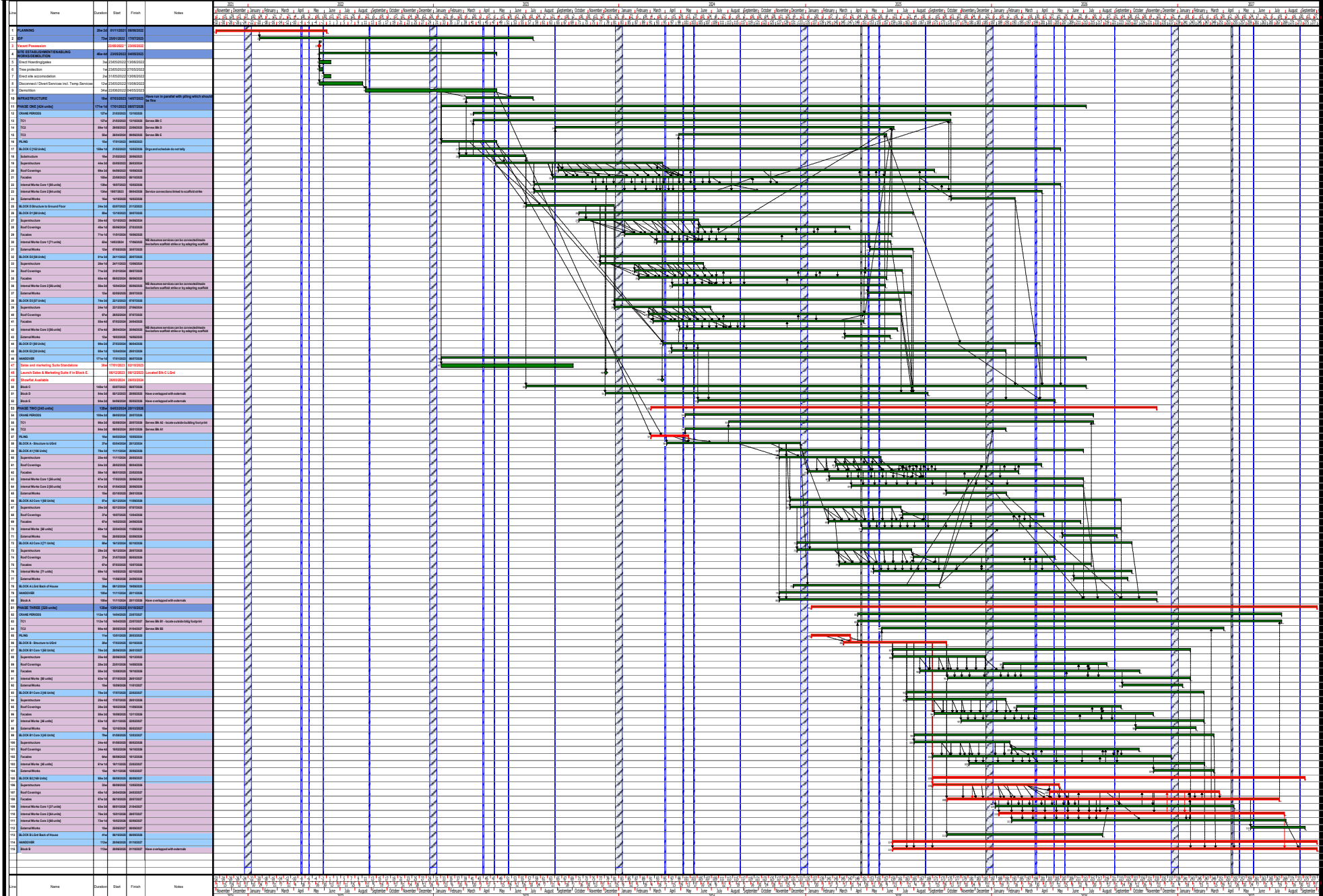


APPENDIX B

CONSTRUCTION PROGRAMME





Programme No. : LSq/Hy/PCP-001

Revision: 19

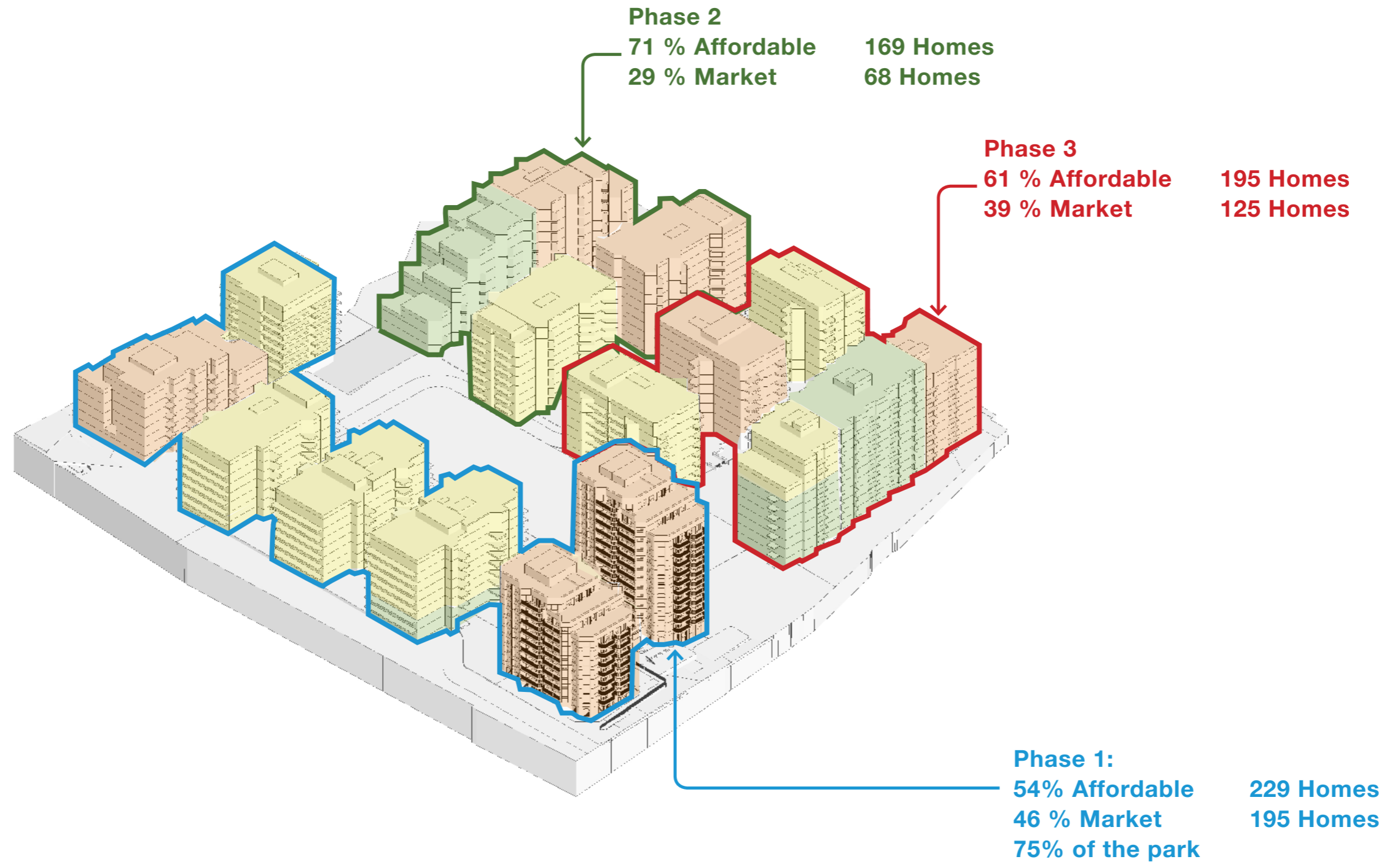
Updated on: 03/08/2021

Notes : Based on revised scheme Jan 21

TENURE AND PHASING

The scheme design is tenure blind

- Majority affordable housing in each phase
- Women's building & Older persons & 75% of park in phases one



Key

-  Social Rent
-  Shared Ownership
-  Market

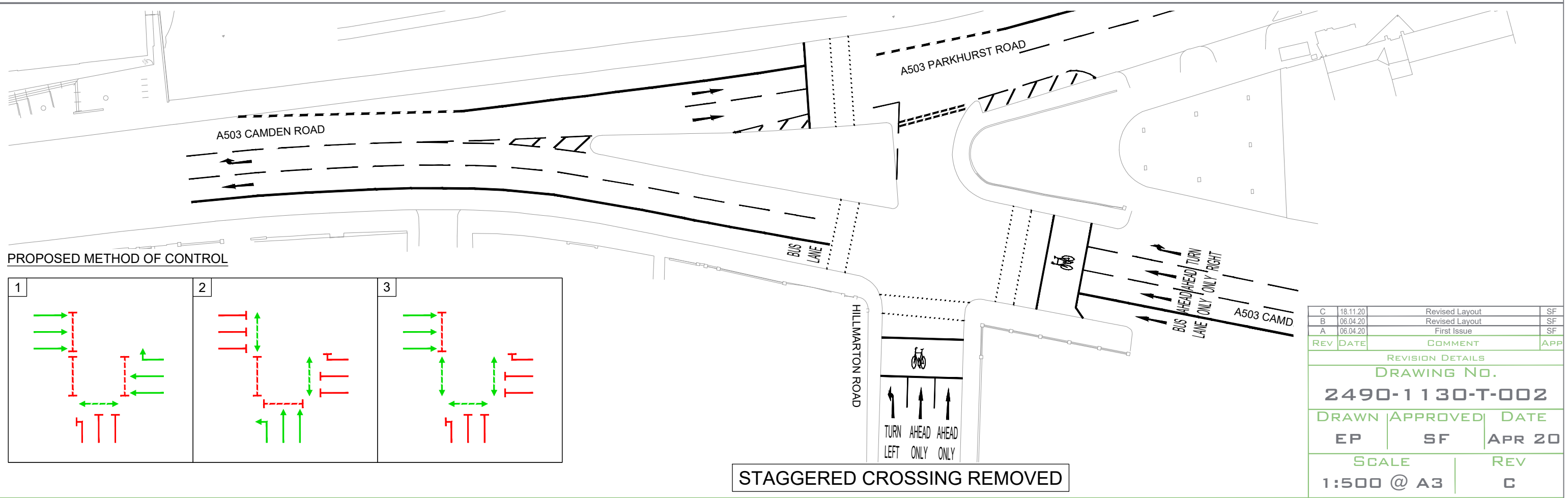
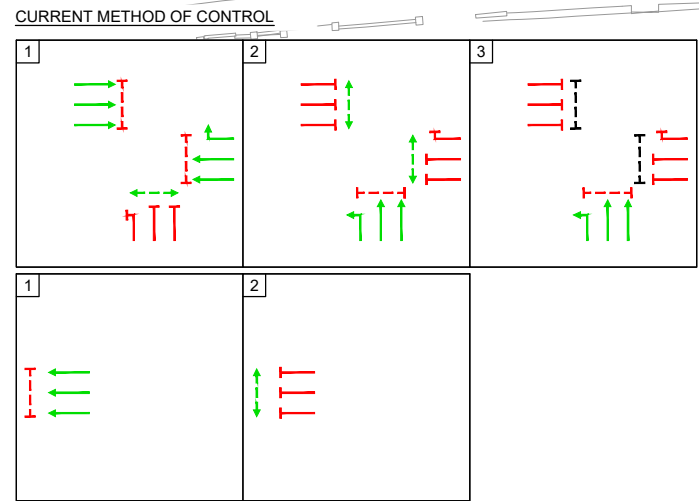
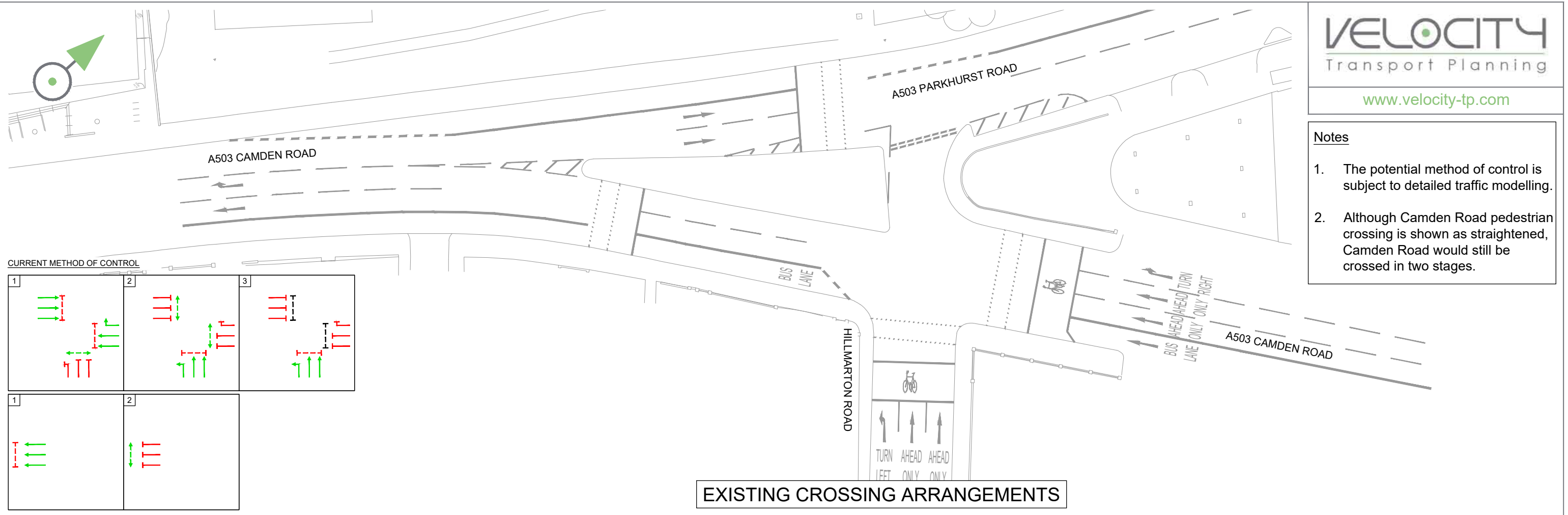
APPENDIX C

LINSIG MODELLING AUDIT PROCESS



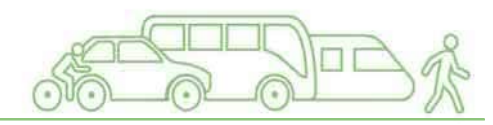
Notes

1. The potential method of control is subject to detailed traffic modelling.
2. Although Camden Road pedestrian crossing is shown as straightened, Camden Road would still be crossed in two stages.



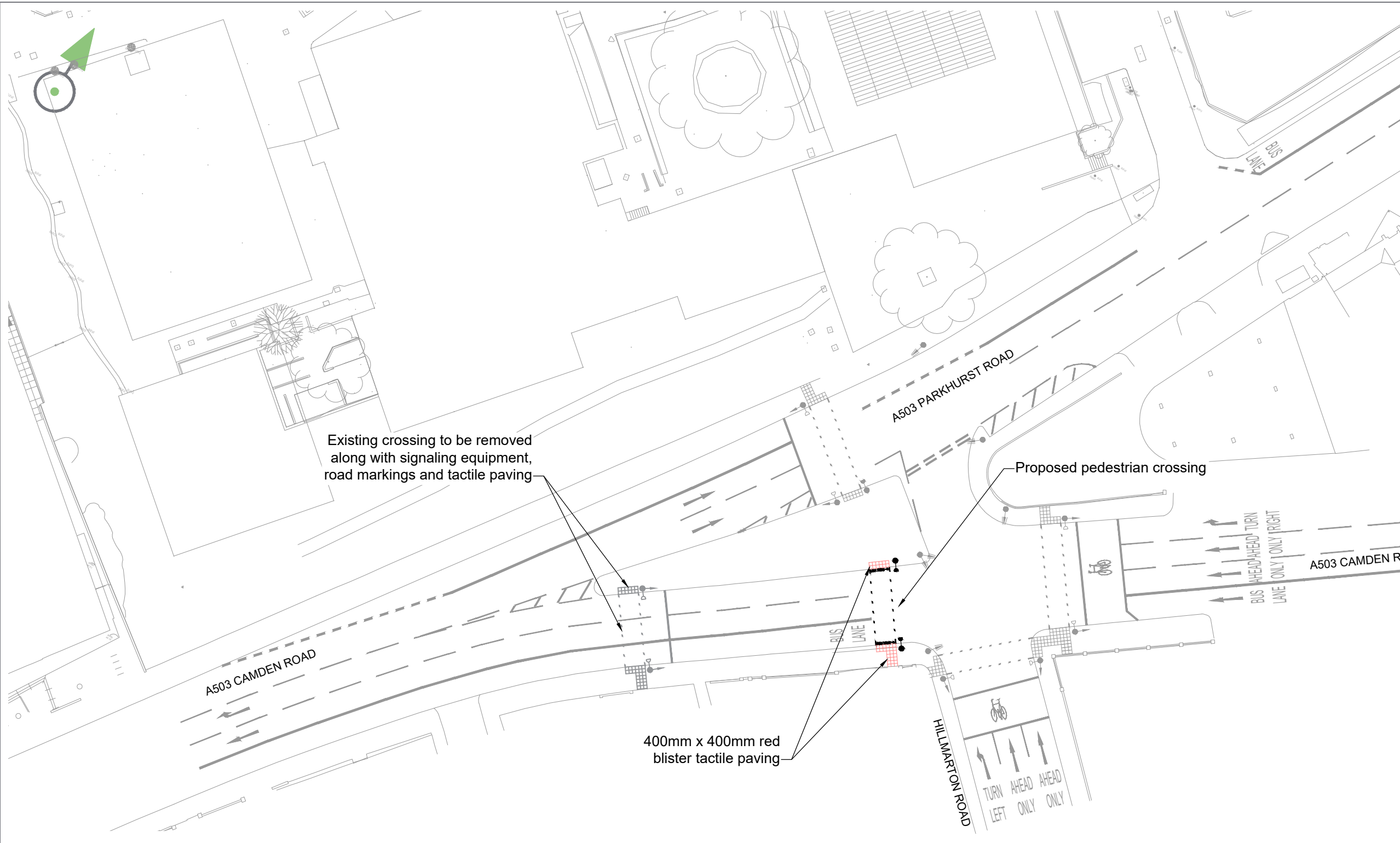
REV	DATE	COMMENT	APP
C	18.11.20	Revised Layout	SF
B	06.04.20	Revised Layout	SF
A	06.04.20	First Issue	SF

REVISION DETAILS		
DRAWING NO.		
2490-1 130-T-002		
DRAWN	APPROVED	DATE
EP	SF	APR 20
SCALE		REV
1:500 @ A3		C

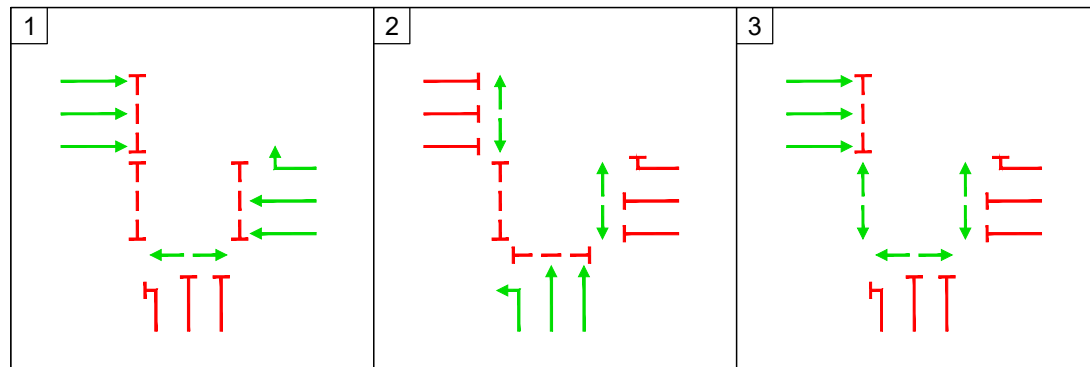


Notes

1. The potential method of control is subject to detailed traffic modelling.
2. Although Camden Road pedestrian crossing is shown as straightened, Camden Road would still be crossed in two stages.



PROPOSED METHOD OF CONTROL



REV	DATE	COMMENT	APP
A	10.08.21	First Issue	SF

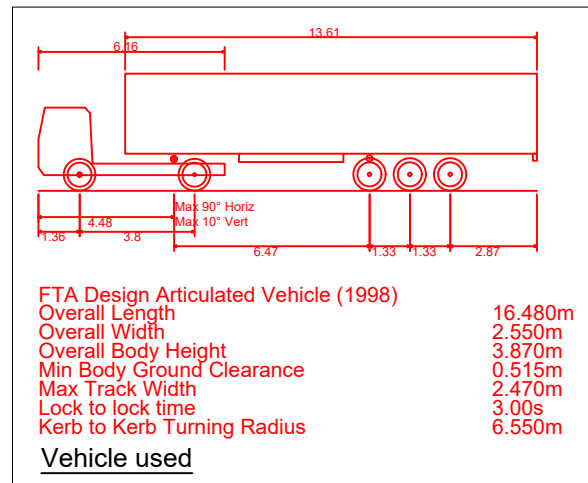
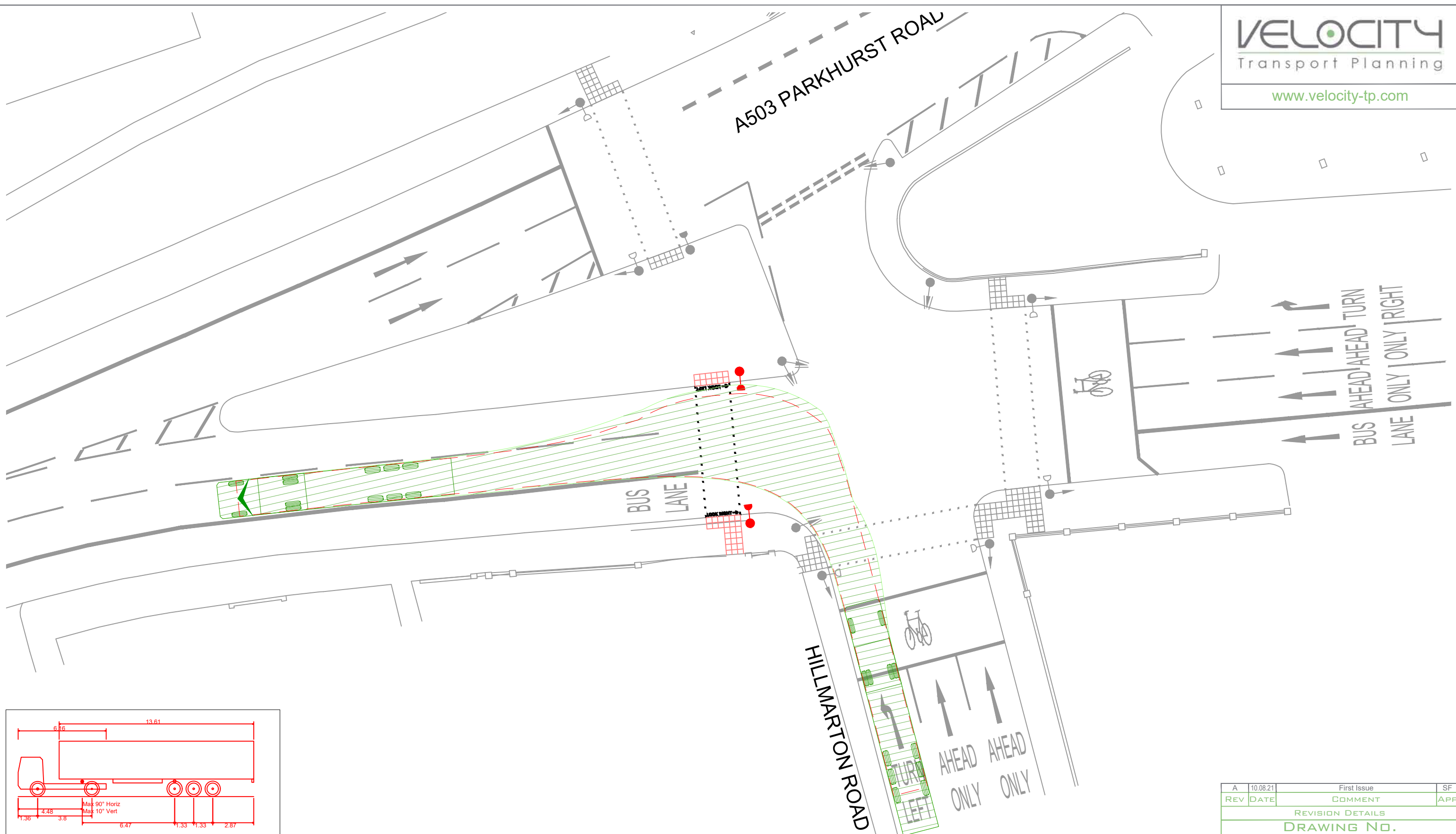
REVISION DETAILS

DRAWING NO.
2490-1130-T-021

DRAWN	APPROVED	DATE
TC	SF	AUG 21

SCALE	REV
1:500 @ A3	A



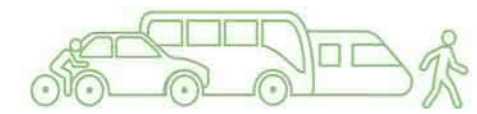


A	10.08.21	First Issue	SF
REV	DATE	COMMENT	APP
REVISION DETAILS			
DRAWING NO.			
2490-1130-T-022			
DRAWN	APPROVED	DATE	
TC	SF	AUG 21	
SCALE		REV	
1:250 @ A3		A	

CLIENT
PEABODY

PROJECT
HOLLOWAY PRISON

DRAWING TITLE
SWEPT PATH ANALYSIS OF A 16.5M ARTICULATED VEHICLE - PROPOSED TRAFFIC SIGNAL JUNCTION LAYOUT



Milena Lipska

From: Korzeniowski David <DavidKorzeniowski@tfl.gov.uk>
Sent: 02 December 2020 11:00
To: Milena Lipska; Miklasz Michal
Cc: Siddharth Iyer
Subject: RE: Developer Model Audit – Holloway Prison LMAP S4-5

[EXTERNAL] This message was sent from outside your organization

Hi Milena,

Thanks for the updated models. I can confirm that they are fit for purpose for comparing your proposed scenarios with the cordoned base model.

Please be aware that this does not constitute an acceptance of the level of network impact, changes to layout or design/operation of traffic signals.

Kind regards,

Dave Korzeniowski

Principal Network Manager

Network Performance – Delivery – North East Team

 TRANSPORT FOR LONDON

Surface Transport | Network Management Directorate

Palestra House | 3rd floor – Zone 3B3 | 197 Blackfriars Road | London SE1 8NJ

Tel: +44 (0) 20 3054 0799 | A: 80799 | E: DavidKorzeniowski@tfl.gov.uk



EVERY JOURNEY MATTERS

From: Milena Lipska <mlipska@velocity-tp.com>
Sent: 01 December 2020 09:54
To: Korzeniowski David <DavidKorzeniowski@tfl.gov.uk>
Cc: Siddharth Iyer <siddharth@iyercl.com>
Subject: RE: Developer Model Audit – Holloway Prison LMAP S4-5

Hi David

Thank you for your comments. We have updated models accordingly and attached associated LinSig formatted reports and a revised summary spreadsheet.

The following changes have been made to v1 models:

- The negative bonus greens have been removed from the future year models.
- 3s phase delay applied to phase G (3>1)
- Cruise times on connectors from Hilmarton Road to Parkhurst Road set to 29 seconds. This is the cumulative cruise time from Himarton Road – Give Way Reservation – Parkhurst Road stop line within the base models received from TfL.

Should you have any questions please let us know.

