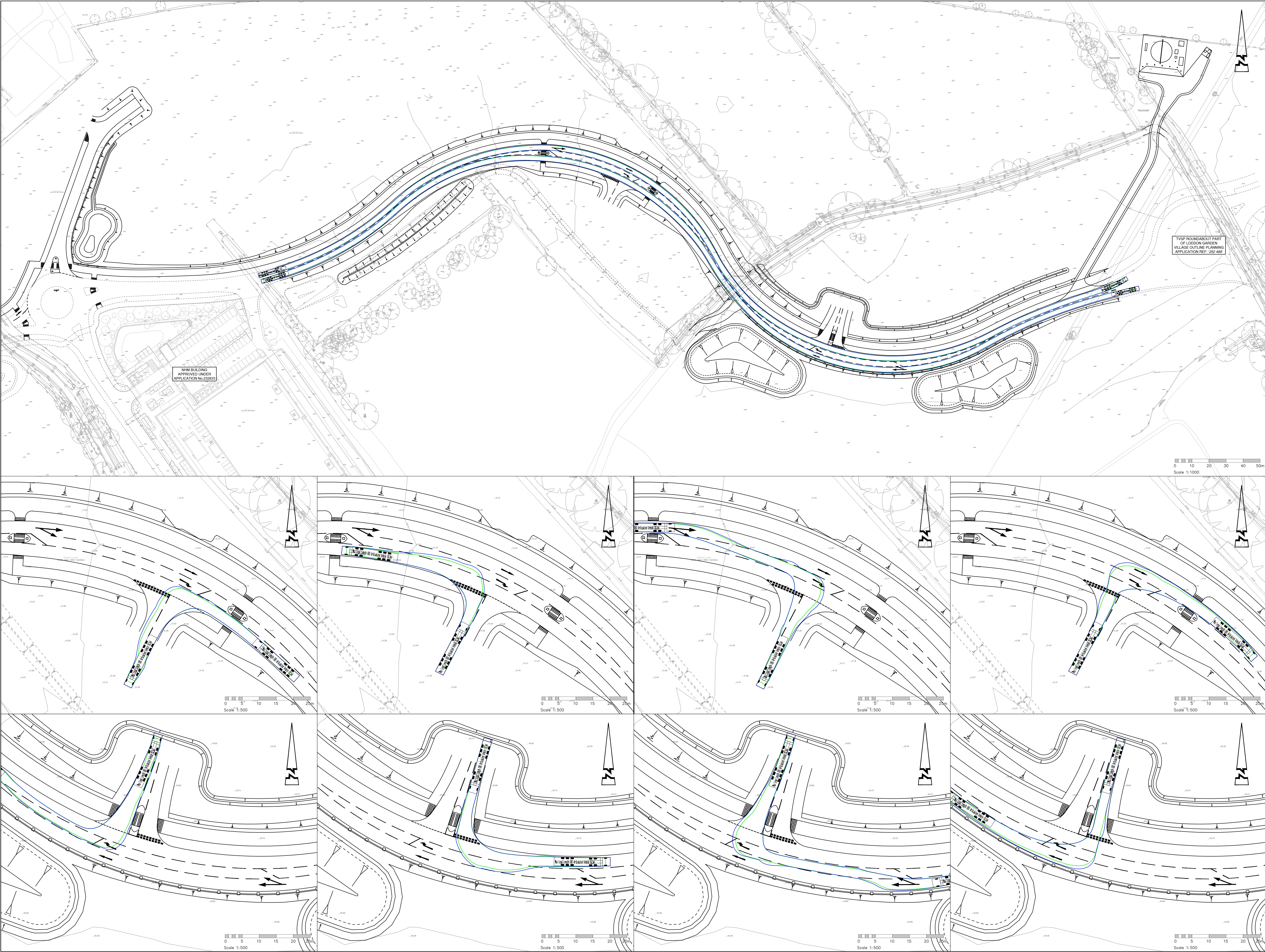




Appendix D – Swept Path Analysis



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Max Legal Length(UK) Articulated Vehicle(16.5m)
Overall Length 16.500m
Overall Width 2.550m
Overall Body Height 3.681m
Min Body Ground Clearance 0.811m
Max Track Width 2.500m
Lock to lock time 6.00s
Kerb to Kerb Turning Radius 6.530m

GENERAL NOTES:
1. Do not scale.
2. Refer to all other Project Drawings and supporting notes.