Regards
Milena

Milena Lipska MSc CEng MCIHT
Associate
Tel: 07392 287 355



Unit A, Taper Studios, The Leather Market, 120 Weston Street, London, SE1 4GS



From: Korzeniowski David <DavidKorzeniowski@tfl.gov.uk>
Sent: 30 November 2020 14:10
To: Milena Lipska <mlipska@velocity-tp.com>
Cc: Siddharth Iyer <siddharth@iyercl.com>
Subject: RE: Developer Model Audit – Holloway Prison LMAP S4-5

[EXTERNAL] This message was sent from outside your organization

Hi Milena,

I have now completed the proposed model checks, and have a few comments from this:

- Negative demand dependency bonus greens should also be removed in the same way that positive demand dependency bonus greens have been. The negative values were applied to stages that were not being demanded 100% of the time, which they will be assumed to be in the proposed scenarios. By doing this, PM peak plans can be amended further to get eastbound DoS to 92.9%, with Hillmarton still being 86.6%. These impacts would be more favourable.
- The new connectors from Hillmarton Road to Parkhurst Road now have incorrect/blank cruise times. The connector from J4:2/2 to J1:1/1 has no cruise time. All cruise times should be reflective of the time to the stoptime at 03/067.
- Phase delay for phase G (3>1) of 3 seconds would provide a small additional benefit to pedestrians.

Please could you review these comments and update the model where appropriate?

Kind regards,

Dave Korzeniowski

Principal Network Manager
Network Performance – Delivery – North East Team



Surface Transport | Network Management Directorate
Palestra House | 3rd floor – Zone 3B3 | 197 Blackfriars Road | London SE1 8NJ
Tel: +44 (0) 20 3054 0799 | A: 80799 | E: DavidKorzeniowski@tfl.gov.uk



EVERY JOURNEY MATTERS

From: Milena Lipska <mlipska@velocity-tp.com>
Sent: 24 November 2020 09:29
To: Korzeniowski David <DavidKorzeniowski@tfl.gov.uk>
Cc: PCAMRequests <PCAMRequests@tfl.gov.uk>; Siddharth Iyer <siddharth@iyercl.com>
Subject: RE: Developer Model Audit – Holloway Prison LMAP S4-5

Dear David

Submission

We have now completed the proposed LinSig Models for the junction of Camden Road with Hillmarton Road and as part of our LMAP-5 submission and attached the following documents:

- LinSig Model for AM;
- LinSig Model for PM;
- Traffic Flow Diagram’s spreadsheet including lane proportions calculation;
- Results Summary spreadsheet for the main comparison parameters (Degree of Saturation, Total Green, Ave Delay/Vehicle, Mean Max Queue and Practical Reserve Capacity);
- The basic results summary report extracted from the associated LinSig Models, and
- General Arrangement drawing.

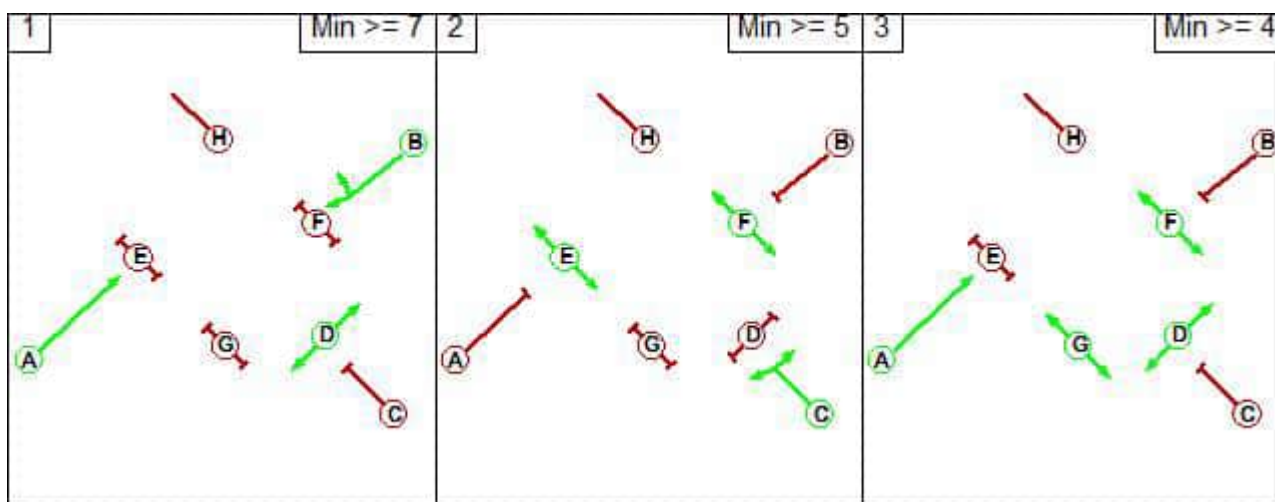
Modelling Scenarios

The following scenarios have been modelled in LinSig:

1. Opening Year 2025 Baseline
2. Opening Year 2025 + Proposed Development
3. Opening Year 2025 + Committed Development + Proposed Development
4. Completion Year 2028 Baseline
5. Completion Year 2028 + Proposed Development
6. Completion Year 2028 + Committed Development + Proposed Development

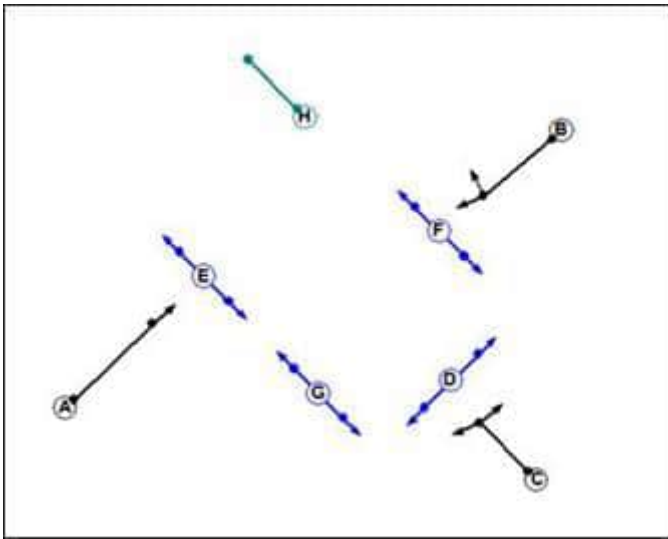
Method of Control

The only highway layout change envisaged in this scenario is the relocation of Camden Road WB exit pedestrian crossing closer to the junction. It is proposed that the pedestrian phase will be incorporated within the main junction controller rather than operating as a stream in the existing scenario. Although the highway layout suggests the pedestrian crossing across Camden Road is straight across, it is presumed that the width of the central island (9m) will allow running the straight across crossing over 2 stages as shown in revised MoC above.



Revised Phasing

Intergreens



	A	B	C	D	E	F	G	H
A	-	-	5	-	5	-	-	3
B	-	-	6	-	-	6	8	3
C	8	6	-	6	-	-	6	3
D	-	-	12	-	-	-	-	5
E	12	-	-	-	-	-	-	5
F	-	13	-	-	-	-	-	6
G	-	10	10	-	-	-	-	-
H	2	2	2	2	2	2	-	-

Items to note

1. The cordoned model structure received from TfL suggests that the movement from Hilmarton Road will give way to Camden Road. This is incorrect and therefore has an impact on the internal queue on the give way reservations links in the model. The future year models have been amended so that the connectors from Hilmarton Road are directly connected to Parkhurst Road exit. As Hilmarton Road and Camden Road movements run in separate stages, this is more appropriate representation of the traffic movements within LinSig.
2. The Southern Access to/from development has been included in the LinSig future year models. The Northern access has been excluded in the modelling as it lies 150m north of the pedestrian crossing across Parkhurst Road and therefore the development trips will be exiting the network and will not have any impact on modelling outputs.
3. The models have been developed using LinSig's lane-based flow option instead of OD matrices. Lane proportions derived from 2018 Baseline models supplied by TfL have been applied to all future year scenarios. Please refer to attached Traffic Flow Diagram spreadsheet for further details on lane proportions.
4. All demand dependent bonus greens have been removed to account for 100% pedestrian demand in future year scenarios. The existing Underutilised Green Times (UGT) and negative demand dependent bonus greens applied to relevant links in the base scenario have been retained in all future year models.

Modelling results

Overall, the initial modelling outputs suggest that the AM peak operates within capacity for all future year scenarios.

There is excess queueing observed in the PM peak. The arm demonstrating a long queue in PM is Arm J1:1 – Parkhurst Road (middle lane). In theory you would expect the queues to be distributed more evenly across the offside and middle lanes but the existing lane proportions have been carried forward in future scenarios in the absence of any additional information. The proportional splits result in a long queue on the middle lane in the Future Baseline Year 2025 and 2028 respectively. The development trips are minimal and as such have no significant impact on the junction operation. A comparison of DoS, MMQ, Total Green, Ave Delay/Vehicle and PRC is provided in attached Results Summary spreadsheet.

Please let us know if you have any questions or require anything else from us as part of this submission.

Regards,
Milena

Milena Lipska MSc CEng MCIHT
Associate
Tel: 07392 287 355



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APPENDIX D

HEALTHY STREETS CHECK FOR DESIGNERS



Healthy Streets Check

		Scoring System				Enter score here		Notes Please supplement your answers with detailed notes where possible	
		3	2	1	0	Existing layout	Proposed layout		
1	Total volume of two way motorised traffic	There are fewer than 500 vehicles per hour at peak.	There are 500 to 1000 vehicles per hour at peak.	There are more than 1000 vehicles per hour at peak, where people cycling are separated from motorised traffic.	There are more than 1000 vehicles per hour at peak, where people cycling are mixed with motorised traffic.		0	0	Traffic counts were provided by TfL (2018 data). There are over 1000 vehicles per peak hour on Parkhurst Road (one-way section) and over 1,500 vehicles on Camden Road (two-way section of road).
2	Interaction between large vehicles and people cycling	No large vehicles are using the street, or cycle traffic is separated from motorised traffic.	The proportion of large vehicles is less than 2% of motorised traffic, 7am to 7pm.	The proportion of large vehicles is 2% to 5% of motorised traffic, 7am to 7pm. <u>or</u> The proportion of large vehicles is greater than 5% of motorised traffic, 7am to 7pm, and people are cycling either: - in a nearside general traffic lane or bus lane at least 4.5m wide, or - in a cycle lane where the combined width of the cycle lane and the next general traffic lane is at least 4.5m.	The proportion of large vehicles is greater than 5% of motorised traffic, 7am to 7pm, and people are cycling either: - in a nearside general traffic lane or bus lane less than 4.5m wide, or - in a cycle lane where the combined width of the cycle lane and the next general traffic lane is less than 4.5m.		1	1	The percentage of HGVs is currently approximately 4% of all traffic on Camden Road and Parkhurst Road. The proportion of heavy vehicles is expected to remain at the same level following the development of the site.
3	Speed of motorised traffic	85th percentile speed is less than 20mph. <u>or</u> Existing 85th percentile speed is 20 to 25 mph, but there are some proposals to reduce speed further. <u>or</u> Existing 85th percentile speed is over 25 mph but a complete redesign of the street environment should reduce this to below 20mph.	85th percentile speed is 20 to 25mph. <u>or</u> Existing 85th percentile speed is 25 to 30 mph, but there are some proposals to reduce speed further.	85th percentile speed is 25 to 30mph. <u>or</u> Existing 85th percentile speed is greater than 30 mph, but there are some proposals to reduce speed further.	85th percentile speed is greater than 30mph. <u>or</u> Existing 85th percentile speed is greater than 30 mph, and there are no proposals to reduce this speed.		1	1	The existing 85th percentile speed on Camden Road and Parkhurst Road is unknown, and the speed limit is 30mph. Due to the frequent signalised junction, pedestrian crossings, speed cameras; vehicles do not exceed the speed limit along this section. There is no proposal to change the current arrangements.
4	Traffic noise based on peak hour motorised traffic volumes	There are fewer than 55 vehicles per hour (c. <58 DB).	There are 55 to 450 vehicles per hour (c. 58-70 DB).	There are more than 450 vehicles per hour (c. >70 DB).	-		3	3	There are currently more than 1,000 vehicles per hour on Camden Road and Parkhurst Road. The development will be car-free and is still not anticipated to generate more than 55 vehicles per hour.
5	Noise from large vehicles	The proportion of large vehicles is less than 5% (c. +0 to +3DB).	The proportion of large vehicles is 5 to 10% (c. +3 to +5 DB).	The proportion of large vehicles is greater than 10% (c. +5 DB and over).	-		3	3	The percentage of HGVs is currently approximately 4% of all traffic on Camden Road and Parkhurst Road. The proportion of heavy vehicles is expected to remain at the same level following the development of the site.

6	NO2 concentration (from London Atmospheric Emission Inventory)	<p>If assessing existing: The NO2 concentration is less than 32µg/m3.</p> <p>If assessing proposal: The existing NO2 concentration is less than 32µg/m3 or the existing concentration is 32 to 40µg/m3 with local traffic volume reduction measures proposed.</p>	<p>If assessing existing: The NO2 concentration is 32 to 40µg/m3.</p> <p>If assessing proposal: The existing NO2 concentration is 32 to 40µg/m3 with no proposal to reduce local traffic volume or the existing NO2 concentration is greater than 40µg/m3 with local traffic volume reduction measures proposed.</p>	<p>If assessing existing: The NO2 concentration is greater than 40µg/m3 (legal limit value).</p> <p>If assessing proposal: The existing NO2 concentration is greater than 40µg/m3 with no proposal to reduce local traffic volume.</p>	-	ⓘ	1	1	The existing NO2 level is above 40 on Camden Road and Parkhurst Road. The proposal is car-free and will have no adverse impact on the current situation.
7	Reducing private car use	There is no through-movement for motorised traffic, with access limited to local residents, deliveries and public service vehicles.	There are some time or movement restrictions for motorised traffic.	There are no access restrictions for motorised traffic.	-	ⓘ	3	3	The site is currently not in use and only authorised vehicles have access to the site. Following the development of the site, access will be limited to deliveries and servicing vehicles and blue badge holders. The site will have no general car park, effectively reducing general traffic movements.
8	Ease of crossing side roads for people walking	Side roads are closed to motor traffic. or Side roads are one-way out for motor vehicles and have features to encourage drivers to turn cautiously.	Side roads are two-way or one-way in for motor vehicles, and have features to encourage drivers to turn cautiously.	Side roads have dropped kerbs only.	Side roads have no dropped kerbs.	ⓘ	1	3	Side roads have dropped kerbs, but no footways. Following the development of the site, the geometry of the junctions will be revised, footways implemented. Furthermore, pedestrian-only access to the public plaza within the development site will also be possible.
9	Mid-link crossings, to meet pedestrian desire lines	All main pedestrian desire lines are provided for with crossings.	Only some of the main pedestrian desire lines are provided for with crossings.	No main pedestrian desire lines are provided for with pedestrian crossings.	-	ⓘ	3	3	
10	Type and suitability of pedestrian crossings away from junctions	<p>Crossing is uncontrolled, with conflicting traffic volume less than 200 vehicles per hour.</p> <p>or</p> <p>A Zebra or parallel crossing is provided.</p> <p>or</p> <p>Crossing is signalised so that people crossing the main carriageway have priority, while traffic on the main carriageway has on-demand green.</p>	<p>Crossing is uncontrolled, with conflicting traffic volume between 200 and 1000 vehicles per hour.</p> <p>or</p> <p>Crossing is signalised and straight-across where the distance to cross is less than 15m or greater than 15m in a 20mph speed limit.</p> <p>or</p> <p>Crossing is signalised and staggered where the distance to cross is greater than 15m in a 30mph+ speed limit.</p>	<p>Crossing is uncontrolled, with conflicting traffic volume greater than 1000 vehicles per hour.</p> <p>or</p> <p>Crossing is signalised and straight-across where the distance to cross is greater than 15m in a 30mph+ speed limit.</p>	-	ⓘ	2	3	The existing staggered crossing on Camden Road is proposed to be re-designed and the stagger removed to reduce the crossing distance and provide facilities that comply with pedestrian desire lines.
11	Technology to optimise efficiency of movement (pedestrians, cyclists, buses and general motor traffic)	All appropriate detection and optimisation technology has been applied to traffic signals.	Some detection and optimisation technology has been applied to traffic signals.	No detection and optimisation technology applied to traffic signals.	-	ⓘ	2	2	

12	Additional features to support people using controlled crossings	Controlled crossings have many additional features to enhance their quality (please see scoring guidance).	Controlled crossings have some additional features to enhance their quality (please see scoring guidance).	Controlled crossings have no additional features to enhance their quality (please see scoring guidance). <u>or</u> There is no step-free access at the crossing point and/or there is no physical delineation between the footway and carriageway away from crossing points.	-	①	2	3	Improvements to the signal crossing point on Camden Road is proposed as part of the proposals
13	Width of clear continuous walking space	There is 2m or more clear width for walking in quiet locations (flows of <600 pedestrians an hour). <u>or</u> There is 2.5m or more clear width for walking in moderately busy locations (flows of 600-1200 pedestrians an hour). <u>or</u> There is 3m or more in busy locations (flows of >1200 pedestrians an hour).	There is 2m to 2.5m clear width for walking in moderately busy locations (flows of 600-1200 pedestrians an hour). <u>or</u> There is 2.5m to 3m in busy locations (flows of >1200 pedestrians an hour).	There is 1.5m to 2m clear width for walking in quiet and moderate locations (flows of <1200 pedestrians an hour). <u>or</u> There is 2m to 2.5m clear width for walking in busy locations (flows of >1200 pedestrians an hour).	There is less than 1.5m clear width for walking.	①	3	3	
14	Sharing of footway with people cycling	No part of the footway is designated as shared use for walking and cycling.	Part or all of a footway wider than 3m with fewer than 200 pedestrians per hour is designated as shared use.	Part or all of a footway used by more than 200 pedestrians per hour is designated as shared use. <u>or</u> Part or all of a footway less than 3m wide is designated as shared use.	-	①	3	3	
15	Collision risk between people cycling and turning motor vehicles	Side roads are closed to motorised traffic, or turning movements by motor vehicles are minimised. <u>and</u> At signal-controlled junctions, all conflicting movements between cycle traffic and turning motor traffic are separated.	Some measures are in place to reduce turning movements by motor vehicles at priority junctions. <u>and</u> At signal-controlled junctions, cycle movements are not separated and fewer than 5% of turning vehicle movements are made by larger vehicles but mitigation measures are in place.	There are no restrictions on turning movements by motor vehicles at side roads and other uncontrolled accesses. <u>and</u> At signal-controlled junctions, cycle movements are not separated and more than 5% of turning vehicle movements are made by larger vehicles but mitigation measures are in place.	At signal-controlled junctions, cycle movements are not separated, more than 5% of turning vehicle movements are made by larger vehicles and there are no mitigation measures in place.	①	1	3	
16	Effective width for cycling	Where cycles are separated from other traffic , the width of the lane or track is 2.2m or more (one-way) or 3.5m or more (two-way). Otherwise: Width of the nearside general traffic lane (where there is no cycle lane) or width of the cycle lane plus adjacent general traffic lane is 4.5m or more.	Where cycles are separated from other traffic , the width of the lane or track is 1.5m to 2.2m (one-way) or 2.5m to 3.5m (two-way). Otherwise: Width of the nearside general traffic lane (where there is no cycle lane) or width of the cycle lane plus adjacent general traffic lane is between 4m and 4.5m.	Where cycles are separated from other traffic , the width of the lane or track is less than 1.5m (one-way) or less than 2.5m (two-way). Otherwise: Width of the nearside general traffic lane (where there is no cycle lane) or width of the cycle lane plus adjacent general traffic lane is less than 3.2m.	Width of the nearside general traffic lane (where there is no cycle lane) or width of the cycle lane plus adjacent general traffic lane is between 3.2m and 3.9m.	①	0	0	The width of the nearside general traffic lane is 3m. There is no proposal to change the current arrangement.

17	Impact of kerbside activity on cycling	There is no kerbside activity. <u>or</u> People cycling are physically separated from parking or loading facilities.	There is occasional kerbside activity, and people cycling can keep at least 1.0m clearance to vehicles parked or loading.	There is frequent or continuous kerbside activity, and people cycling can keep at least 1.0m clearance to vehicles parked or loading.	People cycling cannot maintain at least 1.0m clearance from vehicles parked or loading.	ⓘ	3	3	
18	Quality of carriageway surface	The carriageway surface is even and smooth, with sufficient skid resistance. <u>or</u> There are defects but resurfacing of the whole carriageway is proposed.	There are a few minor defects in the carriageway surface (please see scoring guidance).	There are many minor defects in the carriageway surface (please see scoring guidance).	There are major defects in the carriageway surface (please see scoring guidance).	ⓘ	3	3	
19	Quality of footway surface	There is an even and level surface for walking on footways. <u>or</u> There are defects but resurfacing of the whole footway is proposed.	There are a few minor defects in the footway surface (please see scoring guidance).	There are many minor defects in the footway surface (please see scoring guidance).	There are major defects in the footway surface (please see scoring guidance).	ⓘ	2	3	The footway to the front of the development will be resurfaced following completion of the development.
20	Surveillance of public spaces	There is constant surveillance – because mixed use buildings overlook the street or space, or because there are many people using the space or walking through.	There is intermittent surveillance – because surrounding buildings are single-use or do not completely overlook the street, or because there are few people using the space or walking through.	There is poor surveillance – because few buildings overlook the street or space, there is little activity.	–	ⓘ	1	3	The proposal will add passive surveillance on Camden Road and Parkhurst Road.
21	Lighting	Street lighting meets the British Standard 5489:2003 and the European Standard CEN/TR 13201. <u>and</u> Lighting of off-carriageway facilities for walking or cycling exceeds the same standards.	Street lighting meets the British Standard 5489:2003 and the European Standard CEN/TR 13201 but lighting of off-carriageway spaces for walking or cycling does not.	Street lighting does not meet the British Standard 5489:2003 and the European Standard CEN/TR 13201.	–	ⓘ	3	3	
22	Provision of cycle parking	Cycle parking exceeds existing demand and is accessible by all.	Cycle parking meets existing demand and is accessible by all.	Cycle parking does not meet existing demand. <u>or</u> Cycle parking meets existing demand but is not accessible by all.	–	ⓘ	1	3	The development will provide cycle parking for commercial units fronting Camden Road and Parkhurst Road. These cycle parking spaces can be used by visitors and the public.

23	Street trees	<p>If assessing existing: There are multiple trees, with canopies spaced less than 15m apart on average.</p> <p>If assessing proposal: All existing trees are to be retained and the street is already tree-lined with less than 15m between tree canopies.</p> <p>or All existing trees are to be retained, with planting of new trees designed to reduce the average canopy spacing to less than 15m.</p>	<p>If assessing existing: There are multiple trees, with canopies spaced more than 15m apart on average.</p> <p>If assessing proposal: Not all existing trees are to be retained, however new planting will ensure the overall number of trees is maintained or increased.</p> <p>or All existing trees are to be retained, however the canopy spacing will remain more than 15m on average.</p>	<p>If assessing existing: There are no trees, or only one tree.</p> <p>If assessing proposal: There are no existing or proposed trees.</p> <p>or The number of trees has been reduced.</p>	-	ⓘ	3	3	New street trees will be planted on Camden Road And Parkhurst Road
24	Planting at footway-level (excluding trees)	<p>If assessing existing: There is substantial planting in good condition designed to create or improve social space and/or act as a connection between other green spaces (eg pocket park, rain garden, community garden area).</p> <p>If assessing proposal: Existing greenery is to be enhanced with integrated SuDS features or new planting or new areas of greenery are proposed.</p>	<p>If assessing existing: There is some planting, eg shrubs, verges, hedges, ornamental flower beds, or adaptation for some animal species.</p> <p>If assessing proposal: Existing standalone greenery is to be retained.</p>	<p>If assessing existing: There is no planting, or existing planting is in a poor condition.</p> <p>If assessing proposal: No green infrastructure is proposed, or the size of existing greenery is to be reduced.</p>	-	ⓘ	1	3	
25	Walking distance between resting points (benches and other informal seating)	There is less than 50m between resting points.	There is between 50m and 150m between resting points.	There is more than 150m between resting points.	-	ⓘ	1	2	
26	Walking distance between sheltered areas protecting from rain. Including fixed awning or other shelter provided by buildings/infrastructure	There is less than 50m between sheltered areas.	There is between 50m and 150m between sheltered areas.	There is more than 150m between sheltered areas.	-	ⓘ	1	2	
Are there any bus services running on this street? (Y/N) If not, do not complete metrics 27-28							Y	Y	An answer is required here in order to generate results
27	Factors influencing bus passenger journey time	There are positive influences on bus journey time, e.g. bus lanes, and/or exemptions for buses from movement bans for general traffic.	Buses are mixed with traffic but not significantly delayed.	There are negative influences on bus journey time, e.g. unclear markings, narrow lane width, parking/loading issues, short cage length, mixing with congested traffic.	-	ⓘ	3	3	
28	Bus stop accessibility	Bus stop is wheelchair accessible, there is clear space for boarding and alighting and there is a clearway in place at the bus stop.	Bus stop is wheelchair accessible but either there is limited clear space around the bus stop for boarding and alighting or, for borough roads, there is no clearway in place.	Bus stop is not wheelchair accessible, ie the kerb height is less than 100mm.	-	ⓘ	3	3	

Are there any rail/underground/bus stations accessible from this street? (Y/N) If not, do not complete metrics 29-31					N	N	An answer is required here in order to generate results		
29	Bus stop connectivity with other public transport services	The bus stop is within sight of another service – less than 50m away.	The bus stop is between 50m and 150m away from another service.	The bus stop is more than 150m away from another service.	-		1	1	
30	Street-to-station step-free access	All entry points to the station are step-free.	The main entry point to the station is not step-free but step-free alternatives are provided.	There is no step-free access to the station.	-		3	3	

31	Support for interchange between cycling and underground/rail	Secure cycle parking is provided close to station access points, and exceeding existing demand.	Cycle parking is available close to station access points that meets existing demand.	There is insufficient cycle parking to meet demand, or cycle parking is poorly located for station access points.	-	i	1	1	
If 'zero' scores (known road danger issues) remain, please explain why opposite:							2	2	No zero score remain with proposals

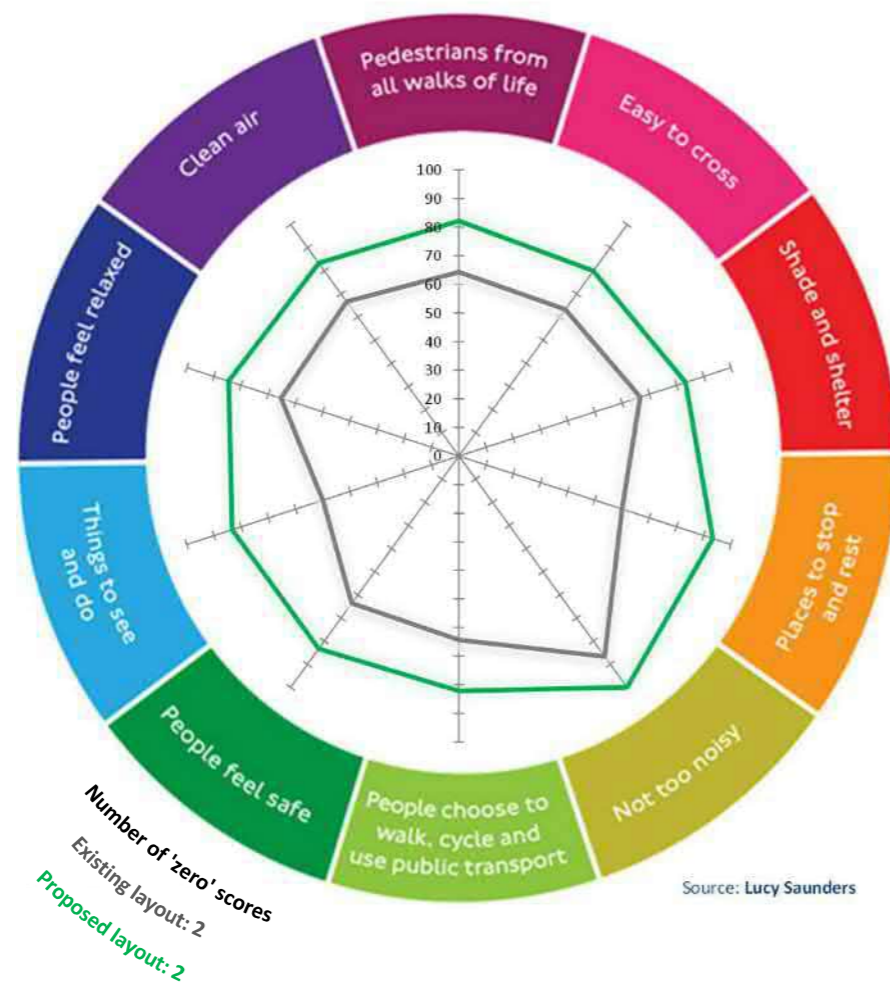
Healthy Streets Check Summary Results

Indicators explained >

An overview of how each metric aligns with different Indicators

Interpreting results >

A summary of how to use and improve on your results



Healthy Streets Indicator scores (%)