TVSP ROUNDABOUT PART OF LODDON GARDEN VILLAGE OUTLINE PLANNING APPLICATION REF: 252 489

NRM BUILDING APPROVED UNDER APPLICATION No.252833

0 10 20 30 40 50m
Scale 1:1000

C	03/26	UPDATED TO REFLECT RSA 2 RESPONSES	JJS	CS
B	02/26	LAYOUT AMENDED	AS	CS
A	02/26	FOR REVIEW	JJS	CS
Rev	Date	Description	Drawn	Checked

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THAMES VALLEY SCIENCE PARK - LODDON GARDEN VILLAGE LINK ROAD

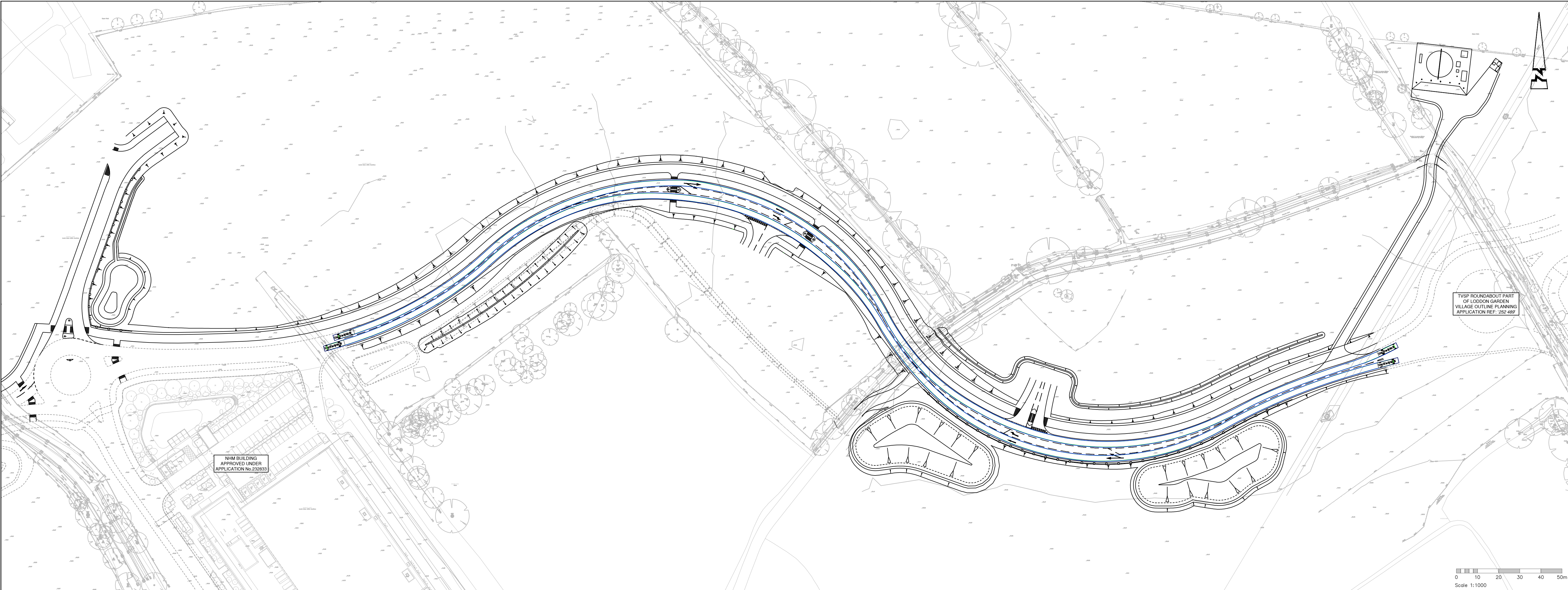
Title

SWEPT PATH ANALYSIS
SHEET 1
ARTICULATED VEHICLE

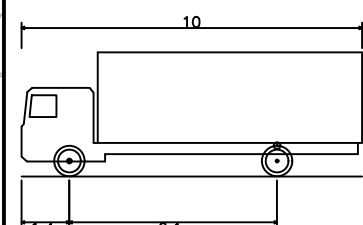
Status

Scale	Date	Drawn	Checked
AS SHOWN @ A1	FEB 2026	JJS	CS

Drawing No.	Revision
HD169-TVSP-0105	C

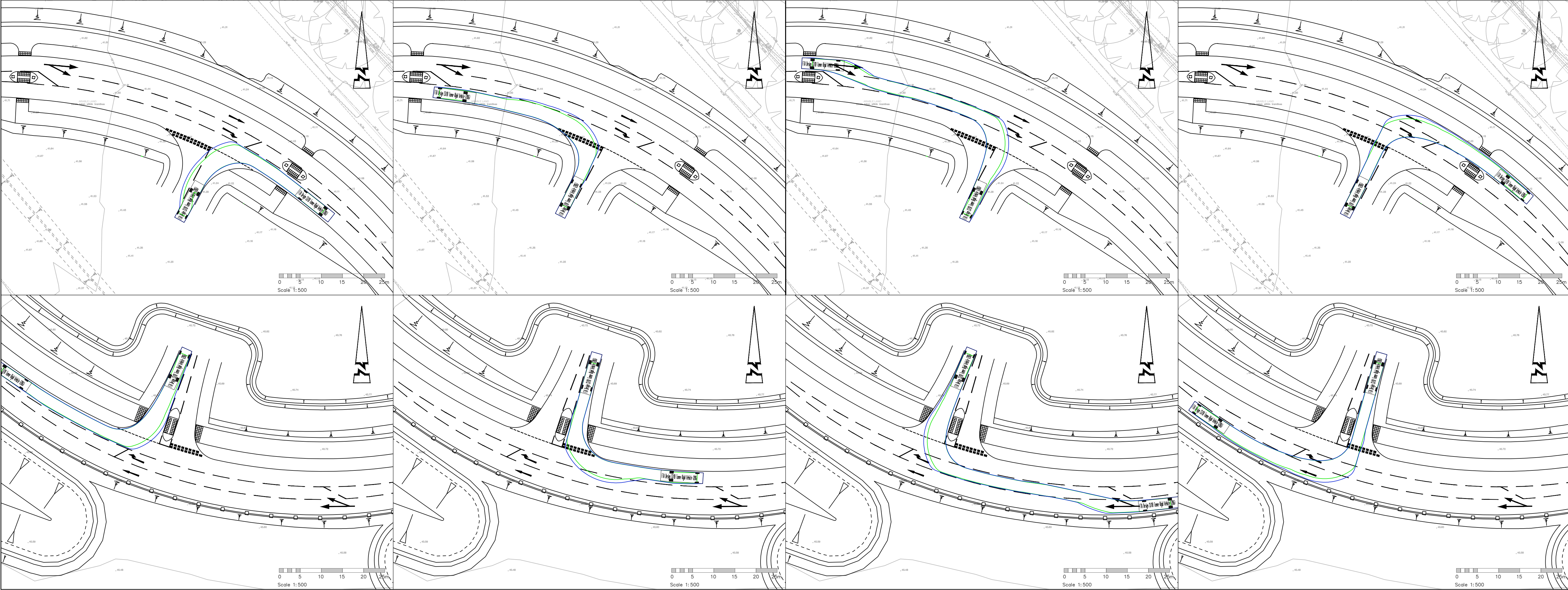


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FTA Design 13/18 Tonne Rigid Vehicle(2016)
Overall Length 10.000m
Overall Width 2.550m
Overall Body Height 3.845m
Min Body Ground Clearance 0.440m
Track Width 2.470m
Lock to lock time 3.00s
Kerb to Kerb Turning Radius 11.000m

- GENERAL NOTES:
1. Do not scale.
2. Refer to all other Project Drawings and supporting notes.