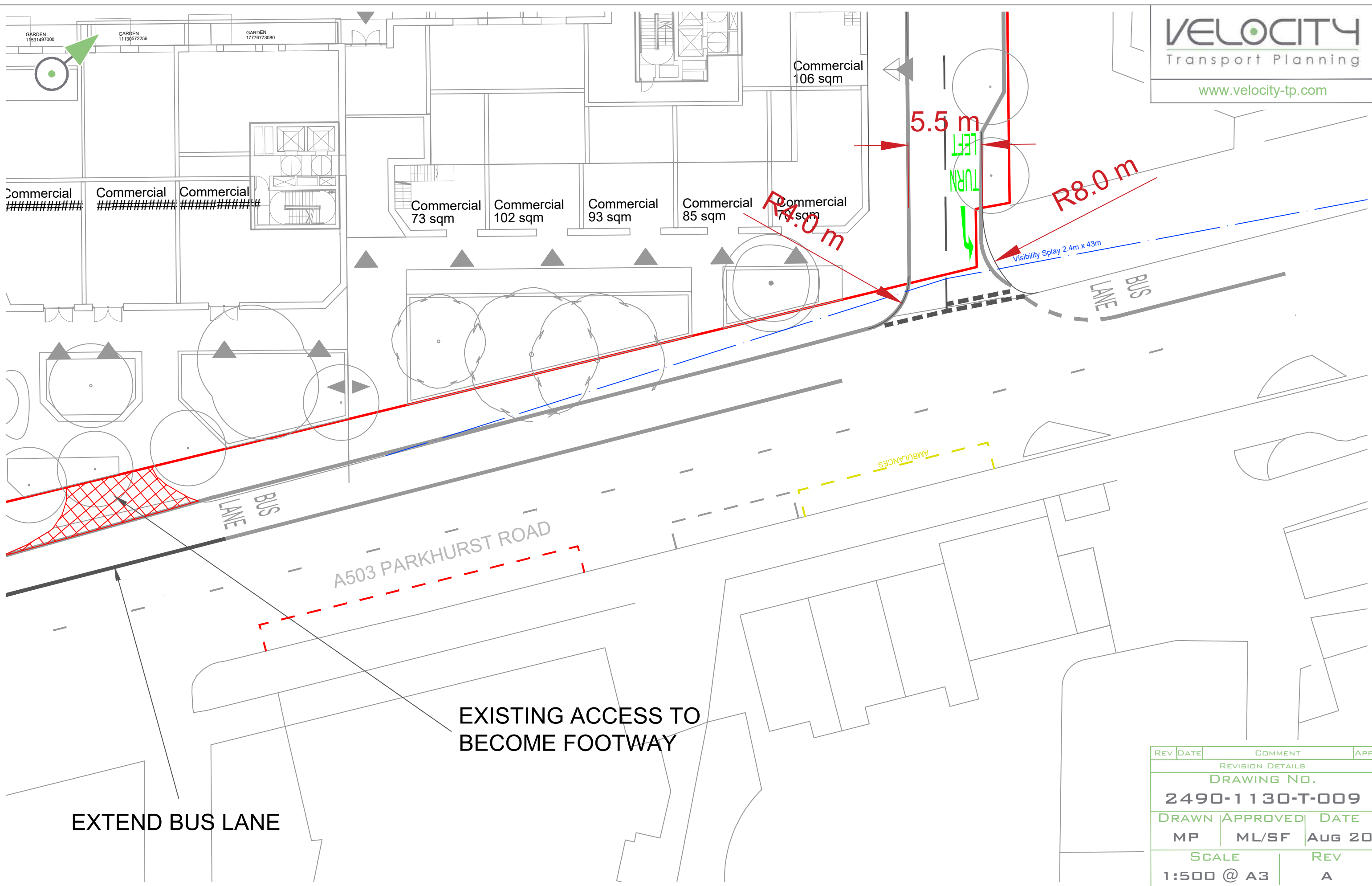
(Results will only display once all metrics have been scored)

	Existing layout	Proposed layout
Pedestrians from all walks of life	64	82
Easy to cross	63	80
Shade and shelter	67	83
Places to stop and rest	60	93
Not too noisy	87	100
People choose to walk, cycle and use public transport	64	82
People feel safe	64	83
Things to see and do	50	83
People feel relaxed	65	85
Clean air	67	83
Overall Healthy Streets Check score	65	84
Number of 'zero' scores	2	2

APPENDIX E

SITE ACCESS DESIGN





EXTEND BUS LANE

EXISTING ACCESS TO
BECOME FOOTWAY

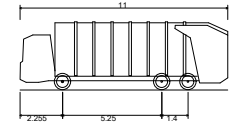
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2490-1130-T-009			
DRAWN		APPROVED	DATE
MP		ML/SF	AUG 20
SCALE			REV
1:500 @ A3			A

CLIENT
PEABODY

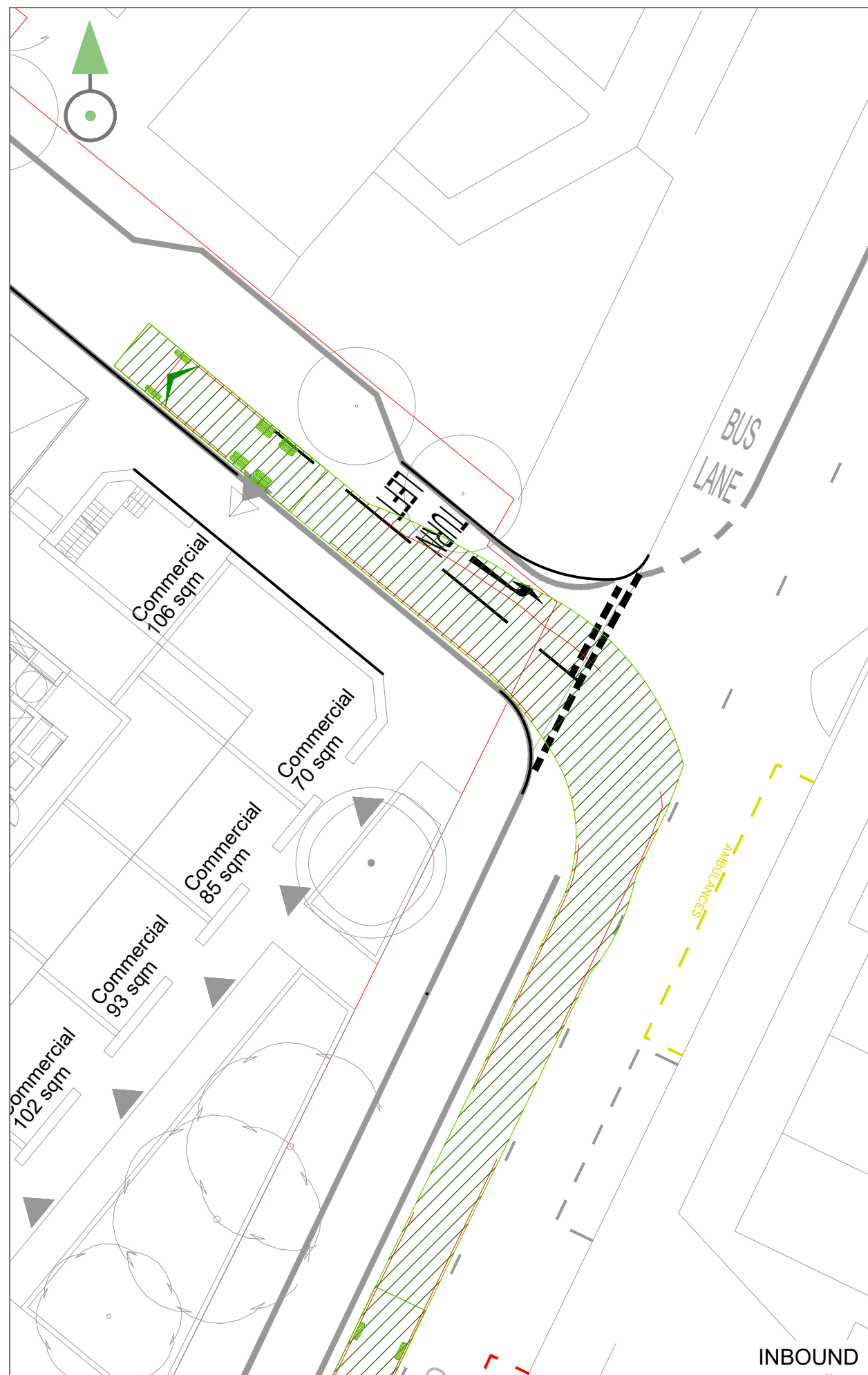
PROJECT
HOLLOWAY PRISON

DRAWING TITLE
**REDESIGNED NORTHERN SITE ACCESS
JUNCTION**

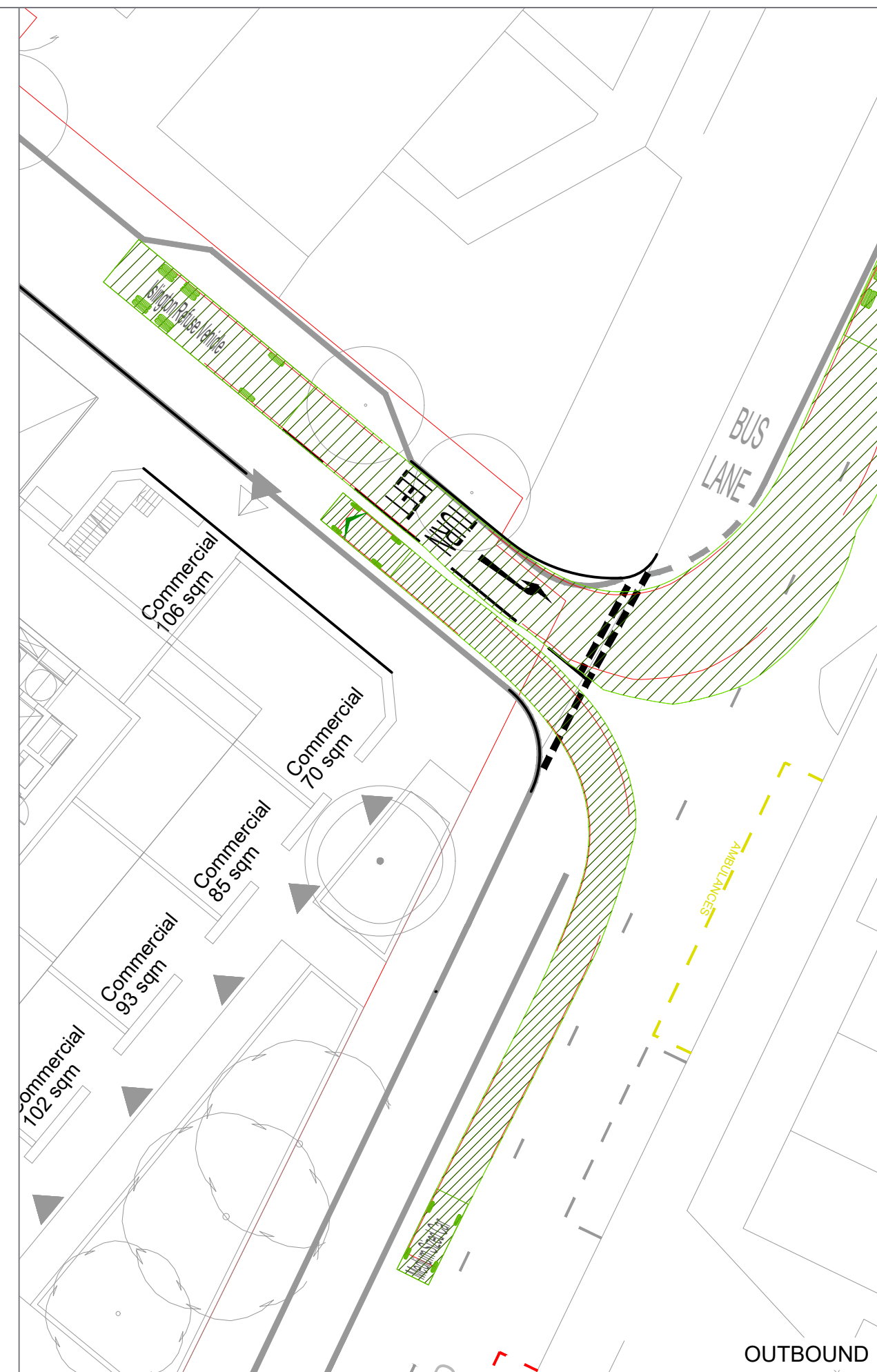




Islington Refuse Vehicle
 Overall Length 11.000m
 Overall Width 2.650m
 Overall Body Height 3.600m
 Min Body Ground Clearance 0.368m
 Track Width 2.450m
 Lock to lock time 4.00s
 Wall to Wall Turning Radius 11.500m



INBOUND



OUTBOUND

REV	DATE	COMMENT	APP
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REVISION DETAILS

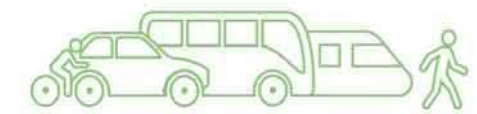
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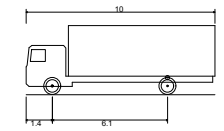
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MP	ML/SF	AUG 20

SCALE	REV
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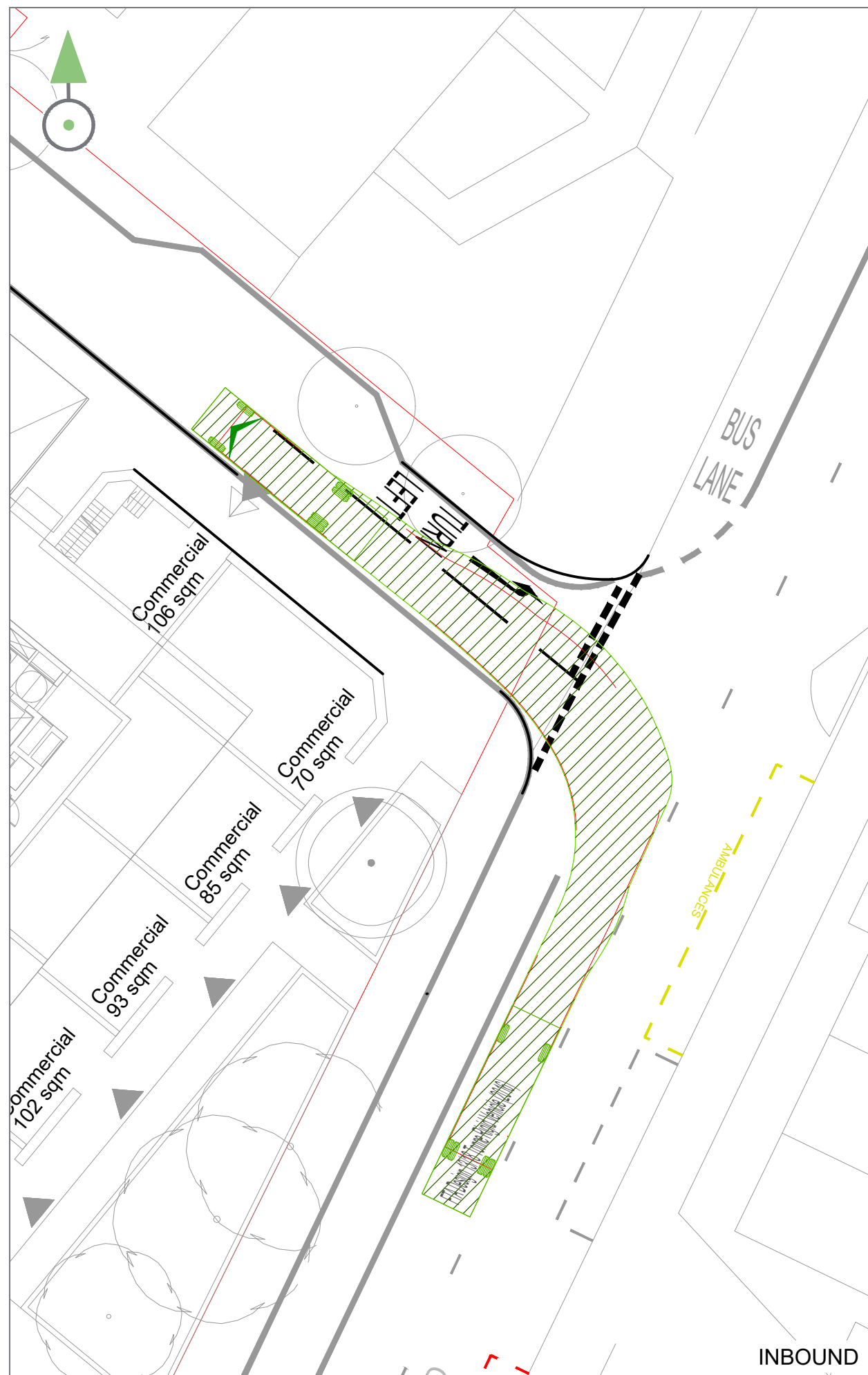
CLIENT
PEABODY
PROJECT
HOLLOWAY PRISON

DRAWING TITLE
**REDESIGNED NORTHERN SITE ACCESS JUNCTION
SWEEP PATH ANALYSIS
ISLINGTON REFUSE VEHICLE**

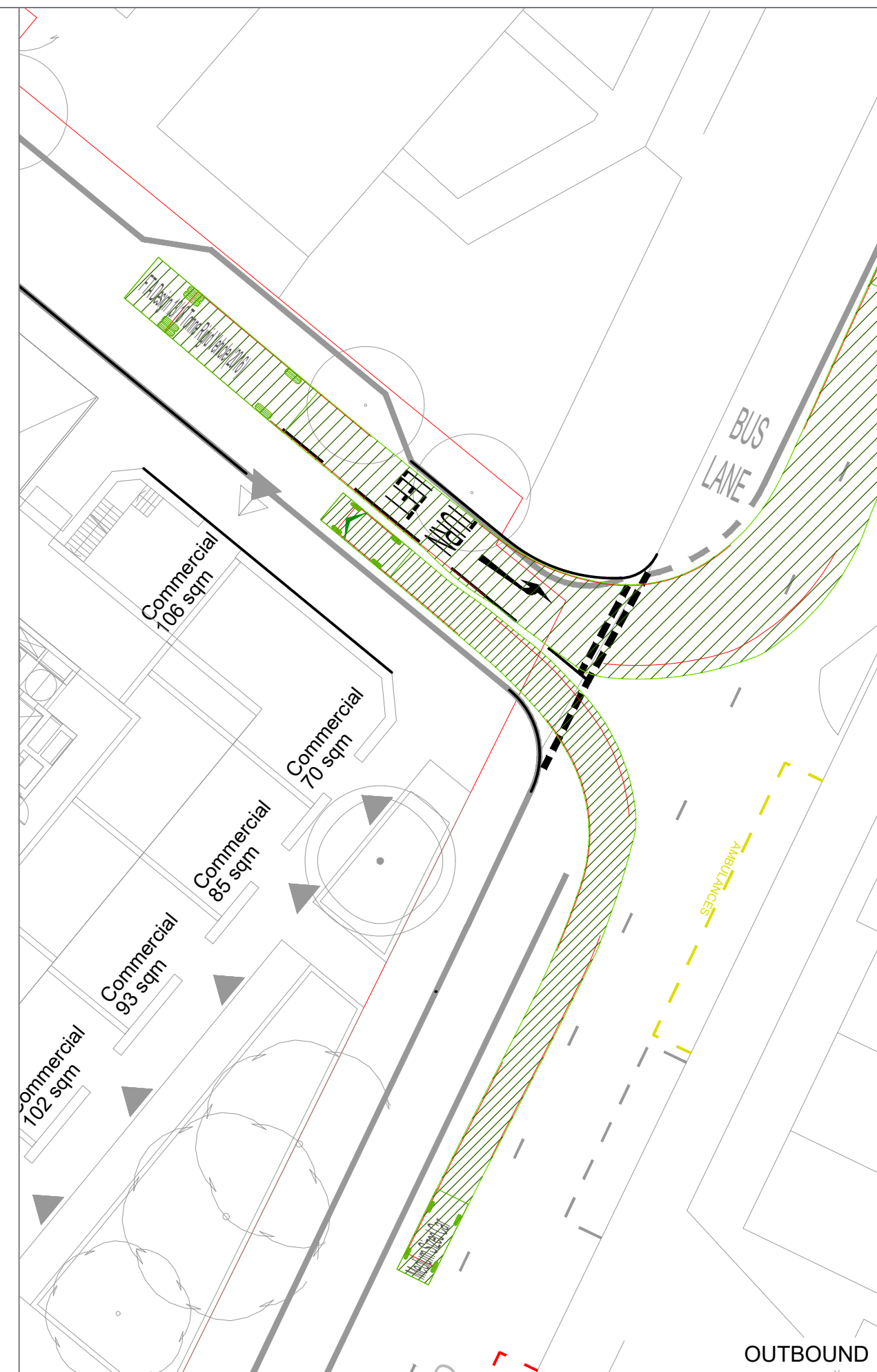




FTA Design 13/18 Tonne Rigid Vehicle (2016)
 Overall Length 10.000m
 Overall Width 2.550m
 Overall Body Height 3.645m
 Min Body Ground Clearance 0.440m
 Track Width 2.470m
 Lock to lock time 3.00s
 Kerb to Kerb Turning Radius 11.000m



INBOUND



OUTBOUND

REV	DATE	COMMENT	APP
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REVISION DETAILS

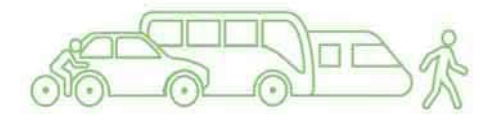
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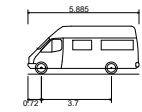
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MP	ML/SF	AUG 20

SCALE	REV
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CLIENT
PEABODY
PROJECT
HOLLOWAY PRISON

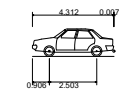
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SWEEP PATH ANALYSIS
FTA 10M RIGID**





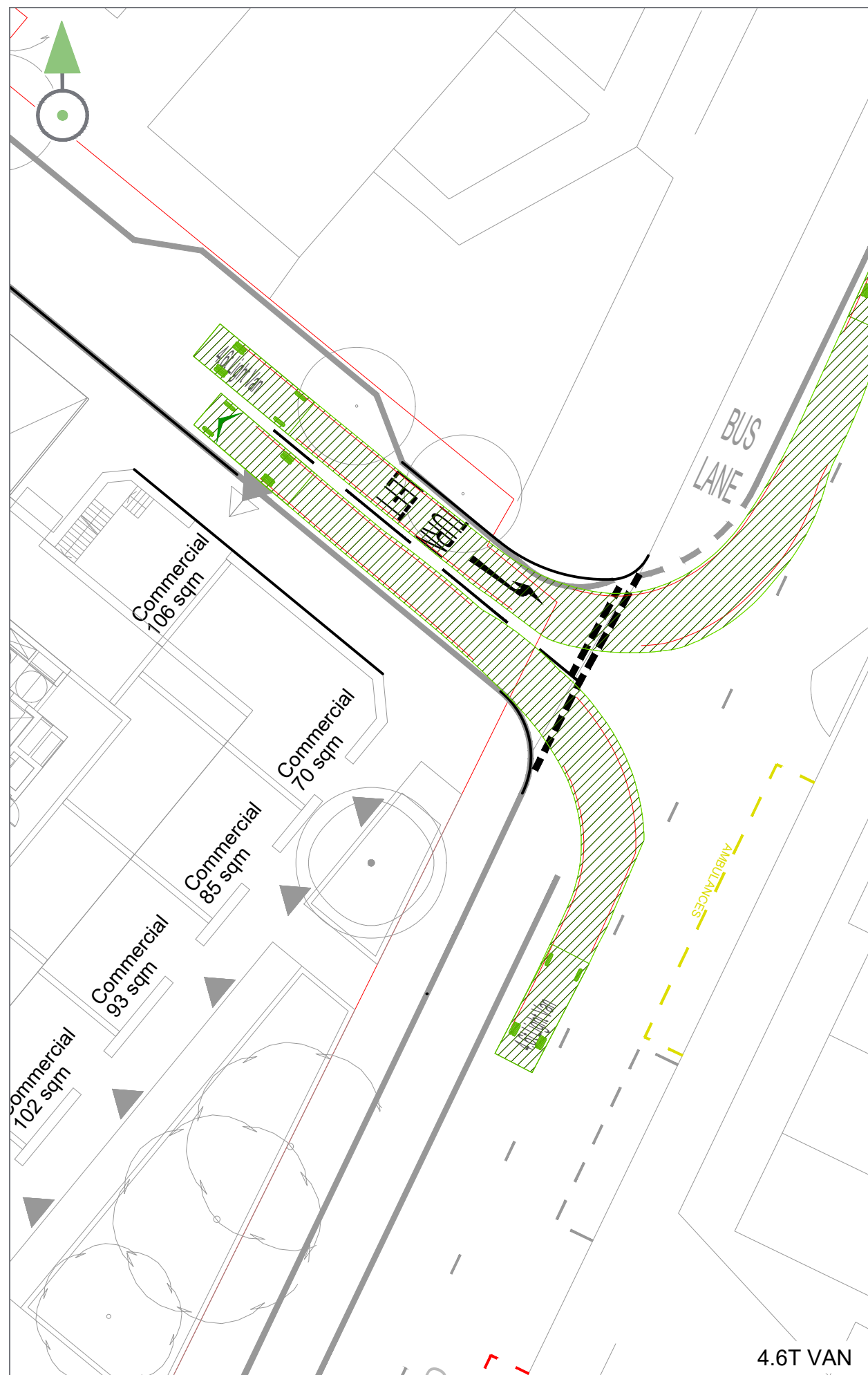
4.6t Light Van
Overall Length 5.885m
Overall Width 2.000m
Overall Body Height 2.526m
Min Body Ground Clearance 0.293m
Track Width 1.765m
Lock to lock time 4.00s
Kerb to Kerb Turning Radius 6.000m

5.885m
2.000m
2.526m
0.293m
1.765m
4.00s
6.000m

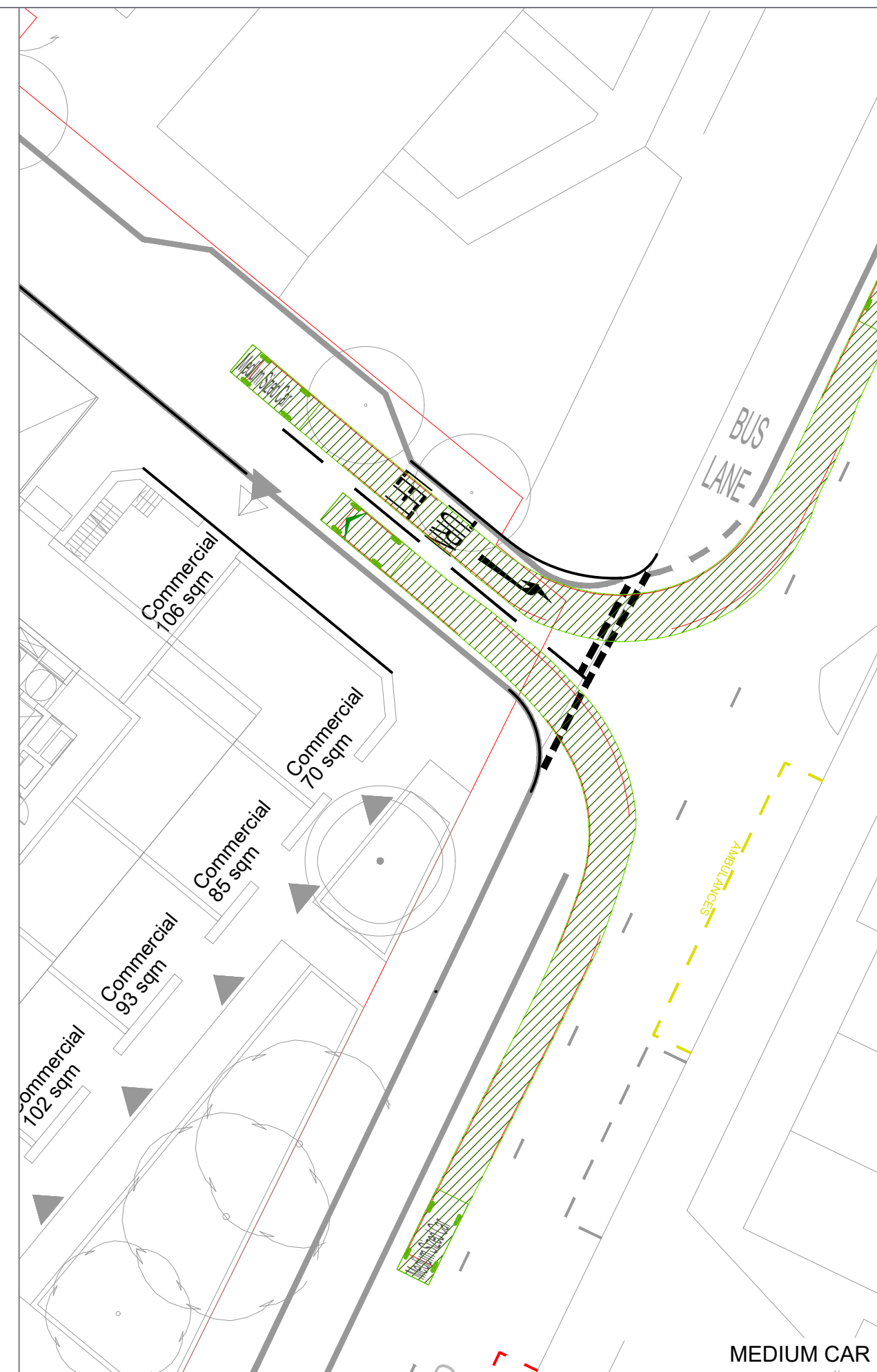


Medium Sized Car
Overall Length 4.312m
Overall Width 1.686m
Overall Body Height 1.466m
Min Body Ground Clearance 0.228m
Max Track Width 1.591m
Lock to lock time 4.00s
Kerb to Kerb Turning Radius 5.042m

4.312m
1.686m
1.466m
0.228m
1.591m
4.00s
5.042m



4.6T VAN



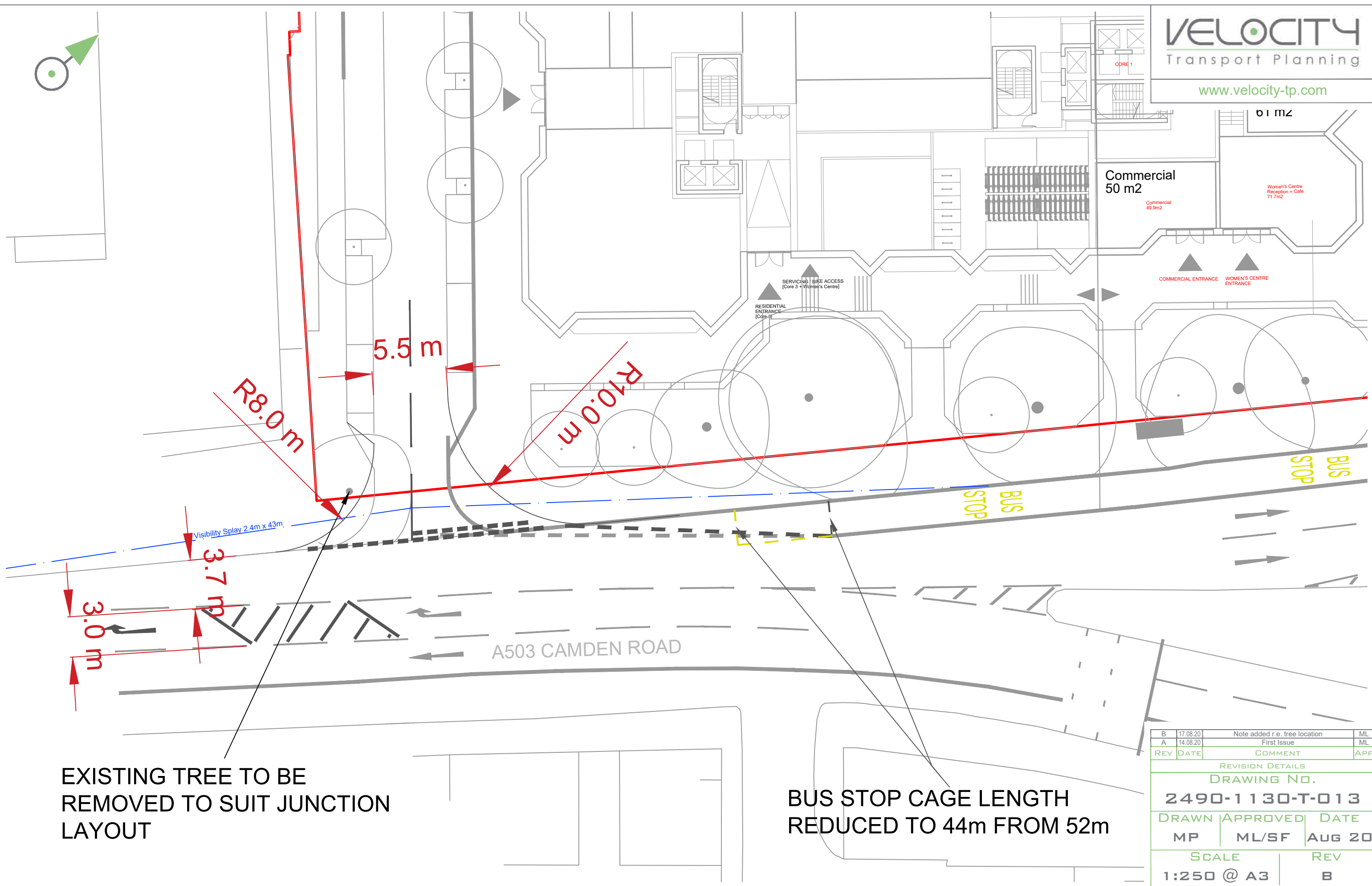
MEDIUM CAR

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CLIENT
PEABODY
PROJECT
HOLLOWAY PRISON

DRAWING TITLE
**REDESIGNED NORTHERN SITE ACCESS JUNCTION
SWEEP PATH ANALYSIS
4.6T VAN AND MEDIUM CAR**

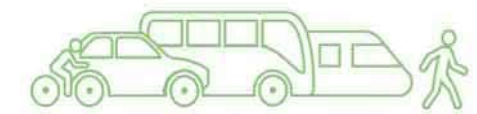


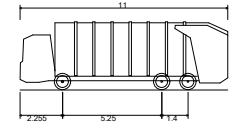


EXISTING TREE TO BE REMOVED TO SUIT JUNCTION LAYOUT

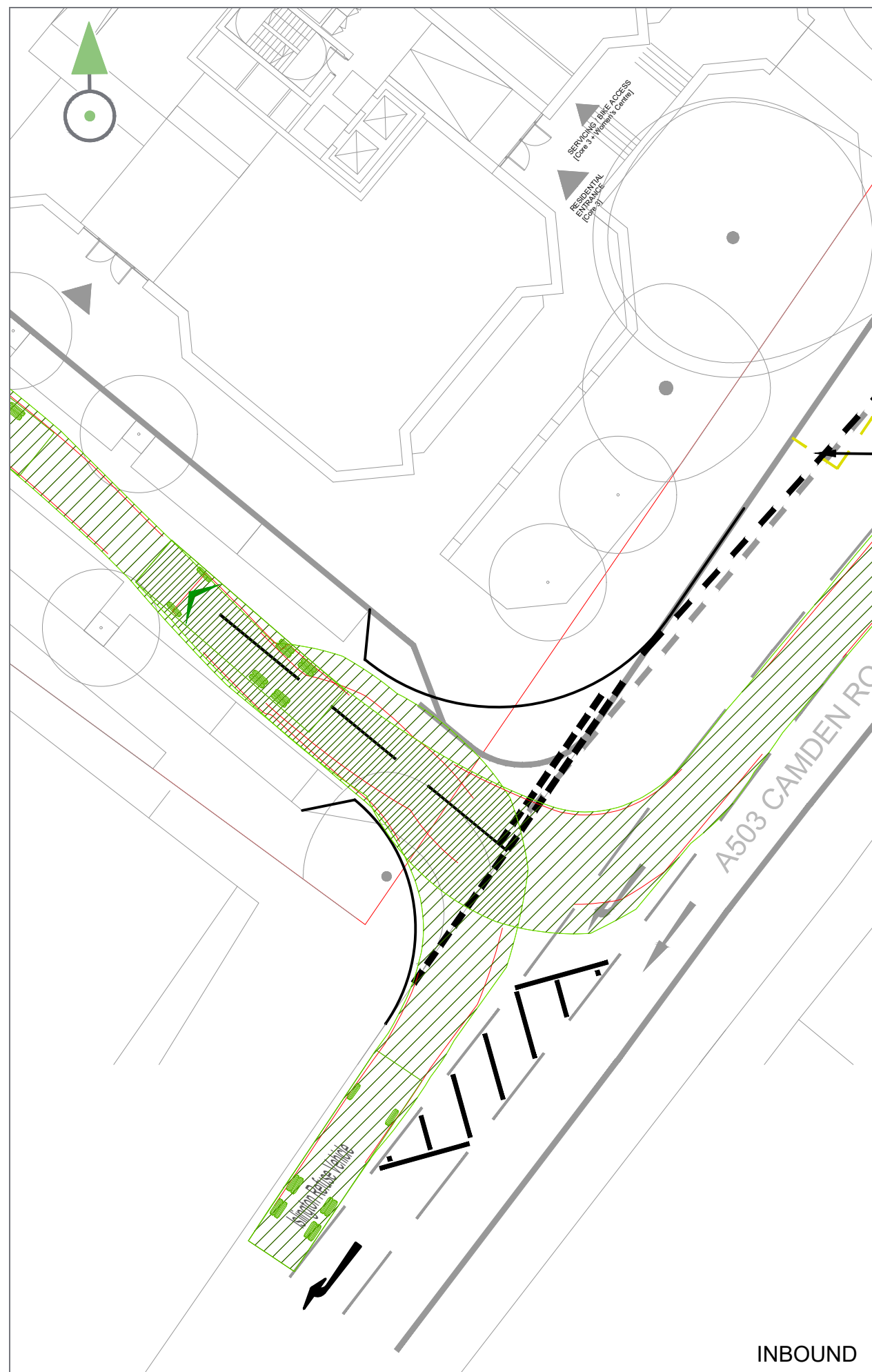
BUS STOP CAGE LENGTH REDUCED TO 44m FROM 52m

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A	14.08.20	First Issue	ML
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DRAWING NO.			
2490-1130-T-013			
DRAWN	APPROVED	DATE	
MP	ML/SF	AUG 20	
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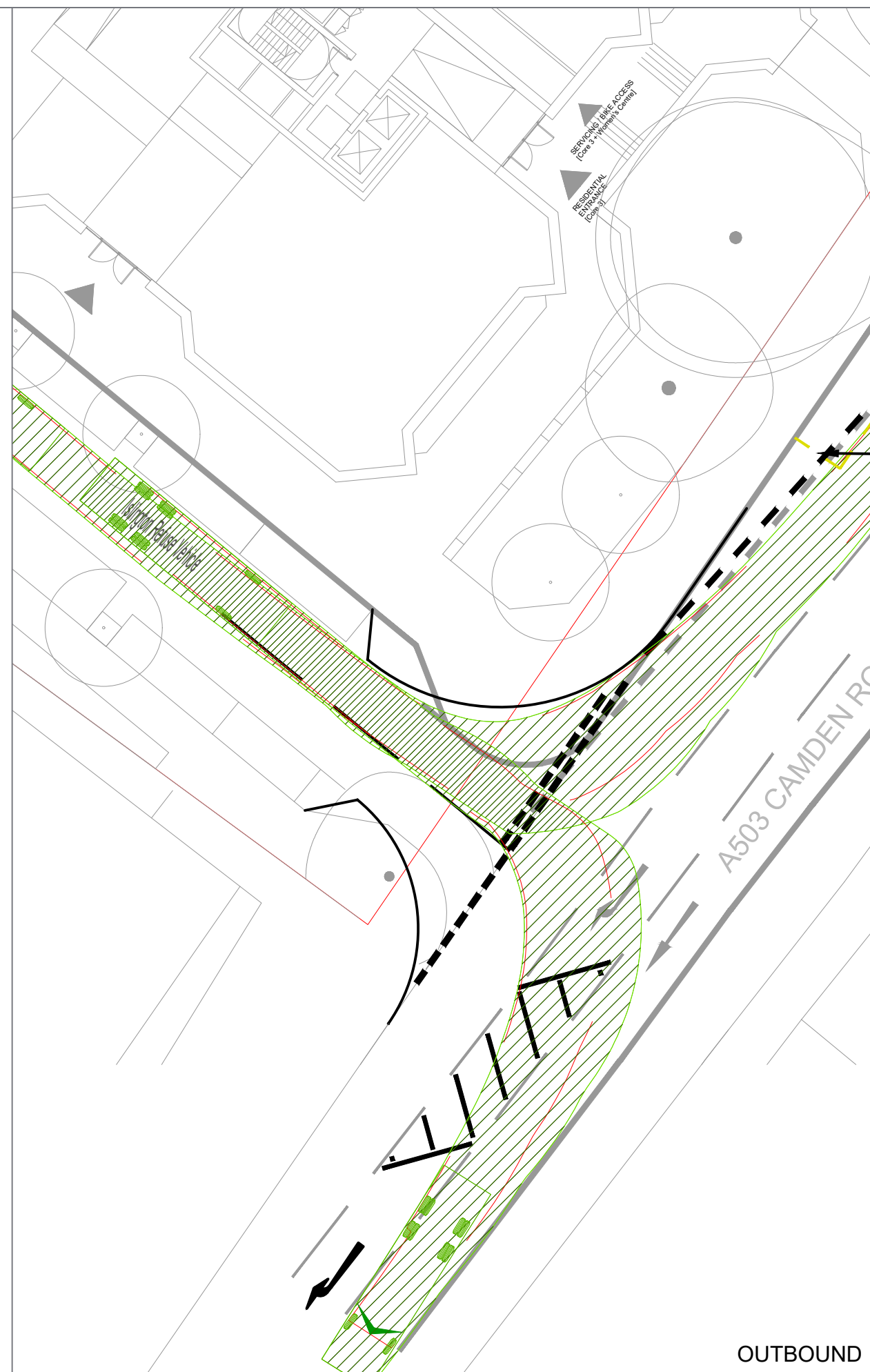




Islington Refuse Vehicle	
Overall Length	11.000m
Overall Width	2.650m
Overall Body Height	3.600m
Min Body Ground Clearance	0.368m
Track Width	2.450m
Lock to lock time	4.00s
Wall to Wall Turning Radius	11.500m



INBOUND



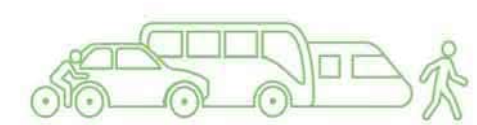
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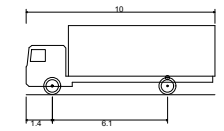
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CLIENT
PEABODY

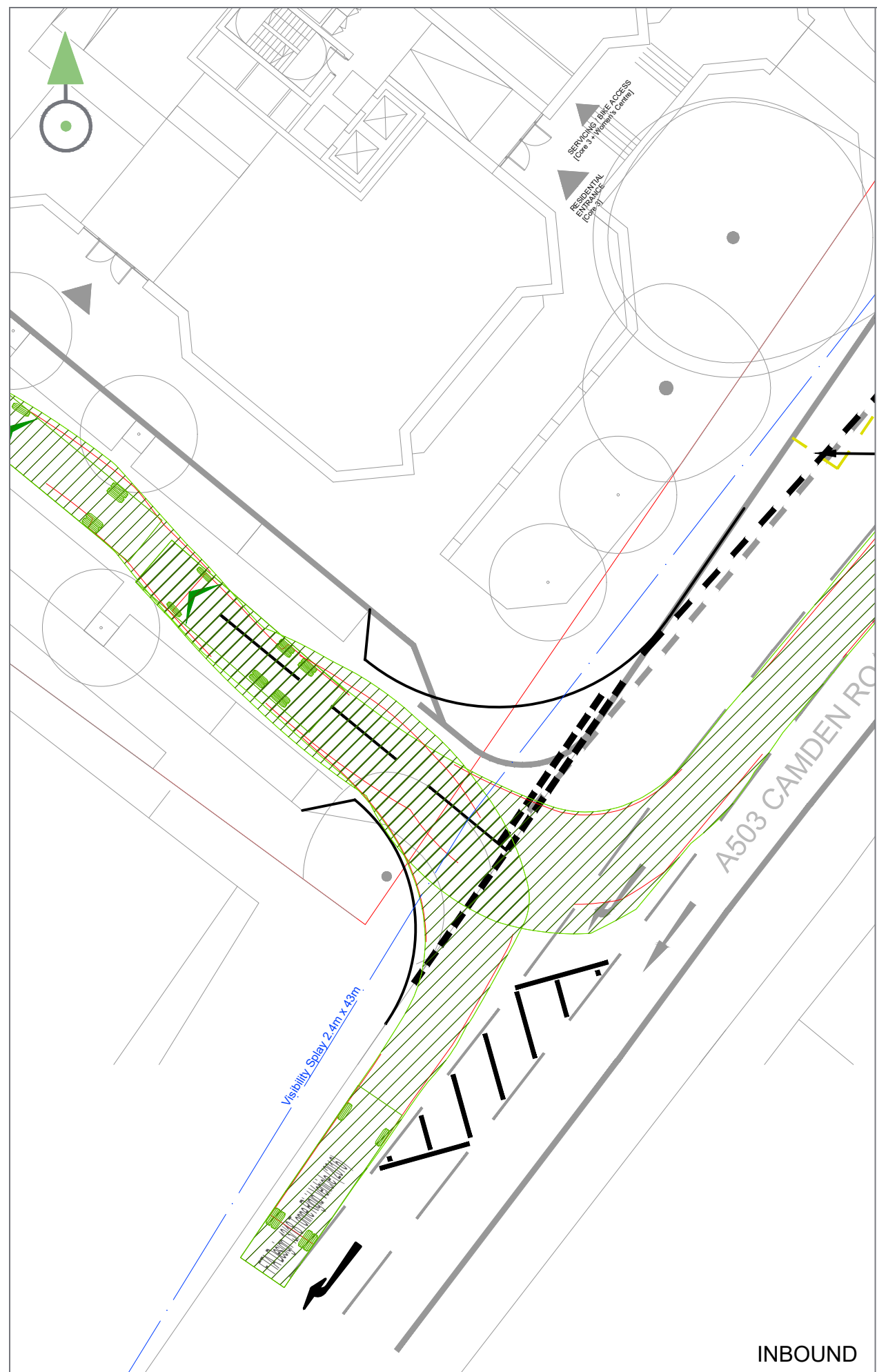
PROJECT
HOLLOWAY PRISON

DRAWING TITLE
**PROPOSED SOUTHERN SITE ACCESS JUNCTION
SWEEP PATH ANALYSIS
ISLINGTON REFUSE VEHICLE**

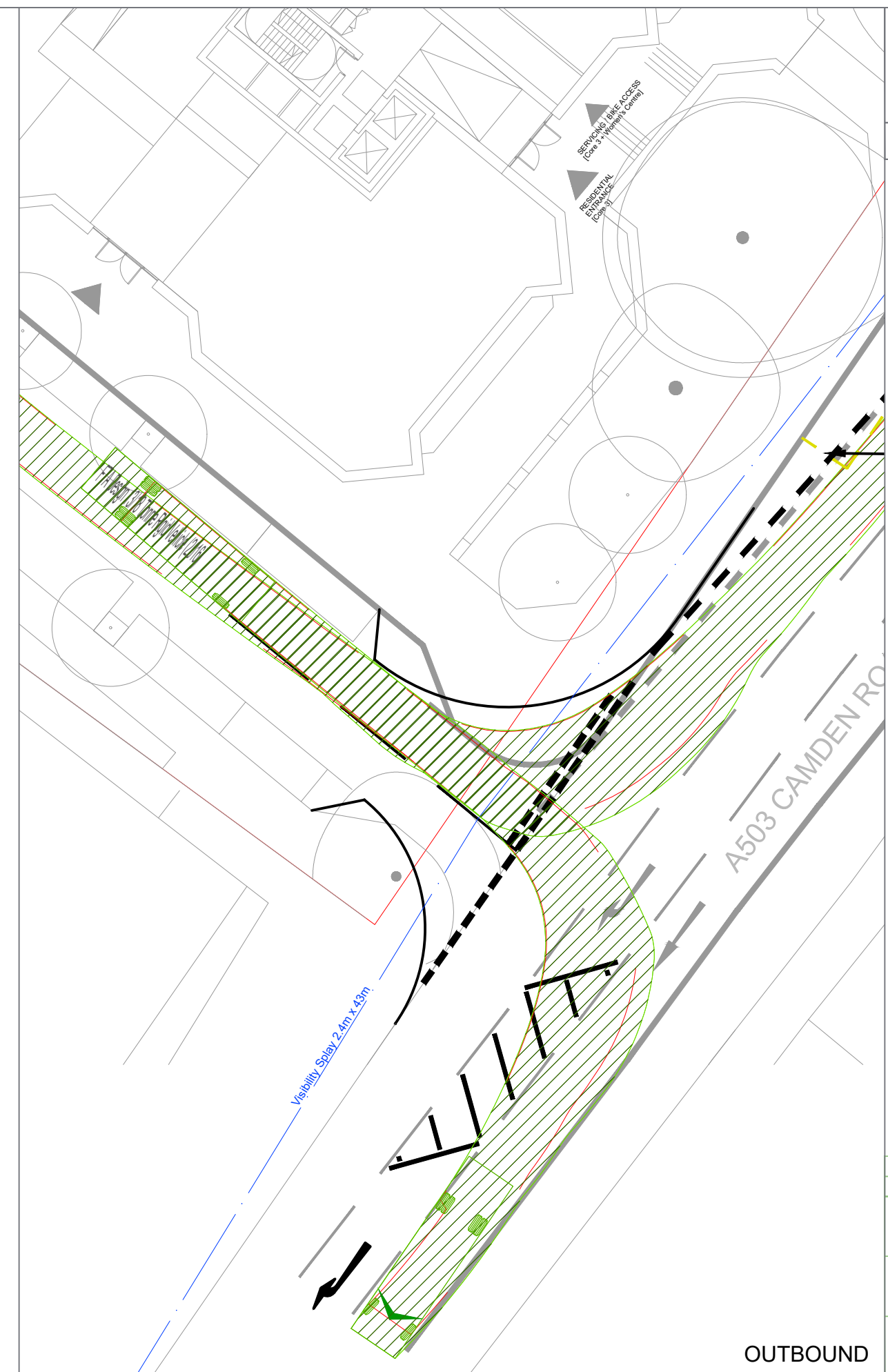




FTA Design 13/18 Tonne Rigid Vehicle (2016)	10.000m
Overall Length	2.550m
Overall Width	3.645m
Overall Body Height	0.440m
Min Body Ground Clearance	2.470m
Track Width	3.00s
Lock to lock time	11.000m
Kerb to Kerb Turning Radius	



INBOUND

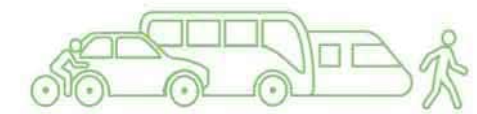


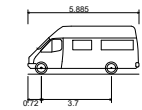
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CLIENT
PEABODY
PROJECT
HOLLOWAY PRISON

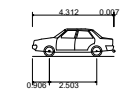
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**PROPOSED SOUTHERN SITE ACCESS JUNCTION
SWEEP PATH ANALYSIS
FTA 10M RIGID**





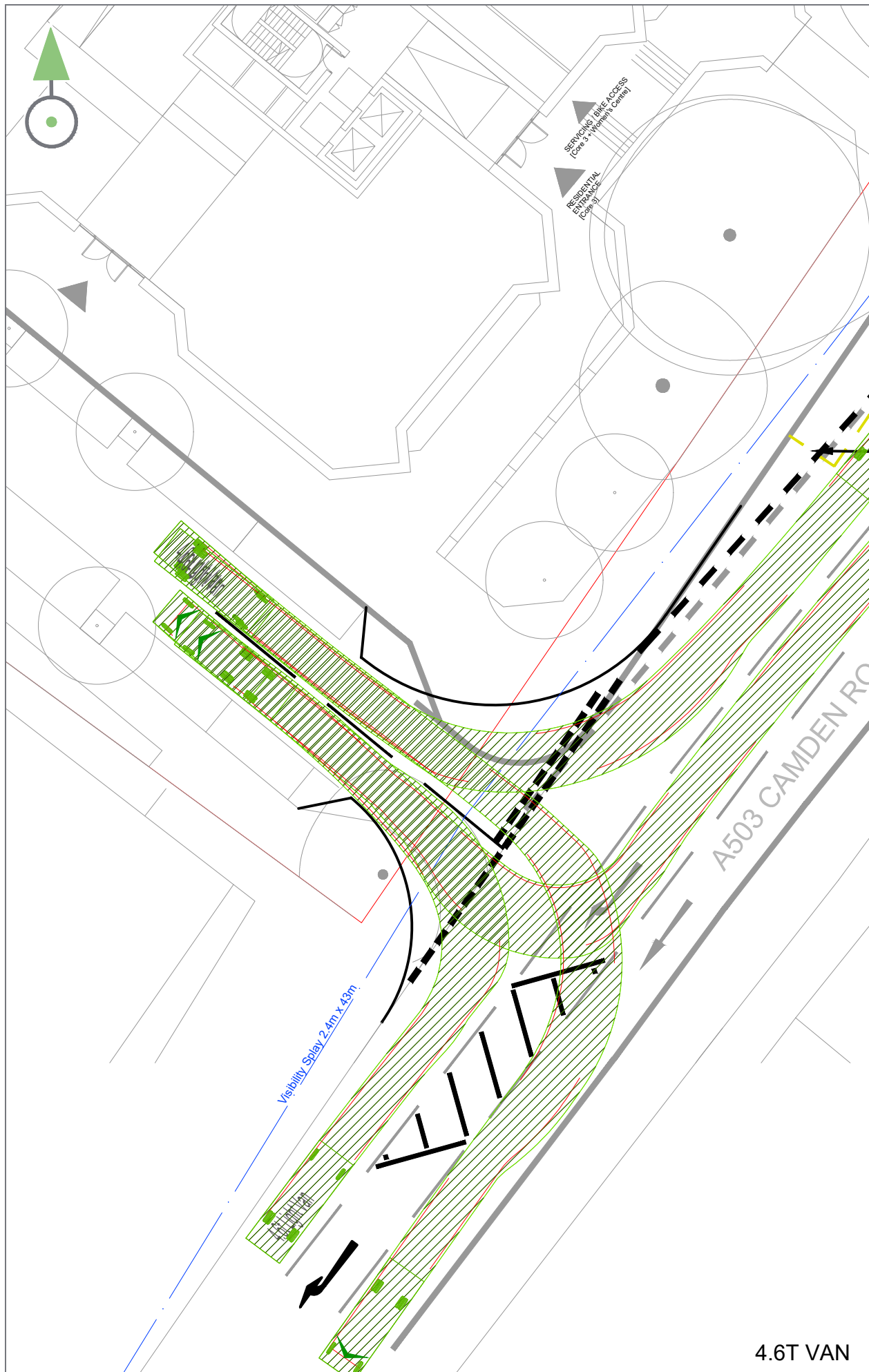
4.6T Light Van
Overall Length 5.885m
Overall Width 2.000m
Overall Body Height 2.526m
Min Body Ground Clearance 0.228m
Track Width 1.765m
Lock to lock time 4.00s
Kerb to Kerb Turning Radius 6.000m