C	03/26	UPDATED TO REFLECT RSA 2 RESPONSES	JJS	CS
B	02/26	LAYOUT AMENDED	AS	CS
A	02/26	FOR REVIEW	JJS	CS
Rev	Date	Description	Drawn	Checked



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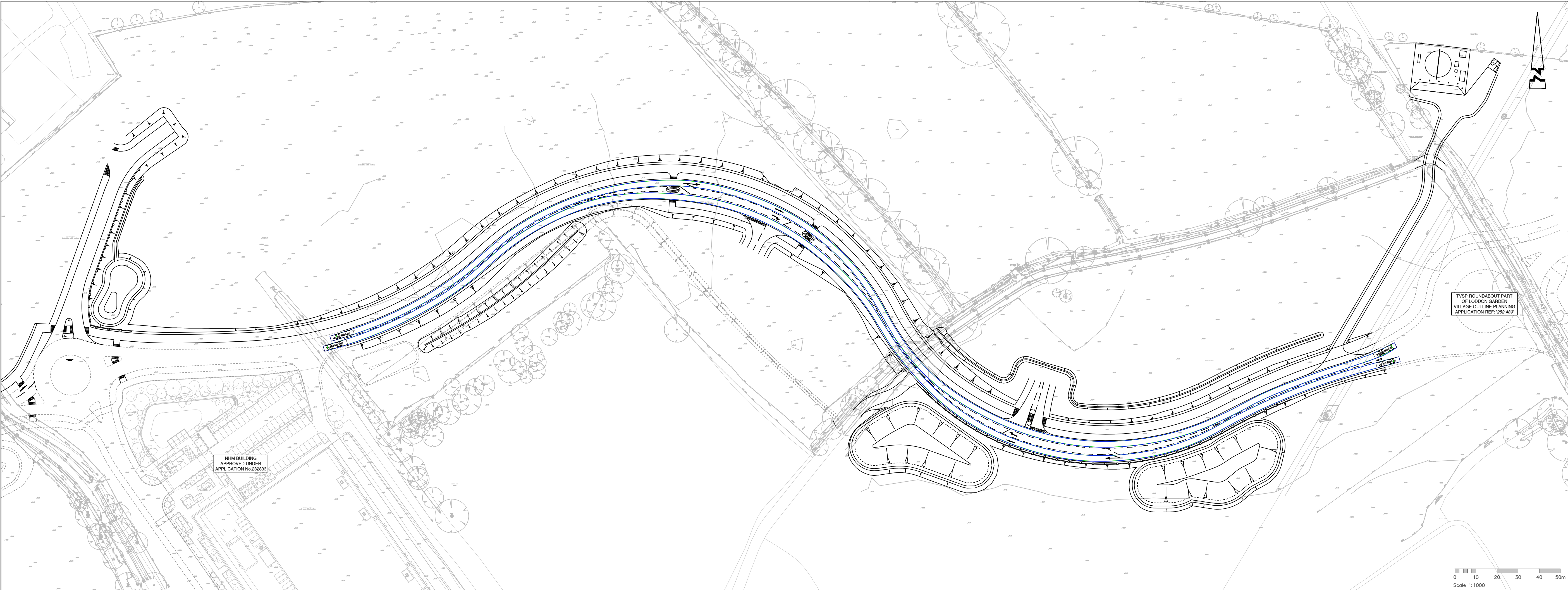
Project
**THAMES VALLEY SCIENCE
PARK - LODDON GARDEN
VILLAGE LINK ROAD**