5.885m
2.000m
2.526m
0.228m
1.765m
4.00s
6.000m

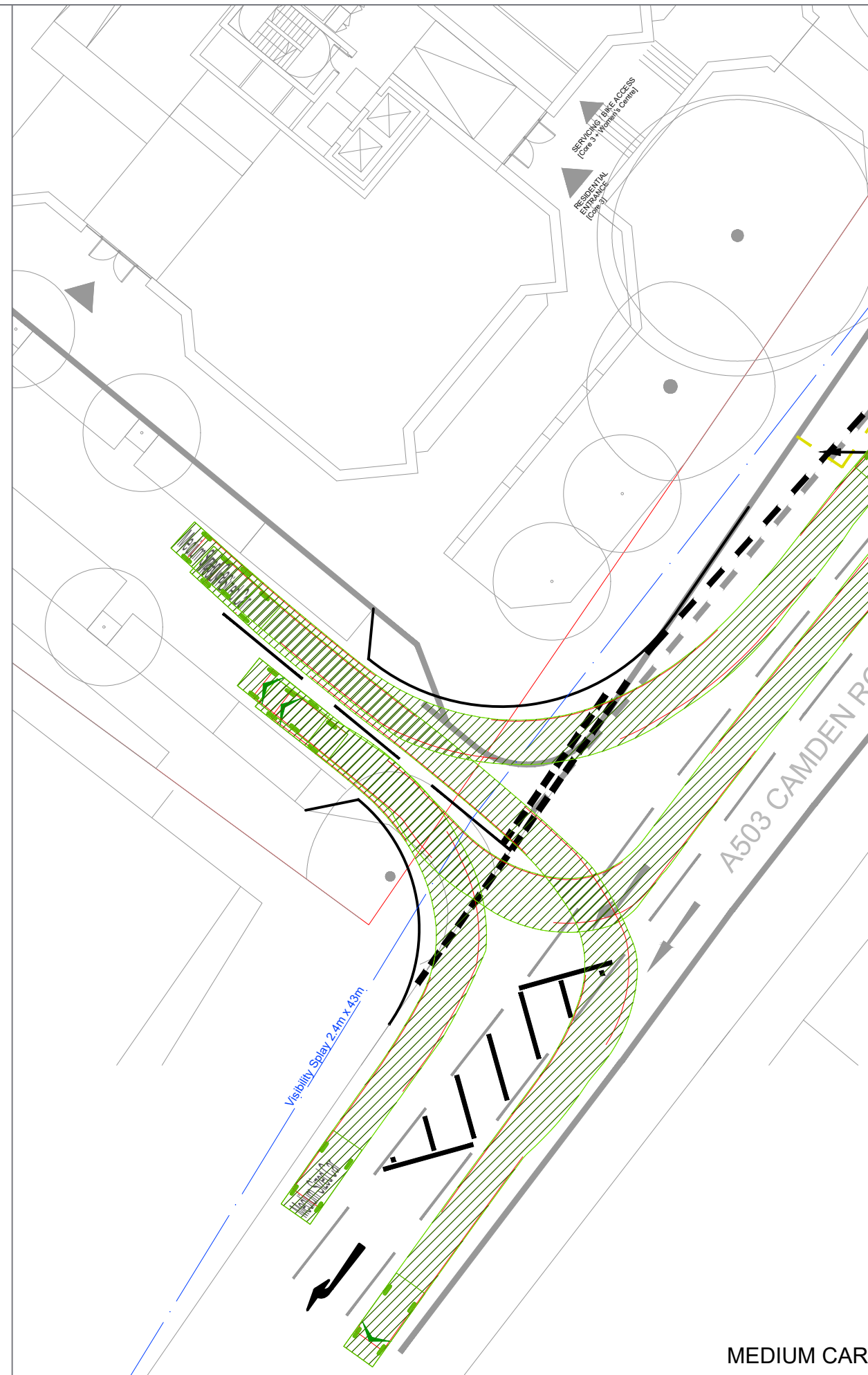


Medium Sized Car
Overall Length 4.319m
Overall Width 1.686m
Overall Body Height 1.466m
Min Body Ground Clearance 0.228m
Max Track Width 1.591m
Lock to lock time 4.00s
Kerb to Kerb Turning Radius 5.042m

4.319m
1.686m
1.466m
0.228m
1.591m
4.00s
5.042m



4.6T VAN



MEDIUM CAR

REV	DATE	COMMENT	APP
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REVISION DETAILS

DRAWING NO.

2490-1130-T-016

DRAWN | APPROVED | DATE

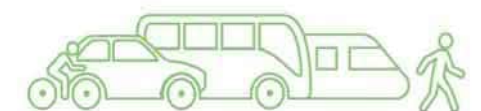
MP | ML/SF | AUG 20

SCALE | REV

1:250 @ A3 | A

CLIENT
PEABODY
PROJECT
HOLLOWAY PRISON

DRAWING TITLE
**PROPOSED SOUTHERN SITE ACCESS JUNCTION
SWEEP PATH ANALYSIS
4.6T VAN AND MEDIUM CAR**



APPENDIX F

ROAD SAFETY AUDIT



ACORNS
PROJECTS
LIMITED



Former Holloway Prison, London Borough of Islington

Proposed Site Access Arrangements

Stage 1 Road Safety Audit

Ref: DRAFT Former Holloway Prison London Borough of Islington Stage 1 RSA V1.0

Prepared for: **Velocity Transport Planning, Unit A, Taper Studios, The Leather Market, 120 Weston Street, London, SE1 4GS.**

By: **Acorns Projects Limited - Safety Traffic Project Management & Highway Engineering Consultants**

Prepared by: Adriano B. Cappella, Audit Team Leader

Checked by: Lisa Allen, Audit Team Member

Approved by: Adriano B. Cappella

Version	Status	Date
1.0	DRAFT	01-10-2020



1.0 INTRODUCTION

1.1 Commission

- 1.1.1 This report results from a Stage 1 Road Safety Audit carried out on the Former Holloway Prison, London Borough of Islington, Proposed Site Access Arrangements proposals.
- 1.1.2 The Audit was undertaken by Acorns Projects Limited in accordance with the Audit Brief issued by Velocity Transport Planning on behalf of the Client Organisation on the 4th September 2020. It took place at the Eaton Bray offices of Acorns Projects Limited during September and October 2020 and comprised an examination of the documents provided as listed in Appendix A, plus a visit to the site of the proposed scheme.
- 1.1.3 A visit to the site of the proposed scheme was made on the 19th September 2020. During the site visit, the weather was warm and sunny and the existing road surface was dry.

1.2 Terms of Reference

- 1.2.1 The Terms of Reference of this Audit are as described in TfL Procedure SQA-0170 dated May 2014. The Audit Team has examined and reported only on the road safety implications of the scheme as presented and how it impacts on all road users and has not examined or verified the compliance of the designs to any other criteria. However, to clearly explain a safety problem or the recommendation to resolve a problem the Audit Team may, on occasion, have referred to a design standard without touching on technical audit. An absence of comment relating to specific road users/modes in Section 3 of this report does not imply that they have not been considered; instead the Audit Team feels they are not adversely affected by the proposed changes.
- 1.2.2 This Safety Audit is not intended to identify pre-existing hazards which remain unchanged due to the proposals; hence they will not be raised in Section 3 of this report as they fall outside the remit of Road Safety Audit in general as specified in the procedure SQA-0170 dated May 2014. Safety issues identified during the Audit and site visit that are considered to be outside the Terms of Reference, but which the Audit Team wishes to draw to the attention of the Client Organisation, are set out in Section 4 of this report.
- 1.2.3 Nothing in this Audit should be regarded as a direct instruction to include or remove a measure from within the scheme. Responsibility for designing the scheme lies with the Designer and as such the Audit Team accepts no design responsibility for any changes made to the scheme as a result of this Audit.
- 1.2.4 In accordance with TfL Procedure SQA-0170 dated May 2014, this Audit has a maximum shelf life of 2 years. If the scheme does not progress to the next stage in its development within this period, then the scheme should be re-audited.
- 1.2.5 Unless general to the scheme, all comments and recommendations are referenced to the detailed design drawings and the locations have been indicated on the plan located in Appendix B.

1.2.6 It is the responsibility of the Design Organisation to complete the Designer's response section of this Audit report. Where applicable and necessary it is the responsibility of the Client Organisations to complete the Client's comment section of this Audit report. Signatures from both the Design Organisation and Client Organisation must be added within Section 5 of this Audit report. A copy of which must be returned to the Audit Team.

1.3 Main Parties to the Audit

1.3.1 Client Organisations

Client contact details for TfL: Pak-Lim Wong - Planning Officer, City Planning, Transport for London, 5 Endeavour Square, Westfield Avenue, Stratford, London, E20 1JN (020 3054 1779 - paklim.wong@tfl.gov.uk).

Client contact details for London Borough of Islington: Elizabeth Reynolds - Principal Planning & Development Officer, Major Applications Team, Development Management, London Borough of Islington, Islington Town Hall, Upper Street, London, N1 2UD (020 7527 584 - Elizabeth.reynolds@islington.gov.uk).

1.3.2 Design Organisation

Design contact details: Milena Lipska - Associate, Velocity Transport Planning, Unit A, Taper Studios, The Leather Market, 120 Weston Street, London, SE1 4GS (07392 287355 - mlipska@velocity-tp.com).

1.3.3 Audit Team Approval

The Audit Team specified in 1.3.4 below were given approval to undertake this Audit by Andrew Coventry, Senior Engineering Leader, Highway and Traffic, TfL Engineering, on the 9th September 2020.

1.3.4 Audit Team

Audit Team Leader: Adriano B. Cappella - Acorns Projects Limited

Audit Team Member: Lisa Allen - Acorns Projects Limited

Audit Team Observer: None

1.3.5 Other Specialist Advisors

Specialist Advisor Details: None

1.4 Purpose of the Scheme

1.4.1 The proposed residential and commercial development is at the former Holloway Prison site in the London Borough of Islington. The proposed development will have two vehicular access points, one in Parkhurst Road and one in Camden Road. The northern access in Camden Road will be left-in/left out access only as at this point, Camden Road is one-way in the north east bound direction. The southern access in Camden Road is proposed as an all movements junction and will utilise the existing right turn facility for the nearby Dalmeny Avenue junction to the south. The internal road within the site will operate as a two-way road.

1.5 Special Considerations

1.5.1 The Audit Team has no special considerations to raise.

DRAFT

2.0 ITEMS RAISED IN PREVIOUS ROAD SAFETY AUDITS

- 2.1 The Audit Team is not aware of any other Audits having been carried out on the proposals.

DRAFT

3.0 ITEMS RAISED AT THIS STAGE 1 ROAD SAFETY AUDIT

3.1 LOCAL ALIGNMENT

3.1.1 PROBLEM

Location: 1 - The Parkhurst Road right turn facility for the southern access road junction and Dalmeny Avenue junction.

Summary: The proposed arrangement for the ghosted right turns could result in a potential increased risk of vehicular collisions occurring, whereby vehicle occupants could sustain personal injury.

The scheme proposals indicate that a new all movements southern site access road junction will be provided in Camden Road. Right turns into the southern site access road junction from Camden Road will be accommodated via a modified existing ghosted right turn facility for the Dalmeny Avenue junction, which is situated further to the south. In between the right turn arrangement for the southern site access road junction and the Dalmeny Avenue junction, it is proposed to separate the respective right turn movements with hatched carriageway markings.

Depending on the potential queue length back from the Dalmeny Avenue junction, particularly during the peak periods, it may be likely that the hatched carriageway markings will be occupied by queuing vehicles. In addition, and again depending on the potential queue length for the southern site access road junction, there may be vehicles joining the overall combined queue for a fair distance back in the northerly direction, from the end of the existing nearby one-way arrangement.

It is suggested that drivers seeking to queue only for the Dalmeny Avenue junction, may inadvertently get caught up in the queue for the southern site access road junction. When drivers realise they are being held back unnecessarily, they may react adversely and leave the queue for the southern site access road junction by driving to their left, without heeding the potential presence of approaching Camden Road south bound vehicular traffic. This situation could result in a potential increased risk of side impact vehicular collisions occurring, whereby vehicle occupants could sustain personal injury.

RECOMMENDATION

In the first instance, it is Recommended that the potential queue lengths for the Dalmeny Avenue junction and the southern site access road junction should be determined, particularly for the peak periods. If it is established that the hatched carriageway markings at Location 1 are required in order to fully accommodate the

Dalmeny Avenue junction right turn demand, then it is Recommended that the scheme proposals should progress as currently detailed.

If it is established that the Dalmeny Avenue junction right turn queuing demand will not require the use of the hatched carriageway markings, then it is Recommended that the two right turning movements should be separated with a traffic separation island being placed within the hatched carriageway markings.

The traffic separation island should not be designed in a manner which could attract pedestrian movements across the Camden Road carriageway, particularly as a signal-controlled crossing facility is situated to the south, adjacent to the Dalmeny Avenue junction. The recommended traffic separation island will assist drivers to recognise the difference between the correct right turn facility to be utilised, commensurate with their respective destinations.

Design Organisation Response	Rejected
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A site visit observation has been undertaken on 16 October 2020 in the morning network peak hour, when a maximum of four vehicles queuing to turn right into Dalmeny Avenue were observed. This equated to circa 25m queue, while the right turn lane is circa 60m long (between the stop lane and the to the proposed ghost island for the site access junction). This observation confirms that that the capacity of the right turn lane to Dalmeny Avenue is sufficient to accommodate the current traffic demand and/or the kerbed traffic separation island.

The proposed development is car free and will only have circa 30 blue badge car parking spaces on site. It was estimated that only four cars per hour will use the right turn lane to access the development site. This level of traffic is considered very low and is not expected to result in queues. As such, the likelihood of the occurrences when the queues (to Dalmeny Avenue and to the development site) to merge, are extremely low.

It should be noted that design of a ghost island for right turn movement is a common arrangement along Camden Road, and the recommended implementation of kerbed traffic island for the right turn to the development site is likely to confuse drivers even further. This arrangement could be perceived as more formal junction, that is more likely to be in place at the junction with Dalmeny Avenue (a traffic through road that connects with the number of other residential streets), rather than at the access junction to a single development site. As such, the extent of a potential behaviour when drivers get confused about the intended direction may in fact be more frequent if kerb traffic island is proposed.

Regardless of the type of island (kerbed, or ghost island), the risks of drivers leaving the queue by driving to their left would remain, however, the presence of a physical island reduces manoeuvrability to a driver to re-join ahead traffic, should this behaviour occur.

Implementation of kerbed traffic island may also require implementation of single lane dualling arrangement that would have an impact on the road space intake, potential reduction of traffic lanes width, could encourage pedestrian crossing movements and have an impact on right turn movements from the development site,

especially by larger vehicles.

To conclude, the current arrangement with ghost island is considered more appropriate for the location, proposed development, expected traffic movements and is considered to be safer than a provision of a kerbed traffic separation island.

Client Organisation Comments

3.2 JUNCTIONS

3.2.1 PROBLEM

Location: 2 - The southern site access road junction with Camden Road.

Summary: The swept path requirements of refuse vehicles and 10m rigid goods vehicles entering and exiting the southern site access road junction could result in a potential increased risk of vehicular collisions occurring with exiting vehicles, whereby vehicle occupants could sustain personal injury.

The scheme drawings provided for this Stage 1 Road Safety Audit include numerous swept path analysis exercises. The drawings clearly indicate that overrunning of the southern site access exit lane/centre of carriageway markings will take place when a refuse vehicle or a 10 metre rigid goods vehicle enters and exits the southern site access road.

Concern arises that this situation could result in a potential increased risk of side impact or head on type vehicular collisions occurring between refuse vehicles or a 10 metre rigid goods vehicle entering and exiting the southern site access road junction and exiting vehicles, whereby vehicle occupants could sustain personal injury.

In addition, should an entering refuse vehicle or a 10 metre rigid goods vehicle brake suddenly within the Camden Road carriageway due to the presence of a vehicle seeking to exit the southern site access road, there could be a potential increased risk of nose to tail shunt type collisions occurring between the leading and any following vehicles, whereby vehicle occupants could sustain personal injury.

RECOMMENDATION

It is Recommended that the junction geometry and the initial length of the southern site access road should be modified, in order to remove and mitigate the potential collision scenarios described above.

Design Organisation Response	Rejected
<p>The proposed geometry of the junction is suitable to accommodate vehicles expected to access and egress the development site, including; refuse vehicle and 10m rigid vehicle, however, movements by large vehicles will result in overrunning the centre lane at the minor arm.</p> <p>The proposed development is car free and will generate very low number of vehicle trips throughout the day. It was estimated that the development will generate a maximum of 13 vehicle trips (including two large vehicles only) to or from the development site during the peak hour at the southern access point. This equates to a vehicle movement every three minutes. This volume of movements, and a low proportion of heavy vehicles, is unlikely to results in conflicts at the junction.</p> <p>Geometric changes to the design of the junction, necessary to accommodate opposing movements by large vehicle and a car, would have resulted in an over-design geometry for the predicted use of the junction, (i.e. increased width of the pedestrian crossing and larger kerb radius). These geometric changes would have resulted in vehicles negotiating through the junction with greater speed that would compromise pedestrian safety.</p> <p>As such, the proposed design is considered suitable for the predicted vehicle movements expected to access and egress the development site through the southern junction.</p>	
Client Organisation Comments	

3.2.2 PROBLEM

Location: 3 - The southern site access road junction with Camden Road.

Summary: Proposed visibility splays could be impacted upon by the presence of trees and mature vegetation which could result in a potential increased risk of side impact collisions occurring between vehicles emerging from the southern site access road junction and, Camden Road vehicles, whereby vehicle occupants could sustain personal injury.

The scheme proposals indicate that a new all movements southern site access junction will be provided in Camden Road. Right turns into the southern site access junction from Camden Road will be accommodated by modifying the existing ghosted right turn facility for the Dalmeny Avenue junction, which is situated further to the south.

The site visit has established the presence of trees and mature vegetation on both sides of the proposed location of the southern site access junction, which will impact upon the proposed visibility splays of 2.4 x 43 metres indicated on the scheme drawing. Concern arises that the impact upon the proposed visibility splays could result in a potential increased risk of side impact collisions occurring between

vehicles emerging from the southern site access road junction and, Camden Road vehicles, whereby vehicle occupants could sustain personal injury.

RECOMMENDATION

It is Recommended that the proposed visibility splays should be completely clear of any potentially obstructive features, such as the trees and mature vegetation identified during the site visit in order to ensure that operational road safety is not compromised in the future scenario.

Design Organisation Response	Accepted
<p>It is proposed that the existing trees fronting the development will be removed as part of proposal. This includes the tree and vegetation immediately to the south of the proposed site access that would have otherwise affected the visibility splay to the right.</p> <p>The visibility to the left is achieved and the landscaping proposed to the front of the site will further improve visibility at this location.</p>	
Client Organisation Comments	

3.2.3 PROBLEM

Location: 4 - The northern site access road junction with Parkhurst Road.

Summary: The swept path requirements of refuse vehicles and 10m rigid goods vehicles entering the northern site access road junction could result in a potential increased risk of vehicular collisions occurring with exiting vehicles, whereby vehicle occupants could sustain personal injury.

The scheme drawings provided for this Stage 1 Road Safety Audit include numerous swept path analysis exercises. The drawings clearly indicate that overrunning of the northern site access exit lane/centre of carriageway markings will take place when a refuse vehicle or a 10 metre rigid goods vehicle enters the northern site access road.

Concern arises that this situation could result in a potential increased risk of side impact or head on type vehicular collisions occurring between refuse vehicles or a 10 metre rigid goods vehicle entering the northern site access road junction and exiting vehicles, whereby vehicle occupants could sustain personal injury.

In addition, should an entering refuse vehicle or a 10 metre rigid goods vehicle brake suddenly within the Parkhurst Road carriageway due to the presence of a vehicle seeking to exit the northern site access road, there could be a potential increased

risk of nose to tail shunt type collisions occurring between the leading and any following vehicles, whereby vehicle occupants could sustain personal injury.

RECOMMENDATION

It is Recommended that the junction geometry and the initial length of the northern site access road should be modified, in order to remove and mitigate the potential collision scenarios described above.

Design Organisation Response	Rejected
<p>The proposed geometry of the junction is suitable to accommodate vehicles expected to access and egress the development site, including; refuse vehicle and 10m rigid vehicle, however, movements by large vehicles will result in overrunning the centre lane at the minor arm.</p> <p>The proposed development is car free and will generate very low number of vehicle trips throughout the day. It was estimated that the development will generate a maximum of 13 vehicle trips (including two large vehicles only) to or from the development site during the peak hour at the southern access point. This equates to a vehicle movement every three minutes. This volume of movements, and a low proportion of heavy vehicles, is unlikely to result in conflicts at the junction.</p> <p>Geometric changes to the design of the junction, necessary to accommodate opposing movements by large vehicle and a car, would have resulted in an over-design geometry for the predicted use of the junction, (i.e. increased width of the pedestrian crossing and larger kerb radius). These geometric changes would have resulted in vehicles negotiating through the junction with greater speed that would compromise pedestrian safety.</p> <p>As such, the proposed design is considered suitable for the predicted vehicle movements expected to access and egress the development site through the southern junction.</p>	
Client Organisation Comments	

3.3 TRAFFIC SIGNS, CARRIAGEWAY MARKINGS AND LIGHTING

3.3.1 PROBLEM

Location: 5 - Opposite the northern site access road junction in Parkhurst Road.

Summary: Reminding drivers of the regulatory requirement to turn left out only from the northern site access junction, so as to minimise the potential for collisions to occur with north east bound Parkhurst Road vehicular traffic.

The scheme proposals indicate that drivers emerging from the northern site access junction will be reminded of the regulatory requirement to turn left only with a proposed turn left arrow carriageway marking and a "TURN LEFT" carriageway marking to Diagram 1036.1 within the junction bellmouth. At this Point, Parkhurst Road is one-way in the north east bound direction and it was noted from the site visit that a small One-Way sign with a left arrow to Diagram 810 was sited opposite the northern site access junction. The sign to Diagram 810, which has a very small sign face and thus is fairly inconspicuous, is understood to be used as an advisory sign for pedestrians, i.e. not for vehicular traffic use.

Concern arises that over time, the proposed carriageway markings to Diagram 1036.1 within the junction bellmouth will become worn and any driver failing to clearly see the remaining carriageway markings may attempt to turn right out of the northern site access junction. This situation could result in a potential increased risk of side impact or head on type collisions occurring with north east bound Parkhurst Road vehicular traffic, whereby vehicle occupants could sustain personal injury.

RECOMMENDATION

It is Recommended that at the detailed design stage of the project, a turn left regulatory traffic sign to Diagram 606 should be sited directly opposite the northern site access junction within the Parkhurst Road eastern footway, so as to remind drivers of the regulatory requirement to turn left and to minimise the potential for collisions to occur with north east bound Parkhurst Road vehicular traffic.

Alternatively, it is Recommended that a regulatory traffic sign to Diagram 609 should be sited on the corner of the northern site access junction prior to the Parkhurst Road carriageway.

Design Organisation Response	Accepted
A turn left regulatory traffic sign to Diagram 606 will be included as part of the design and the recommended locations will be considered at the detail design stage (i.e. sited directly opposite the northern site access junction within the Parkhurst Road eastern footway, or on the corner of the northern site access junction prior to the Parkhurst Road carriageway).	
Client Organisation Comments	

End of Problems identified and Recommendations offered in this Stage 1 Road Safety Audit

4.0 ISSUES IDENTIFIED DURING THE STAGE 1 ROAD SAFETY AUDIT THAT ARE OUTSIDE THE TERMS OF REFERENCE

Safety issues identified during the audit and site inspection that are considered to be outside the Terms of Reference, but which the Audit Team wishes to draw to the attention of the Client Organisation, are set out in this section. It is to be understood that, in raising these issues, the Audit Team in no way warrants that a full review of the highway environment has been undertaken beyond that necessary to undertake the Audit as commissioned.

4.1 ISSUE

Location: Within the footway to the south of the northern site access in Parkhurst Road.

Reason considered to be outside the Terms of Reference: The issue is outside the scope of the road safety audit.

The site visit has established that at the location indicated, an existing street lighting column has sustained vehicular impact/collision damage and is no longer perfectly upright. The lighting unit at the top of the column has fallen to the ground and therefore illumination of the adjacent highway area is no longer being provided. In addition, it is possible that the structural integrity of the existing street lighting column has been compromised whereby it could present a potential safety hazard for passing vehicular traffic, pedestrians and pedal cyclists. It is Recommended that the lighting column should be attended to as soon as practicable.

Design Organisation Response	Rejected
Noted, but the problem is outside of the remit of the proposed design.	
Client Organisation Comments	

4.2 ISSUE

Location: Within the existing footway to the north of the northern site access in Parkhurst Road.

Reason considered to be outside the Terms of Reference: The issue is considered to be more of a technical matter than an operational road safety issue.

The site visit has established the presence of an existing telecommunications chamber cover within the footway. The chamber cover is already reducing or limiting the area of tactile paving provided at the pedestrian crossing point at the junction. This is likely to reduce further when the amendments to the northern site access junction and its respective kerblines are undertaken. To maximise the area of tactile paving once the new kerbline has been installed, it is recommended that the inspection chamber cover should be relocated further to the north.

Design Organisation Response	Part Accepted
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The proposed access will require geometric changes to the kerb line and pedestrian crossing/ tactile paving will be upgraded as part of the design. This will be addressed at the detail design stage and is more likely to involve upgrading the chamber cover with bespoke tactile paving design, rather than relocating the chamber away from the pedestrian crossing.

Client Organisation Comments

DRAFT

5.0 SIGNATURES AND SIGN-OFF

5.1 AUDIT TEAM STATEMENT

We certify that we have examined the drawings and documents listed in Appendix A. to this Safety Audit report. The Road Safety Audit has been carried out in accordance with TfL Procedure SQA-0170 dated May 2014, with the sole purpose of identifying any feature that could be removed or modified in order to improve the safety of the measures. The problems identified have been noted in this report together with associated suggestions for safety improvements that we recommend should be studied for implementation.

No one on the Audit Team has been involved with the design of the measures.

AUDIT TEAM LEADER:

Name: Adriano B. Cappella Signed: IEng, FIHE, MCIHT, MSoRSA, HA RSA Certificate of Competency
Position: Director Date: ???? **October 2020**
Organisation: Acorns Projects Limited
Address: Redwood House, 3 Eaton Park, Eaton Bray, Bedfordshire, LU6 2SP
Contact: abc@acornsprojects.com 01525-222359 or 07860 629328

AUDIT TEAM MEMBER:

Name: Lisa Allen Signed: MSc, BEng (Hons), MCIHT, MSoRSA, HA RSA Certificate of Competency
Position: Associate Consultant Date: ???? **October 2020**
Organisation: Acorns Projects Limited
Address: Redwood House, 3 Eaton Park, Eaton Bray, Bedfordshire, LU6 2SP
Contact: abc@acornsprojects.com 01525-222359 or 07860 629328

5.2 DESIGN TEAM STATEMENT

In accordance with SQA-0170 dated May 2014, I certify that I have reviewed the items raised in this Stage 1 Road Safety Audit report. I have given due consideration to each issue raised and have stated my proposed course of action for each in this report. I seek the Client Organisations endorsement of my proposals.

Name: Milena Lipska

Position: Associate

Organisation: Velocity Transport Planning, Unit A, Taper Studios, The Leather Market, 120 Weston Street, London, SE1 4GS.

Signed: *Milena Lipska*

Dated: 23 October 2020

5.3 CLIENT ORGANISATION STATEMENT (TfL)

I accept these proposals by the Design Organisations.

Name: Pak-Lim Wong

Position: Planning Officer, City Planning

Organisation: Transport for London, 5 Endeavour Square, Westfield Avenue, Stratford, London, E20 1JN.

Signed:

Dated: ???? October 2020

5.4 CLIENT ORGANISATION STATEMENT (London Borough of Islington)

I accept these proposals by the Design Organisations.

Name: Elizabeth Reynolds

Position: Principal Planning & Development Officer

Organisation: Major Applications Team, Development Management, London Borough of Islington, Islington Town Hall, Upper Street, London, N1 2UD.

Signed:

Dated: ???? October 2020

APPENDIX A

Documents Forming the Audit Brief

DRAWING NUMBER

DRAWING TITLE

2490-1130-T-009	Redesigned Northern Site Access Junction
2490-1130-T-010	Redesigned Northern Site Access Junction - Swept Path Analysis - Islington Refuse Vehicle
2490-1130-T-011	Redesigned Northern Site Access Junction - Swept Path Analysis - FTA 10M Rigid
2490-1130-T-012	Redesigned Northern Site Access Junction - Swept Path Analysis - 4.6T Van and Medium Car
2490-1130-T-013	Proposed Southern Site Access Junction
2490-1130-T-014	Proposed Southern Site Access Junction - Swept Path Analysis - Islington Refuse Vehicle
2490-1130-T-015	Proposed Southern Site Access Junction - Swept Path Analysis - FTA 10M Rigid
2490-1130-T-016	Proposed Southern Site Access Junction - Swept Path Analysis - 4.6T Van and Medium Car

DOCUMENTS

DETAILS (where appropriate)

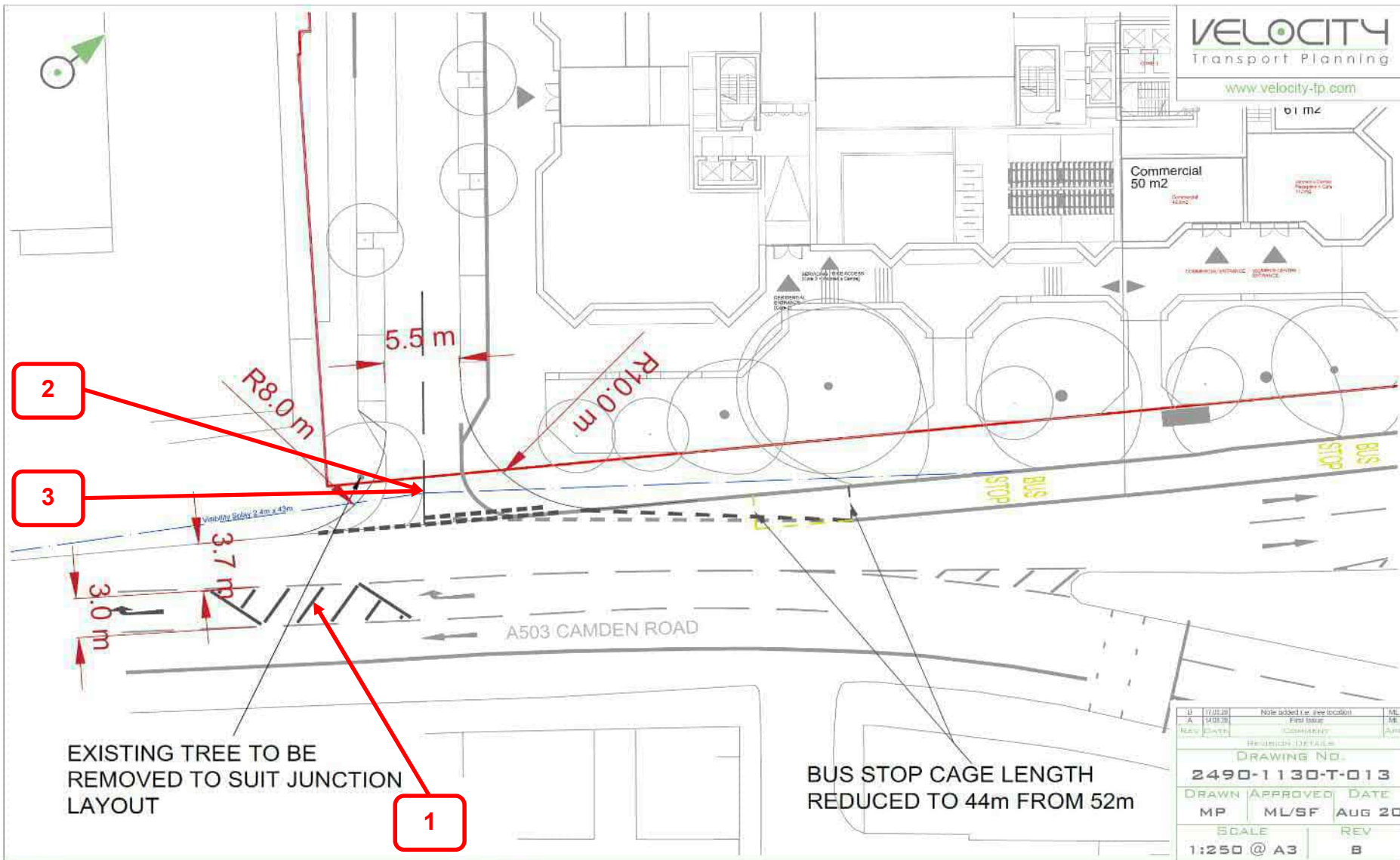
<input checked="" type="checkbox"/> Safety Audit Brief	Dated 04-09-2020
<input checked="" type="checkbox"/> Site Location Plan	
<input type="checkbox"/> Traffic signal details	Holloway Personal Injury Collisions 2017-2019 - 36 Months to December 2019 (128 Accidents) Dated 28-08-2020
<input type="checkbox"/> TfL signal safety checklist	
<input type="checkbox"/> Departures from standard	
<input type="checkbox"/> Previous Road Safety Audits	
<input type="checkbox"/> Previous Designer Responses	
<input checked="" type="checkbox"/> Collision data	
<input checked="" type="checkbox"/> Collision plot	
<input type="checkbox"/> Traffic flow/modelling data	
<input type="checkbox"/> Pedestrian flow/modelling data	
<input type="checkbox"/> Speed survey data	
<input type="checkbox"/> Other documents	

APPENDIX B

Problem Locations

DRAFT

Commercial
50 m2



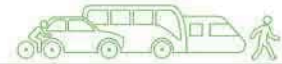
EXISTING TREE TO BE
REMOVED TO SUIT JUNCTION
LAYOUT

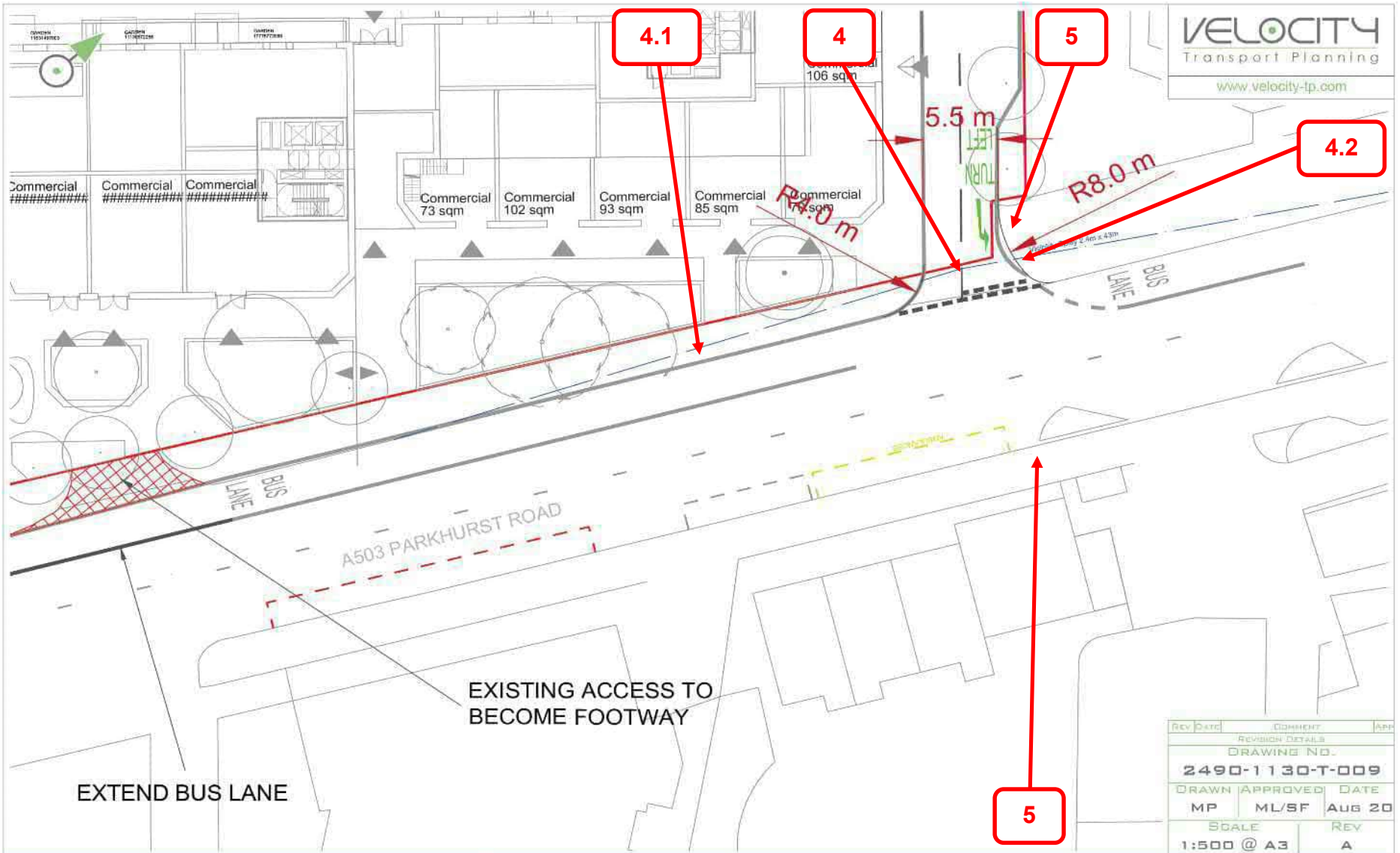
BUS STOP CAGE LENGTH
REDUCED TO 44m FROM 52m

U	01/20	Note added to site location	ML
A	01/20	Final sign	ML
REV	DATE	COMMENTS	APP
REVISION DETAILS			
DRAWING NO.			
2490-1130-T-013			
DRAWN	APPROVED	DATE	
MP	ML/SF	AUG 20	
SCALE		REV	
1:250 @ A3		B	

CLIENT
PEABODY
PROJECT
HOLLOWAY PRISON

DRAWING TITLE
PROPOSED SOUTHERN SITE ACCESS JUNCTION





REV	DATE	COMMENT	APP
REVISION DETAILS			
DRAWING NO.			
2490-1130-T-009			
DRAWN	APPROVED	DATE	
MP	ML/SF	AUG 20	
SCALE		REV	
1:500 @ A3		A	

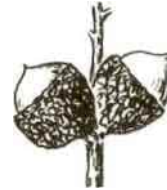
CLIENT
PEABODY

PROJECT
HOLLOWAY PRISON

DRAWING TITLE
REDESIGNED NORTHERN SITE ACCESS JUNCTION



ACORNS
PROJECTS
LIMITED



A503 Camden Road, London Borough of Islington

Proposed Pedestrian Crossing Modifications

Stage 1 Road Safety Audit

Ref: DRAFT A503 Camden Road LBo of Islington Pedestrian Crossing
Stage 1 RSA V1.0

Prepared for: **Velocity Transport Planning, Unit A, Taper Studios,
The Leather Market, 120 Weston Street, London, SE1 4GS.**

By: **Acorns Projects Limited - Safety Traffic Project Management &
Highway Engineering Consultants**

Prepared by: Adriano B. Cappella, Audit Team Leader

Checked by: Lisa Allen, Audit Team Member

Approved by: Adriano B. Cappella

Version	Status	Date
1.0	DRAFT	20-09-2021



1.0 INTRODUCTION

1.1 Commission

- 1.1.1 This report results from a Stage 1 Road Safety Audit carried out on the A503 Camden Road, London Borough of Islington, Proposed Pedestrian Crossing Modifications.
- 1.1.2 The Audit was undertaken by Acorns Projects Limited in accordance with the Audit Brief issued by Velocity Transport Planning on behalf of the Client Organisation on the 13th August 2021. It took place at the Eaton Bray offices of Acorns Projects Limited during August and September 2021 and comprised an examination of the documents provided as listed in Appendix A, plus a visit to the site of the proposed scheme.
- 1.1.3 A visit to the site of the proposed scheme was made on the 27th August 2021. During the site visit, the weather was mild and overcast and the existing road surface was dry.

1.2 Terms of Reference

- 1.2.1 The Terms of Reference of this Audit are as described in TfL Procedure SQA-0170 dated May 2014. The Audit Team has examined and reported only on the road safety implications of the scheme as presented and how it impacts on all road users and has not examined or verified the compliance of the designs to any other criteria. However, to clearly explain a safety problem or the recommendation to resolve a problem the Audit Team may, on occasion, have referred to a design standard without touching on technical audit. An absence of comment relating to specific road users/modes in Section 3 of this report does not imply that they have not been considered; instead the Audit Team feels they are not adversely affected by the proposed changes.
- 1.2.2 This Safety Audit is not intended to identify pre-existing hazards which remain unchanged due to the proposals; hence they will not be raised in Section 3 of this report as they fall outside the remit of Road Safety Audit in general as specified in the procedure SQA-0170 dated May 2014. Safety issues identified during the Audit and site visit that are considered to be outside the Terms of Reference, but which the Audit Team wishes to draw to the attention of the Client Organisation, are set out in Section 4 of this report.
- 1.2.3 Nothing in this Audit should be regarded as a direct instruction to include or remove a measure from within the scheme. Responsibility for designing the scheme lies with the Designer and as such the Audit Team accepts no design responsibility for any changes made to the scheme as a result of this Audit.
- 1.2.4 In accordance with TfL Procedure SQA-0170 dated May 2014, this Audit has a maximum shelf life of 2 years. If the scheme does not progress to the next stage in its development within this period, then the scheme should be re-audited.
- 1.2.5 Unless general to the scheme, all comments and recommendations are referenced to the detailed design drawings and the locations have been indicated on the plan located in Appendix B.

1.2.6 It is the responsibility of the Design Organisation to complete the Designer's response section of this Audit report. Where applicable and necessary it is the responsibility of the Client Organisations to complete the Client's comment section of this Audit report. Signatures from both the Design Organisation and Client Organisation must be added within Section 5 of this Audit report. A copy of which must be returned to the Audit Team.

1.3 Main Parties to the Audit

1.3.1 Client Organisations

Client contact details for TfL: Pak-Lim Wong - Planning Officer, City Planning, Transport for London, 5 Endeavour Square, Westfield Avenue, Stratford, London, E20 1JN (020 3054 1779 - paklim.wong@tfl.gov.uk).

Client contact details for London Borough of Islington: Elizabeth Reynolds - Principal Planning & Development Officer, Major Applications Team, Development Management, London Borough of Islington, Islington Town Hall, Upper Street, London, N1 2UD (020 7527 584 - elizabeth.reynolds@islington.gov.uk).

1.3.2 Design Organisation

Design contact details: Milena Lipska - Associate, Velocity Transport Planning, Unit A, Taper Studios, The Leather Market, 120 Weston Street, London, SE1 4GS (07392 287355 - mlipska@velocity-tp.com).

1.3.3 Audit Team Approval

The Audit Team specified in 1.3.4 below were given approval to undertake this Audit by Andrew Coventry, Senior Engineering Leader, Highway and Traffic, TfL Engineering, on the 26th August 2021.

1.3.4 Audit Team

Audit Team Leader: Adriano B. Cappella - Acorns Projects Limited

Audit Team Member: Lisa Allen - Acorns Projects Limited

Audit Team Observer: None

1.3.5 Other Specialist Advisors

Specialist Advisor Details: None

1.4 Purpose of the Scheme

1.4.1 The proposed residential and commercial development is at the former Holloway Prison site in the London Borough of Islington. As part of the project, on the opposite side of the carriageway on the A503 Camden Road, it is proposed to relocate an existing traffic signal controlled pedestrian crossing facility at the Camden Road/Hillmarton Road/Parkhurst Road traffic signal junction.

1.5 Special Considerations

1.5.1 The Audit Team has no special considerations to raise.

DRAFT

2.0 ITEMS RAISED IN PREVIOUS ROAD SAFETY AUDITS

- 2.1 The Audit Team is not aware of any other Audits having been carried out on the proposals.

DRAFT

3.0 ITEMS RAISED AT THIS STAGE 1 ROAD SAFETY AUDIT

- 3.1 The Audit Team has not identified any features of the scheme that could be removed or modified in order to improve the road safety of the measures.

End of Report - No Problems identified and Recommendations offered in this Stage 1 Road Safety Audit

DRAFT

4.0 ISSUES IDENTIFIED DURING THE STAGE 1 ROAD SAFETY AUDIT THAT ARE OUTSIDE THE TERMS OF REFERENCE

Safety issues identified during the audit and site inspection that are considered to be outside the Terms of Reference, but which the Audit Team wishes to draw to the attention of the Client Organisation, are set out in this section. It is to be understood that, in raising these issues, the Audit Team in no way warrants that a full review of the highway environment has been undertaken beyond that necessary to undertake the Audit as commissioned.

4.1 ISSUE

Location: Within the traffic separation island within the centre of the traffic signal junction.

Reason considered to be outside the Terms of Reference: The issue identified is considered to be more of a technical matter than an operational road safety issue.

The site visit has established that at the location indicated, there is a double BT inspection chamber present within the traffic separation island, which is likely to fall within the area where tactile paving will be installed when the existing pedestrian crossing is relocated to the position shown on the scheme drawings.

It is recommended that the existing double BT inspection chamber should be relocated or that the pedestrian crossing should be relocated slightly in order to avoid the chamber covers. Alternatively, the double BT inspection chamber covers should be changed such that tactile paving can be accommodated within the chamber covers accordingly.

Design Organisation Response	Accepted
The double BT inspection chamber will be changed to ensure that tactile paving can be accommodated within the chamber covers.	
Client Organisation Comments	

4.2 ISSUE

Location: Adjacent to the existing footway on the eastern side of Camden Road.

Reason considered to be outside the Terms of Reference: The issue identified is considered to be outside the scope of the road safety audit.

The site visit has established the presence of an existing tree within the residential property directly adjacent to the location of the proposed relocated pedestrian

crossing facility. The tree and its roots have caused the brick boundary wall and brick piers to be leaning quite heavily towards the adjacent footway area.

It is reasonable to suggest that without some form of remedial action, the brick boundary wall and piers may over time, collapse onto the adjacent footway area. As a result, it is recommended that the condition of the brick boundary wall and piers should be inspected and if necessary, remedial action to prevent a potential collapse should be undertaken.

Design Organisation Response	Part Accepted
Although the potential collapse risk of the brick boundary wall and piers is acknowledged, the issue is outside of the remit of the proposed development and will remain regardless of the proposal.	
Client Organisation Comments	

5.0 SIGNATURES AND SIGN-OFF

5.1 AUDIT TEAM STATEMENT

We certify that we have examined the drawings and documents listed in Appendix A. to this Safety Audit report. The Road Safety Audit has been carried out in accordance with TfL Procedure SQA-0170 dated May 2014, with the sole purpose of identifying any feature that could be removed or modified in order to improve the safety of the measures. The problems identified have been noted in this report together with associated suggestions for safety improvements that we recommend should be studied for implementation.

No one on the Audit Team has been involved with the design of the measures.

AUDIT TEAM LEADER:

Name: Adriano B. Cappella Signed:
IEng, FIHE, MCIHT, MSoRSA, HA RSA Certificate of Competency
Position: Director Date: ???? **September 2021**
Organisation: Acorns Projects Limited
Address: Redwood House, 3 Eaton Park, Eaton Bray, Bedfordshire, LU6 2SP
Contact: abc@acornsprojects.com 01525-222359 or 07860 629328

AUDIT TEAM MEMBER:

Name: Lisa Allen Signed:
MSc, BEng (Hons), MCIHT, MSoRSA, HA RSA Certificate of Competency
Position: Associate Consultant Date: ???? **September 2021**
Organisation: Acorns Projects Limited
Address: Redwood House, 3 Eaton Park, Eaton Bray, Bedfordshire, LU6 2SP
Contact: abc@acornsprojects.com 01525-222359 or 07860 629328

5.2 DESIGN TEAM STATEMENT

In accordance with SQA-0170 dated May 2014, I certify that I have reviewed the items raised in this Stage 1 Road Safety Audit report. I have given due consideration to each issue raised and have stated my proposed course of action for each in this report. I seek the Client Organisations endorsement of my proposals.

Name: Milena Lipska

Position: Associate

Organisation: Velocity Transport Planning, Unit A, Taper Studios, The Leather Market, 120 Weston Street, London, SE1 4GS.

Signed: **Dated: ????** **September 2021**

5.3 CLIENT ORGANISATION STATEMENT (TfL)

I accept these proposals by the Design Organisations.

Name: Pak-Lim Wong

Position: Planning Officer, City Planning

Organisation: Transport for London, 5 Endeavour Square, Westfield Avenue, Stratford, London, E20 1JN.

Signed: **Dated: ????** **September 2021**

5.4 CLIENT ORGANISATION STATEMENT (London Borough of Islington)

I accept these proposals by the Design Organisations.

Name: Elizabeth Reynolds

Position: Principal Planning & Development Officer

Organisation: Major Applications Team, Development Management, London Borough of Islington, Islington Town Hall, Upper Street, London, N1 2UD.

Signed: **Dated: ????** **September 2021**

APPENDIX A

Documents Forming the Audit Brief

DRAWING NUMBER

2490-1130-T-002 Rev C
2490-1130-T-021 Rev A
2490-1130-T-022 Rev A

DRAWING TITLE

A503 Pedestrian Crossing
A503 Camden Road - Hillmarton Road - Proposed
Traffic Signal Junction Layout
Swept Path Analysis of a 16.5m Articulated Vehicle

DOCUMENTS

- X Safety Audit Brief
- X Site Location Plan
- X Traffic signal details
- TfL signal safety checklist
- Departures from standard
- Previous Road Safety Audits
- Previous Designer Responses
- X Collision data

- X Collision plot
- Traffic flow/modelling data
- Pedestrian flow/modelling data
- Speed survey data
- Other documents

DETAILS (where appropriate)

Dated 13-08-2021

Traffic Signal Modelling Results

Holloway Personal Injury Collisions 2017-2019 - 36
Months to December 2019 (128 Accidents)
Dated 28-08-2020

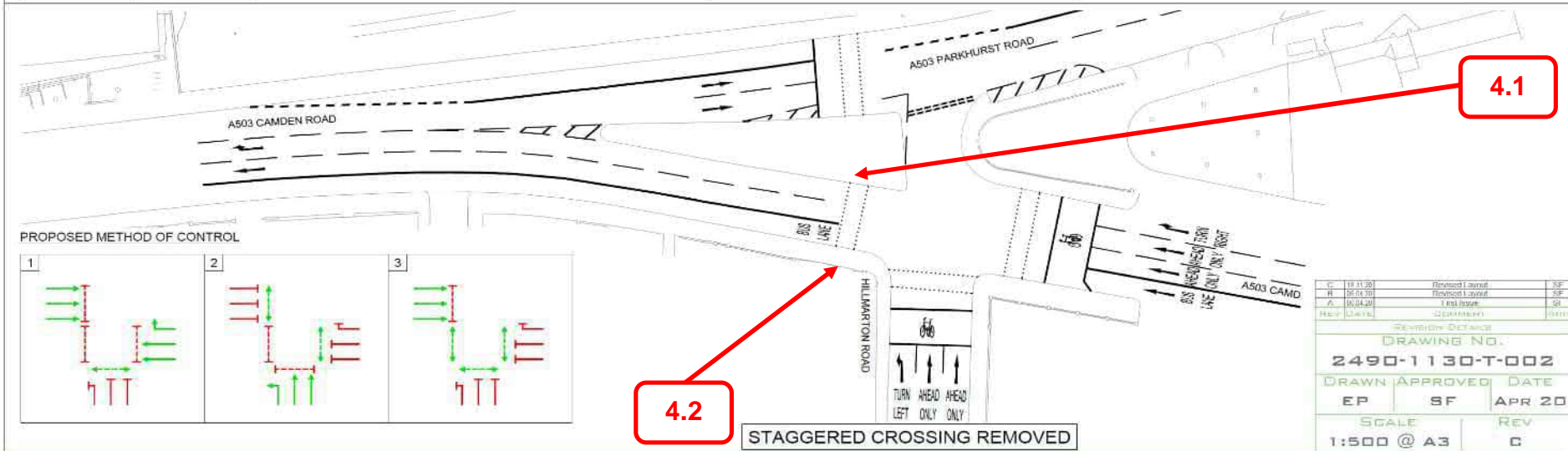
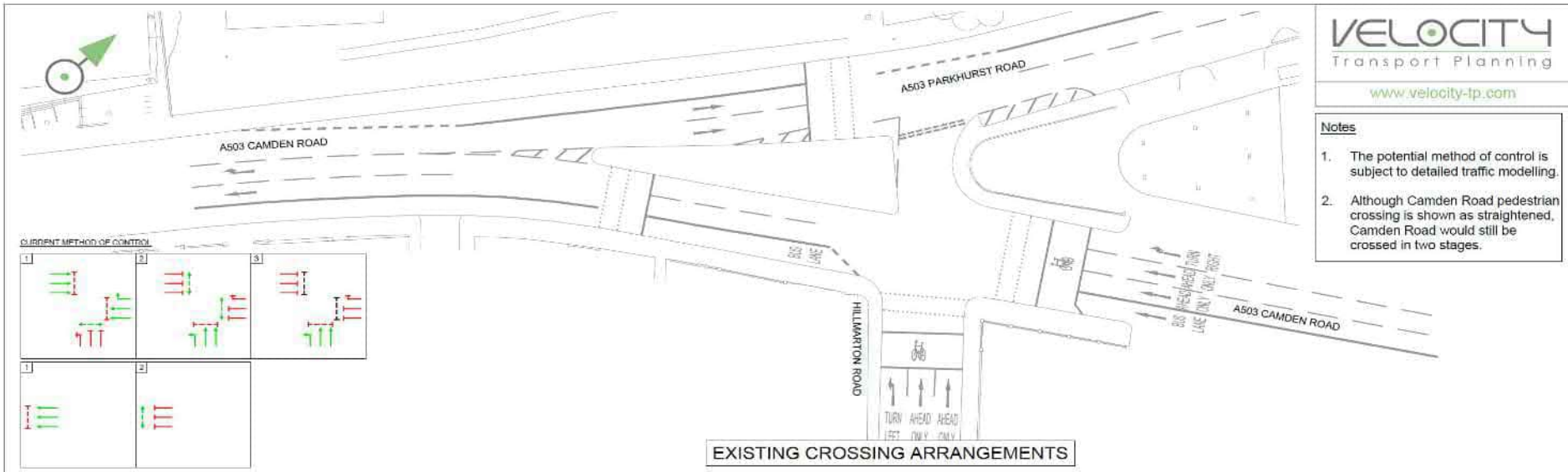
APPENDIX B

Problem Locations

DRAFT

Notes

1. The potential method of control is subject to detailed traffic modelling.
2. Although Camden Road pedestrian crossing is shown as straightened, Camden Road would still be crossed in two stages.

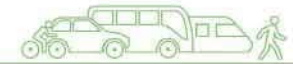


C	19/11/20	Project Lead	SF
H	26/04/20	Revision Lead	SF
A	06/04/20	1st Issue	SR
REV	DATE	BY (NAME)	CHK
Drawing Details			
DRAWING NO.			
2490-1130-T-002			
DRAWN		APPROVED	DATE
EP	SF		APR 20
SCALE		REV	
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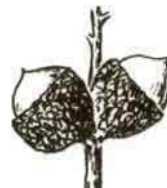
CLIENT
PEABODY

PROJECT
HOLLOWAY PRISON

DRAWING TITLE
A503 PEDESTRIAN CROSSING



**ACORNS
PROJECTS
LIMITED**



A503 Camden Road, London Borough of Islington

Proposed Fire Access Strategy

Stage 1 Road Safety Audit

Ref:DRAFTA503CamdenRoadFireAccessStrategyLBofIslington
Stage1RSAV1.0

Prepared for: **Velocity Transport Planning, Unit A, Taper Studios,
The Leather Market, 120 Weston Street, London, SE1 4GS.**

By: **Acorns Projects Limited - Safety Traffic Project Management &
Highway Engineering Consultants**

Prepared by: Adriano B. Cappella, Audit Team Leader

Checked by: Lisa Allen, Audit Team Member

Approved by: Adriano B. Cappella

Version	Status	Date
1.0	DRAFT	11-10-2021



1.0 INTRODUCTION

1.1 Commission

- 1.1.1 This report results from a Stage 1 Road Safety Audit carried out on the A503 Camden Road, London Borough of Islington, Proposed Fire Access Strategy Project.
- 1.1.2 The Audit was undertaken by Acorns Projects Limited in accordance with the Audit Brief issued by Velocity Transport Planning on behalf of the Client Organisation on the 19th September 2021. It took place at the Eaton Bray offices of Acorns Projects Limited during September and October 2021 and comprised an examination of the documents provided as listed in Appendix A, plus a visit to the site of the proposed scheme.
- 1.1.3 A visit to the site of the proposed scheme was made on the 28th September 2021. During the site visit, the weather was mild and overcast and the existing road surface was dry.

1.2 Terms of Reference

- 1.2.1 The Terms of Reference of this Audit are as described in TfL Procedure SQA-0170 dated May 2014. The Audit Team has examined and reported only on the road safety implications of the scheme as presented and how it impacts on all road users and has not examined or verified the compliance of the designs to any other criteria. However, to clearly explain a safety problem or the recommendation to resolve a problem the Audit Team may, on occasion, have referred to a design standard without touching on technical audit. An absence of comment relating to specific road users/modes in Section 3 of this report does not imply that they have not been considered; instead the Audit Team feels they are not adversely affected by the proposed changes.
- 1.2.2 This Safety Audit is not intended to identify pre-existing hazards which remain unchanged due to the proposals; hence they will not be raised in Section 3 of this report as they fall outside the remit of Road Safety Audit in general as specified in the procedure SQA-0170 dated May 2014. Safety issues identified during the Audit and site visit that are considered to be outside the Terms of Reference, but which the Audit Team wishes to draw to the attention of the Client Organisation, are set out in Section 4 of this report.
- 1.2.3 Nothing in this Audit should be regarded as a direct instruction to include or remove a measure from within the scheme. Responsibility for designing the scheme lies with the Designer and as such the Audit Team accepts no design responsibility for any changes made to the scheme as a result of this Audit.
- 1.2.4 In accordance with TfL Procedure SQA-0170 dated May 2014, this Audit has a maximum shelf life of 2 years. If the scheme does not progress to the next stage in its development within this period, then the scheme should be re-audited.
- 1.2.5 Unless general to the scheme, all comments and recommendations are referenced to the detailed design drawings and the locations have been indicated on the plan located in Appendix B.

- 1.2.6 It is the responsibility of the Design Organisation to complete the Designer's response section of this Audit report. Where applicable and necessary it is the responsibility of the Client Organisations to complete the Client's comment section of this Audit report. Signatures from both the Design Organisation and Client Organisation must be added within Section 5 of this Audit report. A copy of which must be returned to the Audit Team.

1.3 Main Parties to the Audit

1.3.1 Client Organisations

Client contact details for TfL: Pak-Lim Wong - Planning Officer, City Planning, Transport for London, 5 Endeavour Square, Westfield Avenue, Stratford, London, E20 1JN (020 3054 1779 - paklim.wong@tfl.gov.uk).

Client contact details for London Borough of Islington: Elizabeth Reynolds - Principal Planning & Development Officer, Major Applications Team, Development Management, London Borough of Islington, Islington Town Hall, Upper Street, London, N1 2UD (020 7527 584 - elizabeth.reynolds@islington.gov.uk).

1.3.2 Design Organisation

Design contact details: Milena Lipska - Associate, Velocity Transport Planning, Unit A, Taper Studios, The Leather Market, 120 Weston Street, London, SE1 4GS (07392 287355 - mlipska@velocity-tp.com).

1.3.3 Audit Team Approval

The Audit Team specified in 1.3.4 below were given approval to undertake this Audit by Chris Gooch, Senior Engineer, Highways and Traffic, TfL Engineering, on the 21st September 2021.

1.3.4 Audit Team

Audit Team Leader: Adriano B. Cappella - Acorns Projects Limited

Audit Team Member: Lisa Allen - Acorns Projects Limited

Audit Team Observer: None

1.3.5 Other Specialist Advisors

Specialist Advisor Details: None

1.4 Purpose of the Scheme

- 1.4.1 The proposed residential and commercial development is at the former Holloway Prison site in the London Borough of Islington. As part of the project, it is proposed that access for Fire Tenders to Plot C will be taken directly from the A503 Camden Road, adjacent to the Parkhurst Road/Hillmarton Road traffic signal junction. Dropped kerbs will be provided together with removable bollards and footway strengthening, sufficient to withstand the gross weight of a fire tender. A fire tender will enter in a forward direction and reverse out onto the footway before leaving the site following an emergency situation.

1.5 Special Considerations

1.5.1 The Audit Team has no special considerations to raise.

DRAFT

2.0 ITEMS RAISED IN PREVIOUS ROAD SAFETY AUDITS

- 2.1 The Audit Team is not aware of any other Audits having been carried out on the proposals.

DRAFT

3.0 ITEMS RAISED AT THIS STAGE 1 ROAD SAFETY AUDIT

3.1 WALKING & CYCLING

3.1.1 PROBLEM

Location: 1 - The western footway of Camden Road where fire tenders will be reversing.

Summary: The proposed arrangements for fire tenders to leave the site following an emergency could result in a slight potential increased risk of fire tender and pedestrian and perhaps pedal cyclist collisions occurring, whereby pedestrians and perhaps pedal cyclists could sustain personal injury.

It is proposed that access for fire tenders to Plot C will be taken directly from the A503 Camden Road, adjacent to the Parkhurst Road/Hillmarton Road traffic signal junction. Dropped kerbs will be provided together with removable bollards and footway strengthening, sufficient to withstand the gross weight of a fire tender. A fire tender will enter the development site in a forward direction and reverse out onto the western footway of Camden Road before leaving the development site following an emergency situation.

Whilst it is acknowledged that emergency situations at the development site will hopefully be infrequent, concern arises that the proposed arrangements for fire tenders to leave the development site following an emergency could result in a slight potential increased risk of fire tender and pedestrian and perhaps pedal cyclist collisions occurring, whereby pedestrians and pedal cyclists could sustain personal injury.

RECOMMENDATION

It is Recommended that provision should be made within the development site for fire tenders to be able to reverse and leave the development site in a forward direction, such that no reversing over the western footway area of Camden Road takes place where pedestrians and perhaps pedal cyclists may be present.

Should it be determined that the current proposals will have to be retained as part of the overall development site scheme proposals, then it is Recommended that any reversing manoeuvres by fire tenders or any other emergency vehicles should be undertaken only in controlled and marshalled circumstances.

Design Organisation Response	Accepted
-------------------------------------	-----------------

We would like to clarify that this fire access strategy is proposed for the Upper Floors for the southeast core within Plot C only, rather than the entire building (i.e Plot C). Other Cores and floors will be accessed from the development site.

We would like to confirm that it is not possible to provide fire vehicle access to this part of the building from the development site, and thus this alternative strategy is proposed with associated measures.

The recommendation that “any reversing manoeuvres by fire tenders or any other emergency vehicles will be undertaken in controlled and marshalled circumstances”. A site manager employed at the development site would take responsibility for this role and will be trained to safely perform the marshalling responsibilities in emergency circumstances. This can be covered during the 12 hour day time period, i.e. when the footway is expected to be used by a higher number of pedestrians.

There will be an evacuation strategy ‘Stay Put’ Policy in place for all buildings.

Client Organisation Comments

End of Problems identified and Recommendations offered in this Stage 1 Road Safety Audit

4.0 ISSUES IDENTIFIED DURING THE STAGE 1 ROAD SAFETY AUDIT THAT ARE OUTSIDE THE TERMS OF REFERENCE

Safety issues identified during the audit and site inspection that are considered to be outside the Terms of Reference, but which the Audit Team wishes to draw to the attention of the Client Organisation, are set out in this section. It is to be understood that, in raising these issues, the Audit Team in no way warrants that a full review of the highway environment has been undertaken beyond that necessary to undertake the Audit as commissioned.

The Audit Team has no issues to raise within this section

DRAFT

5.0 SIGNATURES AND SIGN-OFF

5.1 AUDIT TEAM STATEMENT

We certify that we have examined the drawings and documents listed in Appendix A. to this Safety Audit report. The Road Safety Audit has been carried out in accordance with TfL Procedure SQA-0170 dated May 2014, with the sole purpose of identifying any feature that could be removed or modified in order to improve the safety of the measures. The problems identified have been noted in this report together with associated suggestions for safety improvements that we recommend should be studied for implementation.

No one on the Audit Team has been involved with the design of the measures.

AUDIT TEAM LEADER:

Name: Adriano B. Cappella Signed:
IEng, FIHE, MCIHT, MSoRSA, HA RSA Certificate of Competency

Position: Director Date: **???? October 2021**

Organisation: Acorns Projects Limited

Address: Redwood House, 3 Eaton Park, Eaton Bray, Bedfordshire, LU6 2SP

Contact: abc@acornsprojects.com 01525-222359 or 07860 629328

AUDIT TEAM MEMBER:

Name: Lisa Allen Signed:
MSc, BEng (Hons), MCIHT, MSoRSA, HA RSA Certificate of Competency

Position: Associate Consultant Date: **???? October 2021**

Organisation: Acorns Projects Limited

Address: Redwood House, 3 Eaton Park, Eaton Bray, Bedfordshire, LU6 2SP

Contact: abc@acornsprojects.com 01525-222359 or 07860 629328

5.2 DESIGN TEAM STATEMENT

In accordance with SQA-0170 dated May 2014, I certify that I have reviewed the items raised in this Stage 1 Road Safety Audit report. I have given due consideration to each issue raised and have stated my proposed course of action for each in this report. I seek the Client Organisations endorsement of my proposals.

Name: Milena Lipska

Position: Associate

Organisation: Velocity Transport Planning, Unit A, Taper Studios, The Leather Market, 120 Weston Street, London, SE1 4GS.

Signed: *Milena Lipska*

Dated: 11 October 2021

5.3 CLIENT ORGANISATION STATEMENT (TfL)

I accept these proposals by the Design Organisations.

Name: Pak-Lim Wong

Position: Planning Officer, City Planning

Organisation: Transport for London, 5 Endeavour Square, Westfield Avenue, Stratford, London, E20 1JN.

Signed:

Dated: ???? October 2021

5.4 CLIENT ORGANISATION STATEMENT (London Borough of Islington)

I accept these proposals by the Design Organisations.

Name: Elizabeth Reynolds

Position: Principal Planning & Development Officer

Organisation: Major Applications Team, Development Management, London Borough of Islington, Islington Town Hall, Upper Street, London, N1 2UD.

Signed:

Dated: ???? October 2021

APPENDIX A

Documents Forming the Audit Brief

DRAWING NUMBER

2490-1130-T-011 Rev A

DRAWING TITLE

Swept Path Analysis - Fire Access to Plot C

DOCUMENTS

- X Safety Audit Brief
- X Site Location Plan
- Traffic signal details
- TfL signal safety checklist
- Departures from standard
- Previous Road Safety Audits
- Previous Designer Responses
- X Collision data

- X Collision plot
- Traffic flow/modelling data
- Pedestrian flow/modelling data
- Speed survey data
- Other documents

DETAILS (where appropriate)

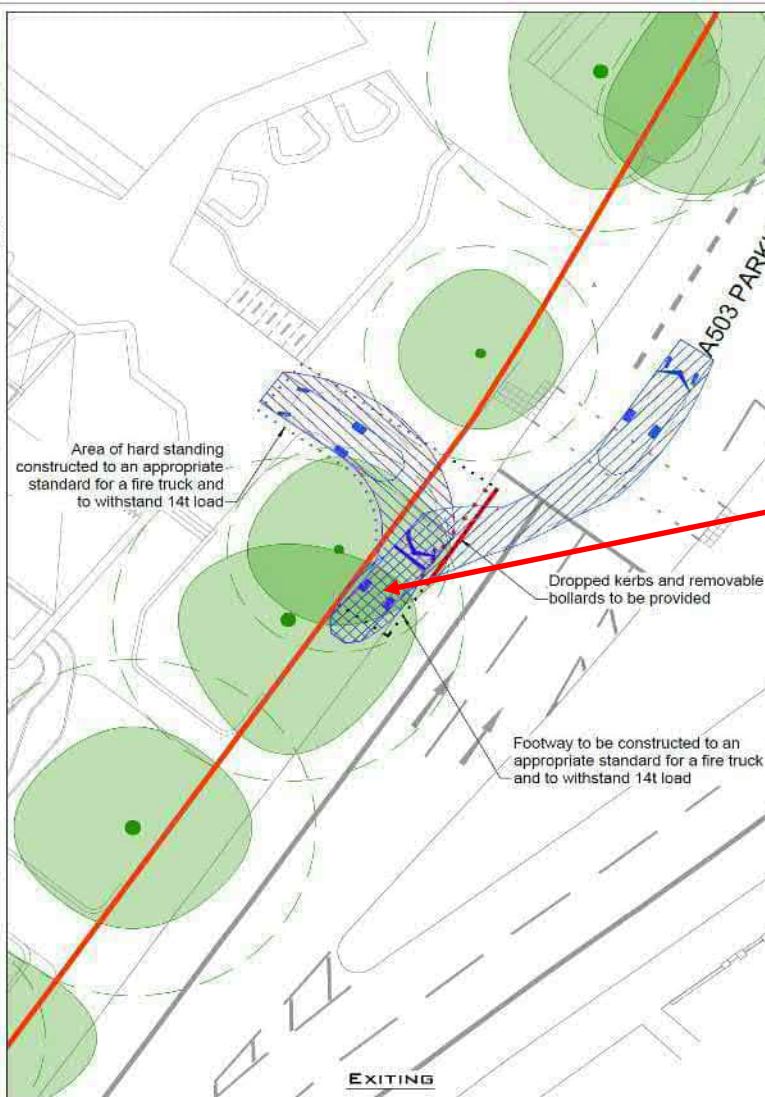
Dated 19-09-2021

Holloway Personal Injury Collisions 2017-2019 - 36
Months to December 2019 (128 Accidents)
Dated 28-08-2020

APPENDIX B

Problem Locations

DRAFT



1

REV	DATE	BY	APP	DESCRIPTION
A	12/02/21	ML	ML	ISSUE FOR COMMENT

REVISION DETAILS

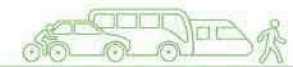
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2490-1130-T-011

DRAWN	APPROVED	DATE
TC	ML	AUG 21

SCALE	REV
1:250 @ A3	A

CLIENT
PEABODY
PROJECT
HOLLOWAY PRISON

DRAWING TITLE
SWEPT PATH ANALYSIS - FIRE ACCESS TO PLOT C



APPENDIX G

JUNCTIONS 9 MODELLING



<h1>Junctions 9</h1>
<h2>PICADY 9 - Priority Intersection Module</h2>
Version: 9.0.2.5947 © Copyright TRL Limited, 2017
For sales and distribution information, program advice and maintenance, contact TRL: +44 (0)1344 770558 software@trl.co.uk www.trlsoftware.co.uk
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Filename: 031120_Southern_Access.j9

Path: C:\Users\MLipska\Downloads

Report generation date: 25/02/2021 17:22:21

«2028+Committed+Proposed - 2028, AM

- »Junction Network
- »Arms
- »Traffic Demand
- »Origin-Destination Data
- »Vehicle Mix
- »Results

Summary of junction performance

	AM				PM			
	Queue (PCU)	Delay (s)	RFC	LOS	Queue (PCU)	Delay (s)	RFC	LOS
2028+Committed+Proposed - 2028								
Stream B-AC	0.0	14.39	0.04	B	0.1	15.71	0.05	C
Stream C-AB	0.0	7.40	0.01	A	0.0	8.40	0.01	A

Values shown are the highest values encountered over all time segments. Delay is the maximum value of average delay per arriving vehicle.

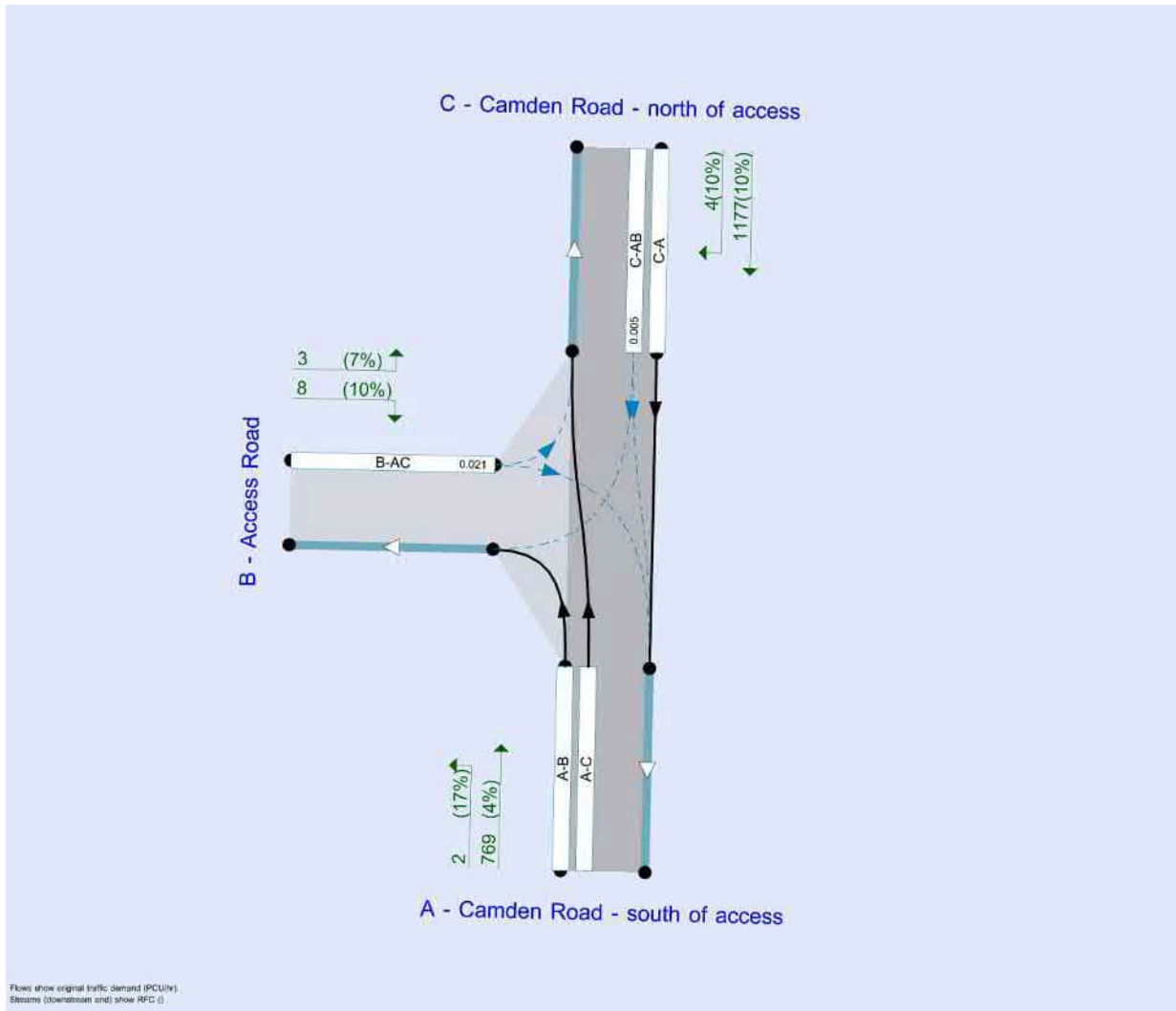
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File Description

Title	(untitled)
Location	
Site number	
Date	03/11/2020
Version	
Status	(new file)
Identifier	
Client	
Jobnumber	
Enumerator	VTP\MKiraly
Description	

Units

Distance units	Speed units	Traffic units input	Traffic units results	Flow units	Average delay units	Total delay units	Rate of delay units
m	kph	PCU	PCU	perHour	s	-Min	perMin



The junction diagram reflects the last run of Junctions.

Analysis Options

Calculate Queue Percentiles	Calculate residual capacity	RFC Threshold	Average Delay threshold (s)	Queue threshold (PCU)
		0.85	36.00	20.00

Analysis Set Details

ID	Name	Network flow scaling factor (%)
A1	2028+Committed+Proposed	100.000

Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D1	2028	AM	ONE HOUR	08:00	09:30	15

2028+Committed+Proposed - 2028, AM

Data Errors and Warnings

No errors or warnings

Junction Network

Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	untitled	T-Junction	Two-way	0.10	A

Junction Network Options

Driving side	Lighting
Left	Normal/unknown

Arms

Arms

Arm	Name	Description	Arm type
A	Camden Road - south of access		Major
B	Access Road		Minor
C	Camden Road - north of access		Major

Major Arm Geometry

Arm	Width of carriageway (m)	Has kerbed central reserve	Has right turn bay	Width for right turn (m)	Visibility for right turn (m)	Blocks?	Blocking queue (PCU)
C - Camden Road - north of access	11.60		✓	3.00	150.0	✓	4.00

Geometries for Arm C are measured opposite Arm B. Geometries for Arm A (if relevant) are measured opposite Arm D.

Minor Arm Geometry

Arm	Minor arm type	Lane width (m)	Visibility to left (m)	Visibility to right (m)
B - Access Road	One lane	4.50	35	25

Slope / Intercept / Capacity

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
1	B-A	576	0.079	0.201	0.126	0.287
1	B-C	736	0.085	0.216	-	-
1	C-B	718	0.211	0.211	-	-

The slopes and intercepts shown above do NOT include any corrections or adjustments.

Streams may be combined, in which case capacity will be adjusted.

Values are shown for the first time segment only; they may differ for subsequent time segments.

Traffic Demand

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A - Camden Road - south of access		✓	771	100.000
B - Access Road		✓	11	100.000
C - Camden Road - north of access		✓	1181	100.000

Origin-Destination Data

Demand (PCU/hr)

		To		
From		A - Camden Road - south of access	B - Access Road	C - Camden Road - north of access
	A - Camden Road - south of access	0	2	769
	B - Access Road	8	0	3
	C - Camden Road - north of access	1177	4	0

Vehicle Mix

Heavy Vehicle Percentages

		To		
From		A - Camden Road - south of access	B - Access Road	C - Camden Road - north of access
	A - Camden Road - south of access	10	17	4
	B - Access Road	10	10	7
	C - Camden Road - north of access	10	10	10

Results

Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-AC	0.04	14.39	0.0	B
C-AB	0.01	7.40	0.0	A
C-A				
A-B				
A-C				

Main Results for each time segment

08:00 - 08:15

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	8	394	0.021	8	0.0	10.192	B
C-AB	3	596	0.005	3	0.0	6.675	A
C-A	886			886			
A-B	2			2			
A-C	579			579			

08:15 - 08:30

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	10	349	0.028	10	0.0	11.588	B
C-AB	4	572	0.006	4	0.0	6.960	A
C-A	1058			1058			
A-B	2			2			
A-C	691			691			

08:30 - 08:45

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	12	285	0.042	12	0.0	14.381	B
C-AB	4	540	0.008	4	0.0	7.397	A
C-A	1296			1296			
A-B	2			2			
A-C	847			847			

08:45 - 09:00

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	12	285	0.042	12	0.0	14.387	B
C-AB	4	540	0.008	4	0.0	7.397	A
C-A	1296			1296			
A-B	2			2			
A-C	847			847			

09:00 - 09:15

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	10	349	0.028	10	0.0	11.597	B
C-AB	4	572	0.006	4	0.0	6.963	A
C-A	1058			1058			
A-B	2			2			
A-C	691			691			

09:15 - 09:30

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	8	394	0.021	8	0.0	10.200	B
C-AB	3	596	0.005	3	0.0	6.675	A
C-A	886			886			
A-B	2			2			
A-C	579			579			

<h1>Junctions 9</h1>
<h2>PICADY 9 - Priority Intersection Module</h2>
Version: 9.0.2.5947 © Copyright TRL Limited, 2017
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Filename: 201028_Northern_Access.j9

Path: C:\Users\MLipska\Downloads

Report generation date: 25/02/2021 17:21:47

»2028+Committed+Proposed - 2028, AM

»2028+Committed+Proposed - 2028, PM

Summary of junction performance

	AM				PM			
	Queue (PCU)	Delay (s)	RFC	LOS	Queue (PCU)	Delay (s)	RFC	LOS
2028+Committed+Proposed - 2028								
Stream B-AC	0.0	0.00	0.00	A	0.0	0.00	0.00	A
Stream C-AB	0.0	0.00	0.00	A	0.0	0.00	0.00	A

Values shown are the highest values encountered over all time segments. Delay is the maximum value of average delay per arriving vehicle.

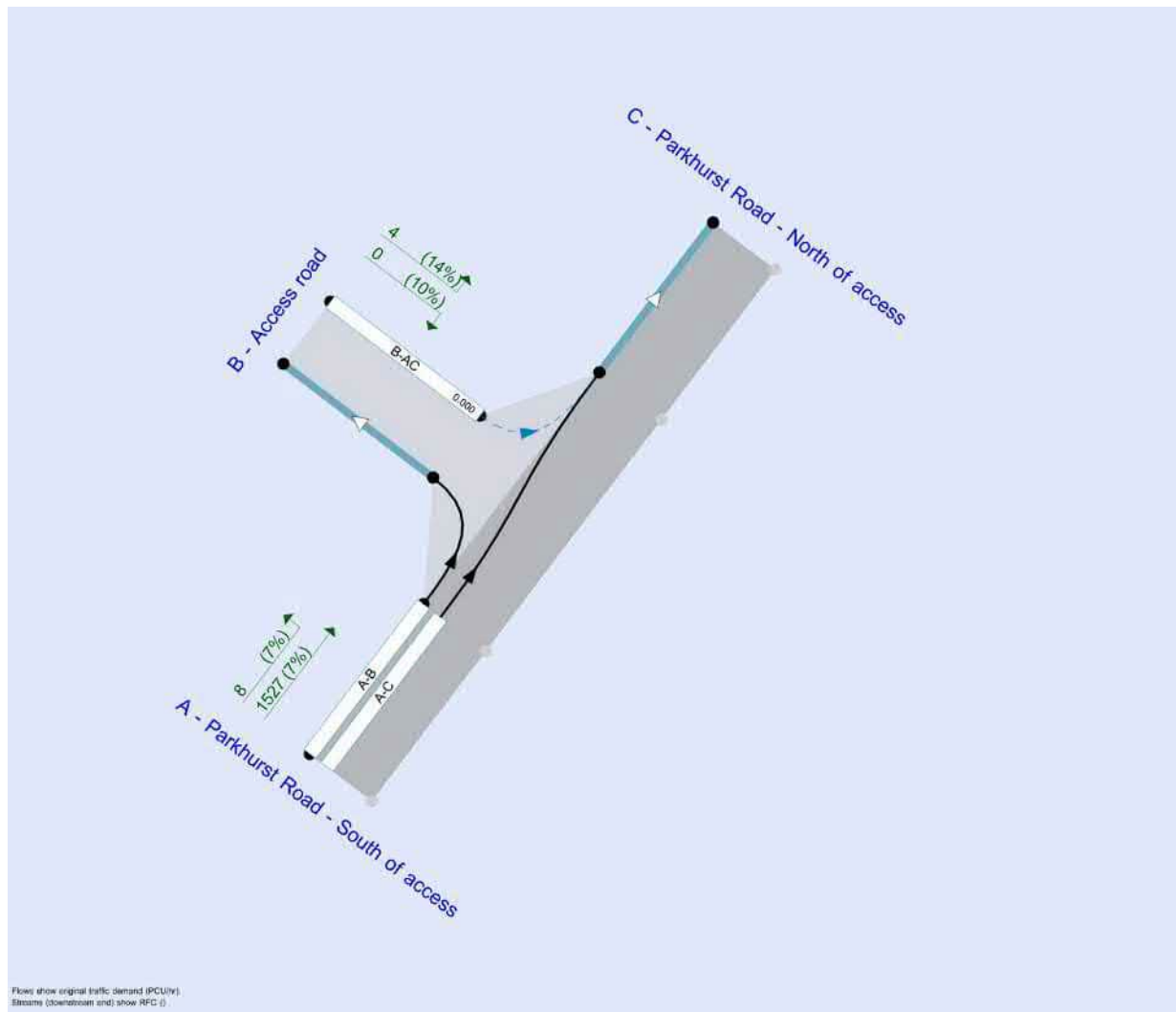
File summary

File Description

Title	Holloway Prison - Northern Access
Location	Parkhurst Rd, London N7 0NU
Site number	
Date	28/10/2020
Version	
Status	(new file)
Identifier	
Client	2490 - Peabody
Jobnumber	1130
Enumerator	VTP\CWhyman
Description	

Units

Distance units	Speed units	Traffic units input	Traffic units results	Flow units	Average delay units	Total delay units	Rate of delay units
m	kph	PCU	PCU	perHour	s	-Min	perMin



The junction diagram reflects the last run of Junctions.

Analysis Options

Calculate Queue Percentiles	Calculate residual capacity	RFC Threshold	Average Delay threshold (s)	Queue threshold (PCU)
		0.85	36.00	20.00

Demand Set Summary

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D1	2028	AM	ONE HOUR	08:00	09:30	15
D2	2028	PM	ONE HOUR	17:00	18:30	15

Analysis Set Details

ID	Name	Network flow scaling factor (%)
A1	2028+Committed+Proposed	100.000

2028+Committed+Proposed - 2028, AM

Data Errors and Warnings

No errors or warnings

Junction Network

Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	Parkhurst Road / Access	T-Junction	One-way from A to C	0.00	A

Junction Network Options

Driving side	Lighting
Left	Normal/unknown

Arms

Arms

Arm	Name	Description	Arm type
A	Parkhurst Road - South of access		Major
B	Access road		Minor
C	Parkhurst Road - North of access		Major

Major Arm Geometry

Arm	Width of carriageway (m)	Has kerbed central reserve	Has right turn bay	Visibility for right turn (m)	Blocks?	Blocking queue (PCU)
C - Parkhurst Road - North of access	12.00				✓	

Geometries for Arm C are measured opposite Arm B. Geometries for Arm A (if relevant) are measured opposite Arm D.

Minor Arm Geometry

Arm	Minor arm type	Lane width (m)	Visibility to left (m)	Visibility to right (m)
B - Access road	One lane	3.35	18	20

Slope / Intercept / Capacity

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
1	B-A	510	0.020	0.051	0.032	0.073
1	B-C	659	0.022	0.055	-	-
1	C-B	626	0.053	0.053	-	-

The slopes and intercepts shown above do NOT include any corrections or adjustments.

Streams may be combined, in which case capacity will be adjusted.

Values are shown for the first time segment only; they may differ for subsequent time segments.

Traffic Demand

Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D1	2028	AM	ONE HOUR	08:00	09:30	15

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A - Parkhurst Road - South of access		✓	1205	100.000
B - Access road		✓	3	100.000
C - Parkhurst Road - North of access		✓	0	100.000

Origin-Destination Data

Demand (PCU/hr)

From	To		
	A - Parkhurst Road - South of access	B - Access road	C - Parkhurst Road - North of access
A - Parkhurst Road - South of access	0	6	1199
B - Access road	0	0	3
C - Parkhurst Road - North of access	0	0	0

Vehicle Mix

Heavy Vehicle Percentages

From	To		
	A - Parkhurst Road - South of access	B - Access road	C - Parkhurst Road - North of access
A - Parkhurst Road - South of access	10	17	4
B - Access road	10	10	7
C - Parkhurst Road - North of access	10	10	10

Results

Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-AC	0.00	0.00	0.0	A
C-AB	0.00	0.00	0.0	A
C-A				
A-B				
A-C				

Main Results for each time segment

08:00 - 08:15

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	0	527	0.000	0	0.0	0.000	A
C-AB	0	578	0.000	0	0.0	0.000	A
C-A	0			0			
A-B	5			5			
A-C	903			903			

08:15 - 08:30

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	0	517	0.000	0	0.0	0.000	A
C-AB	0	569	0.000	0	0.0	0.000	A
C-A	0			0			
A-B	5			5			
A-C	1078			1078			

08:30 - 08:45

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	0	504	0.000	0	0.0	0.000	A
C-AB	0	556	0.000	0	0.0	0.000	A
C-A	0			0			
A-B	7			7			
A-C	1320			1320			

08:45 - 09:00

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	0	504	0.000	0	0.0	0.000	A

C-AB	0	556	0.000	0	0.0	0.000	A
C-A	0			0			
A-B	7			7			
A-C	1320			1320			

09:00 - 09:15

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	0	517	0.000	0	0.0	0.000	A
C-AB	0	569	0.000	0	0.0	0.000	A
C-A	0			0			
A-B	5			5			
A-C	1078			1078			

09:15 - 09:30

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	0	527	0.000	0	0.0	0.000	A
C-AB	0	578	0.000	0	0.0	0.000	A
C-A	0			0			
A-B	5			5			
A-C	903			903			

2028+Committed+Proposed - 2028, PM

Data Errors and Warnings

No errors or warnings

Junction Network

Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	Parkhurst Road / Access	T-Junction	One-way from A to C	0.00	A

Junction Network Options

Driving side	Lighting
Left	Normal/unknown

Traffic Demand

Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D2	2028	PM	ONE HOUR	17:00	18:30	15

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A - Parkhurst Road - South of access		✓	1535	100.000
B - Access road		✓	4	100.000
C - Parkhurst Road - North of access		✓	0	100.000

Origin-Destination Data

Demand (PCU/hr)

		To		
		A - Parkhurst Road - South of access	B - Access road	C - Parkhurst Road - North of access
From	A - Parkhurst Road - South of access	0	8	1527
	B - Access road	0	0	4
	C - Parkhurst Road - North of access	0	0	0

Vehicle Mix

Heavy Vehicle Percentages

		To		
		A - Parkhurst Road - South of access	B - Access road	C - Parkhurst Road - North of access
From	A - Parkhurst Road - South of access	10	7	7
	B - Access road	10	10	14
	C - Parkhurst Road - North of access	10	10	10

Results

Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-AC	0.00	0.00	0.0	A
C-AB	0.00	0.00	0.0	A
C-A				
A-B				

A-C				
-----	--	--	--	--

Main Results for each time segment

17:00 - 17:15

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	0	514	0.000	0	0.0	0.000	A
C-AB	0	565	0.000	0	0.0	0.000	A
C-A	0			0			
A-B	6			6			
A-C	1150			1150			

17:15 - 17:30

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	0	502	0.000	0	0.0	0.000	A
C-AB	0	553	0.000	0	0.0	0.000	A
C-A	0			0			
A-B	7			7			
A-C	1373			1373			

17:30 - 17:45

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	0	485	0.000	0	0.0	0.000	A
C-AB	0	537	0.000	0	0.0	0.000	A
C-A	0			0			
A-B	9			9			
A-C	1681			1681			

17:45 - 18:00

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	0	485	0.000	0	0.0	0.000	A
C-AB	0	537	0.000	0	0.0	0.000	A
C-A	0			0			
A-B	9			9			
A-C	1681			1681			

18:00 - 18:15

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	0	502	0.000	0	0.0	0.000	A
C-AB	0	553	0.000	0	0.0	0.000	A
C-A	0			0			
A-B	7			7			
A-C	1373			1373			

18:15 - 18:30

Stream	Total Demand (PCU/hr)	Capacity (PCU/hr)	RFC	Throughput (PCU/hr)	End queue (PCU)	Delay (s)	LOS
B-AC	0	514	0.000	0	0.0	0.000	A
C-AB	0	565	0.000	0	0.0	0.000	A
C-A	0			0			
A-B	6			6			
A-C	1150			1150			

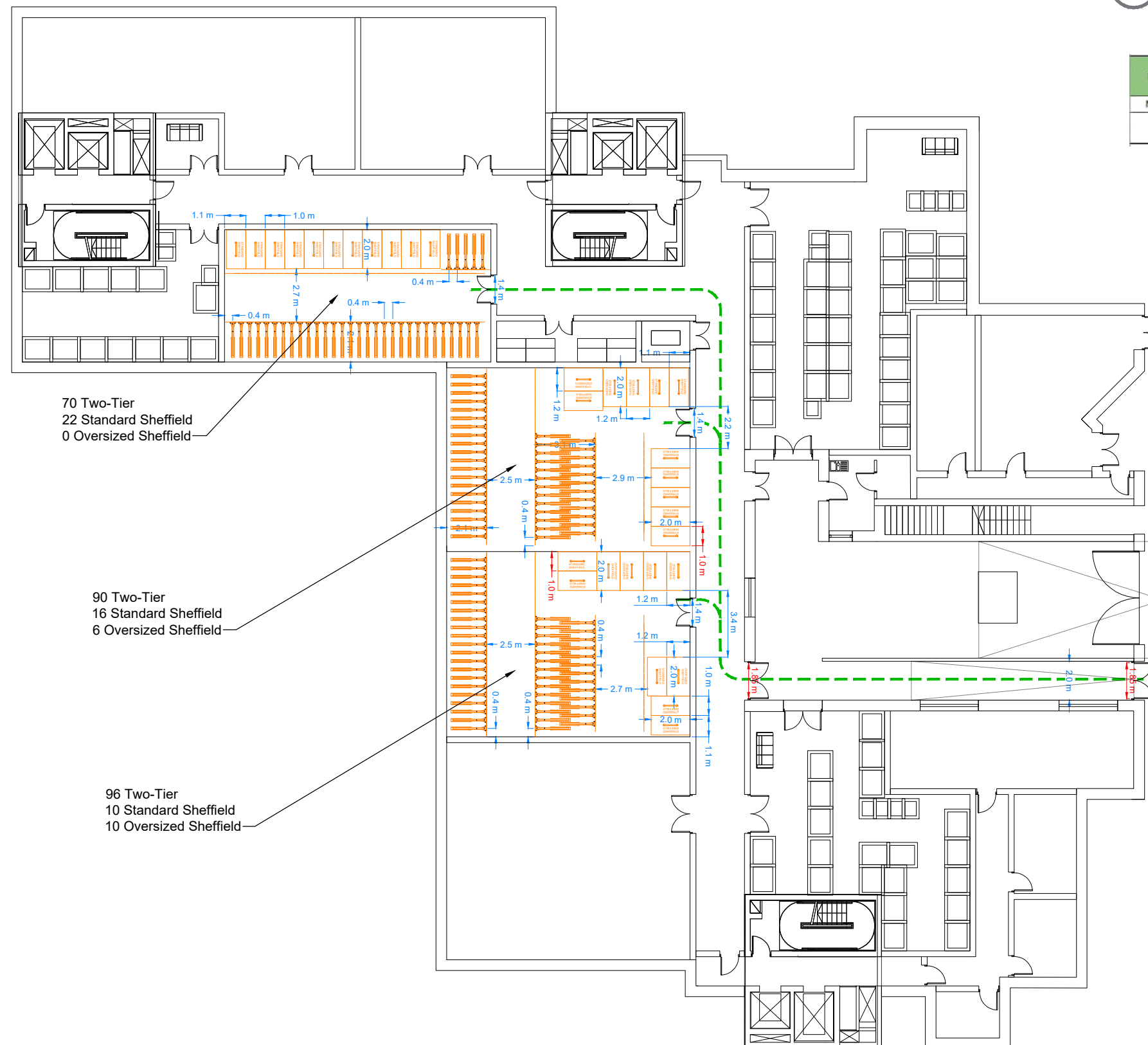
APPENDIX H

CYCLE PARKING PROVISION





PLOT A - Residential Parking	Two-tier stands	Standard Sheffield stands	Oversized Sheffield stands	Total
Minimum Required as per LP	356	67	22	445
Provided	336	88	22	446
	75%	20%	5%	100%



70 Two-Tier
22 Standard Sheffield
0 Oversized Sheffield

90 Two-Tier
16 Standard Sheffield
6 Oversized Sheffield

96 Two-Tier
10 Standard Sheffield
10 Oversized Sheffield

REV	DATE	COMMENT	APP
B	01.11.21	Updated Layout	ML
A	16.09.21	First Issue	ML

REVISION DETAILS

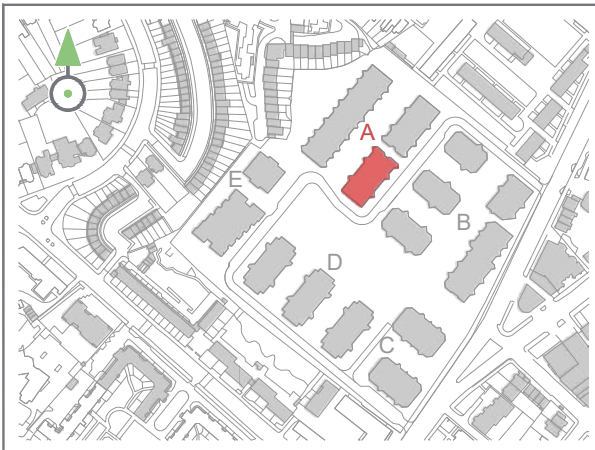
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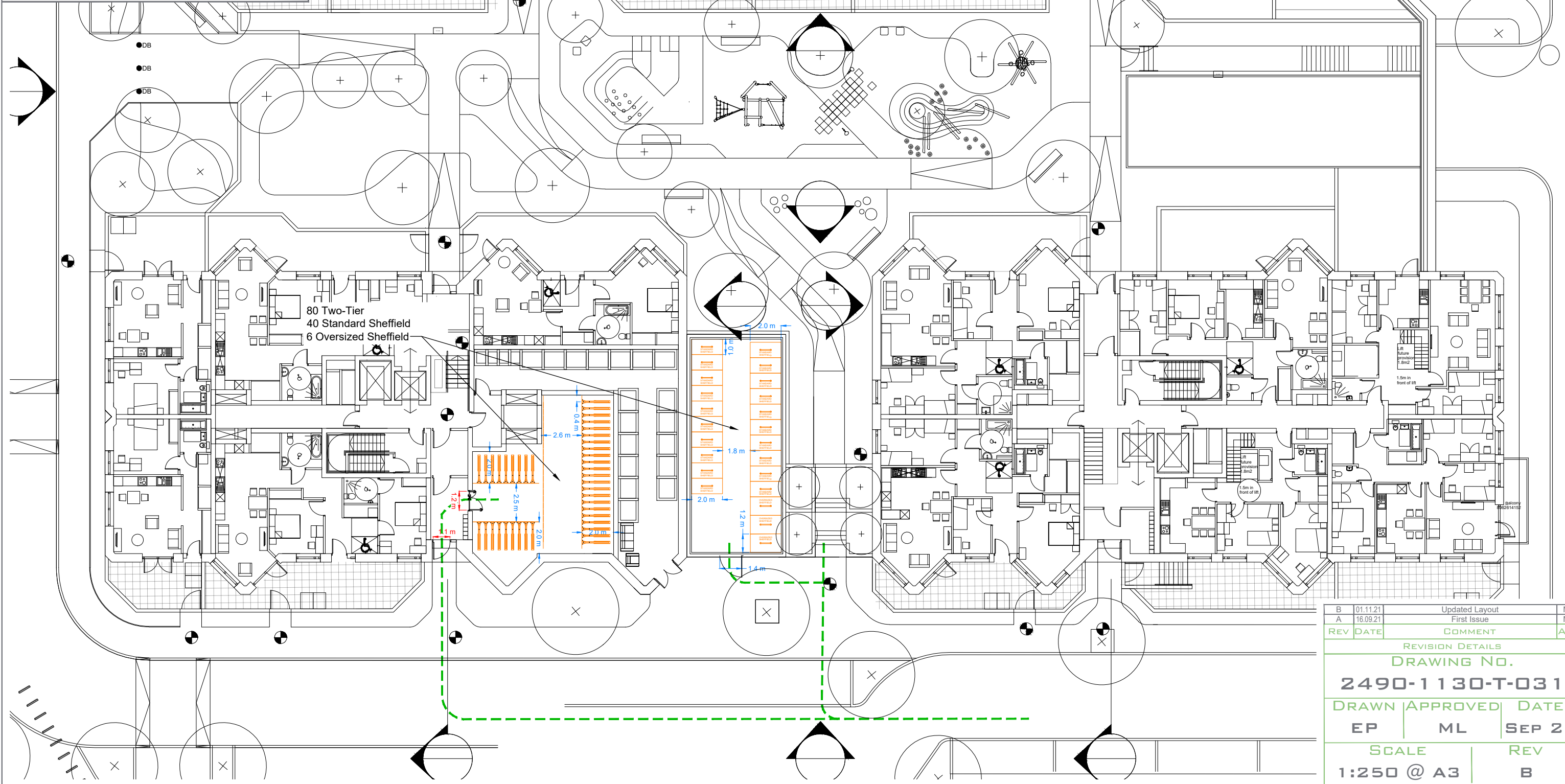
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EP	ML	SEP 21

SCALE	REV
1:250 @ A3	B





PLOT A - Residential Parking	Two-tier stands	Standard Sheffield stands	Oversized Sheffield stands	Total
Minimum Required as per LP	356	67	22	445
Provided	336	88	22	446
	75%	20%	5%	100%



REV	DATE	COMMENT	APP
B	01.11.21	Updated Layout	ML
A	16.09.21	First Issue	ML

REVISION DETAILS

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2490-1130-T-031

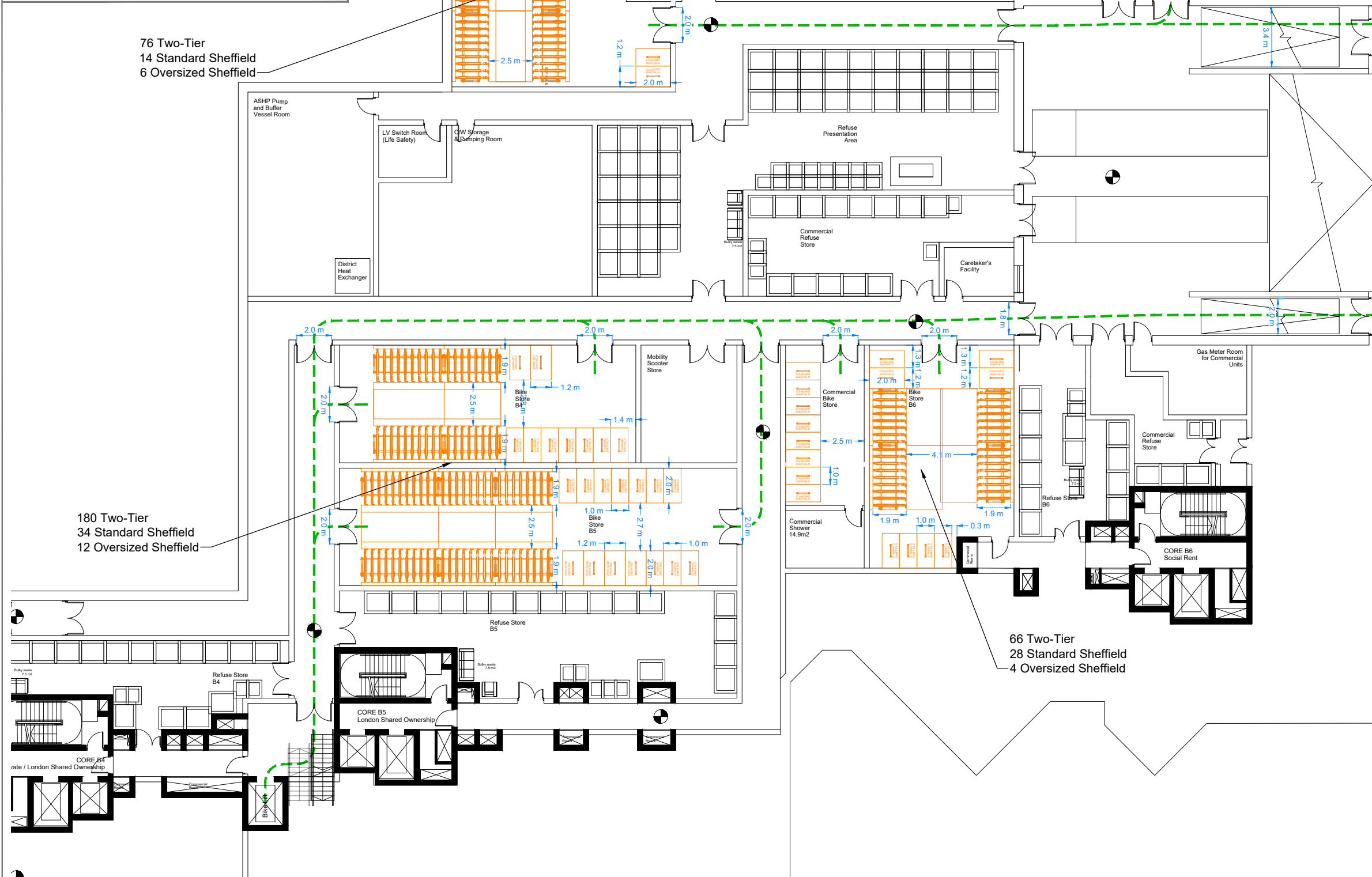
DRAWN	APPROVED	DATE
EP	ML	SEP 21

SCALE | **REV**
1:250 @ A3 | B

CLIENT
PEABODY
PROJECT
HOLLOWAY PRISON

DRAWING TITLE
**CYCLE STORAGE PROVISION
BLOCK A - UPPER GROUND**





PLOT B - Residential Parking	Two-tier stands	Standard Sheffield stands	Oversized Sheffield stands	Total
Minimum Required as per LP	464	87	29	581
Provided	474	88	32	594
	80%	15%	5%	100%

PLOT B - Class E	Two-tier stands	Standard Sheffield stands	Oversized Sheffield stands	Total
Minimum Required as per LP	13	2	1	16
Provided	0	16	0	16
	0%	100%	0%	100%

76 Two-Tier
14 Standard Sheffield
6 Oversized Sheffield

68 Two-Tier
12 Standard Sheffield
4 Oversized Sheffield

180 Two-Tier
34 Standard Sheffield
12 Oversized Sheffield

66 Two-Tier
28 Standard Sheffield
4 Oversized Sheffield

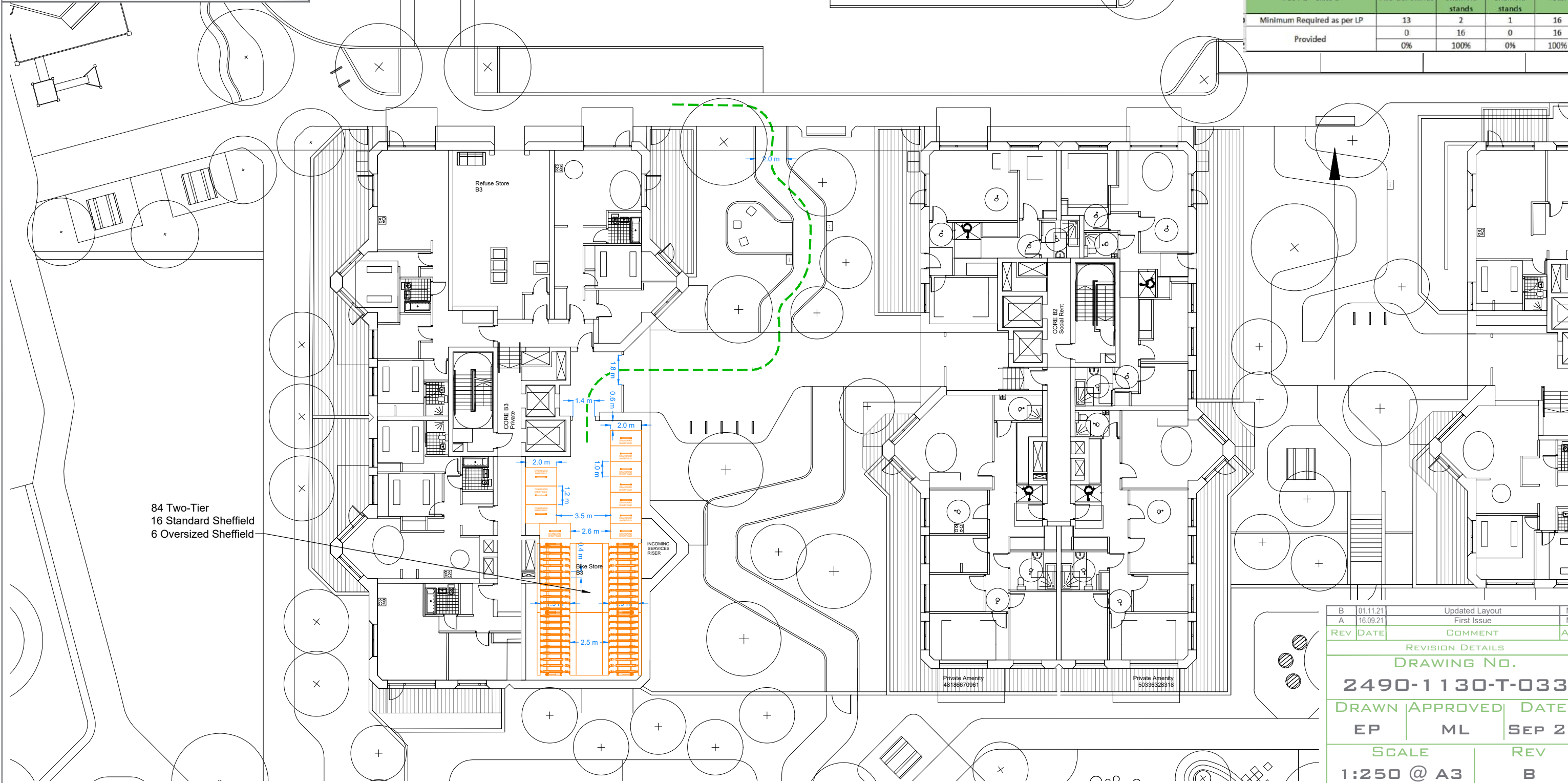
B	01.11.21	Updated Layout	ML
A	16.09.21	First Issue	ML
REV	DATE	COMMENT	APP
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DRAWING NO.			
2490-1130-T-032			
DRAWN	APPROVED	DATE	
EP	ML	SEP 21	
SCALE		REV	
1:250 @ A3		B	





PLOT B - Residential Parking	Two-tier stands	Standard Sheffield stands	Oversized Sheffield stands	Total
Minimum Required as per LP	464	87	29	581
Provided	474	88	32	594
	80%	15%	5%	100%

PLOT B - Class E	Two-tier stands	Standard Sheffield stands	Oversized Sheffield stands	Total
Minimum Required as per LP	13	2	1	16
Provided	0	16	0	16
	0%	100%	0%	100%



84 Two-Tier
16 Standard Sheffield
6 Oversized Sheffield

REV	DATE	COMMENT	APP
B	01.11.21	Updated Layout	ML
A	16.09.21	First Issue	ML

REVISION DETAILS		
DRAWING NO.		
2490-1130-T-033		
DRAWN	APPROVED	DATE
EP	ML	SEP 21
SCALE	REV	
1:250 @ A3	B	