Title
**SWEPT PATH ANALYSIS
SHEET 2
18 TONNE RIGID VEHICLE**

Status

Scale	Date	Drawn	Checked
AS SHOWN @ A1	FEB 2026	JJS	CS

Drawing No.	Revision
HD169-TVSP-0106	C



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11.347
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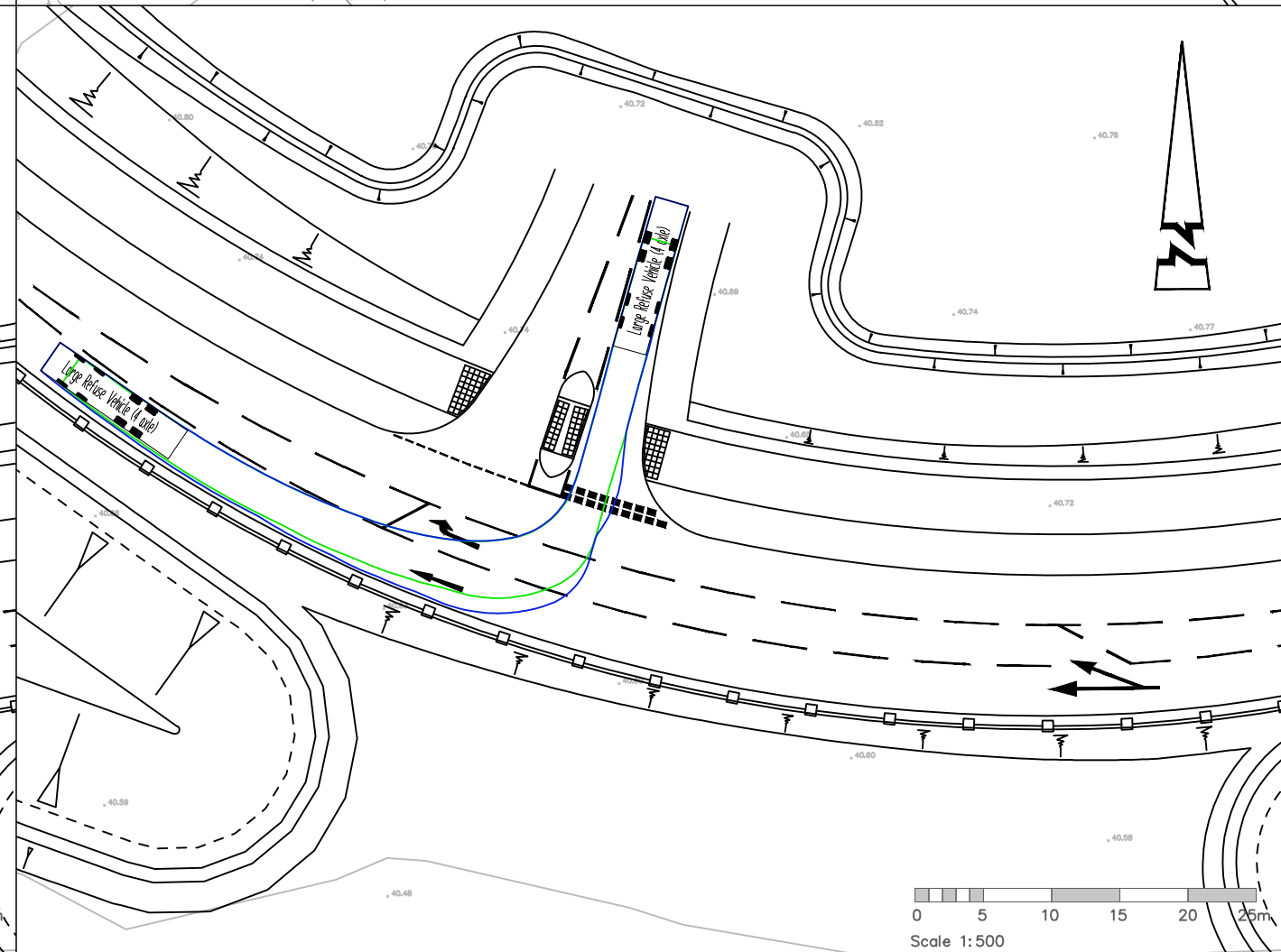
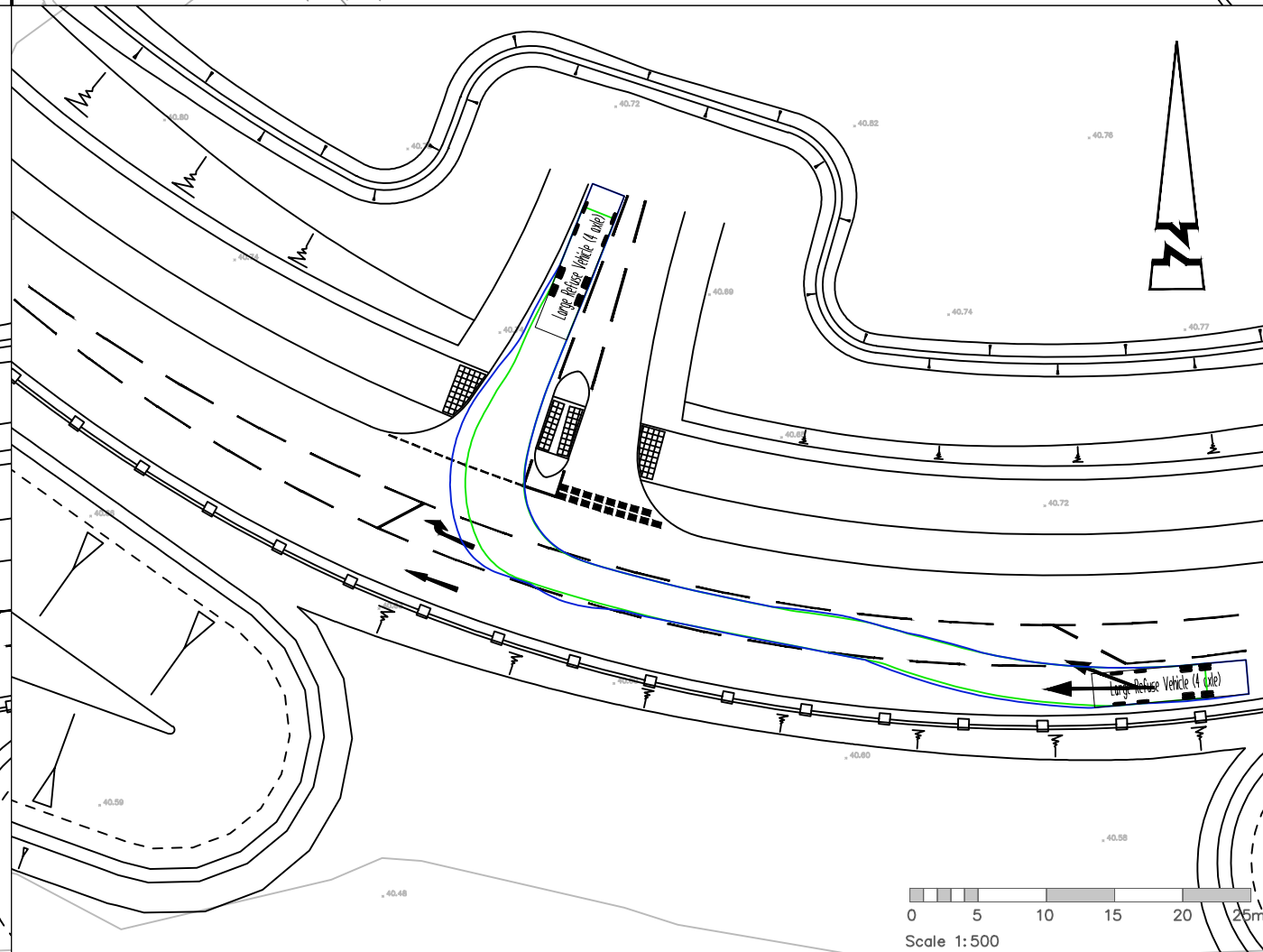
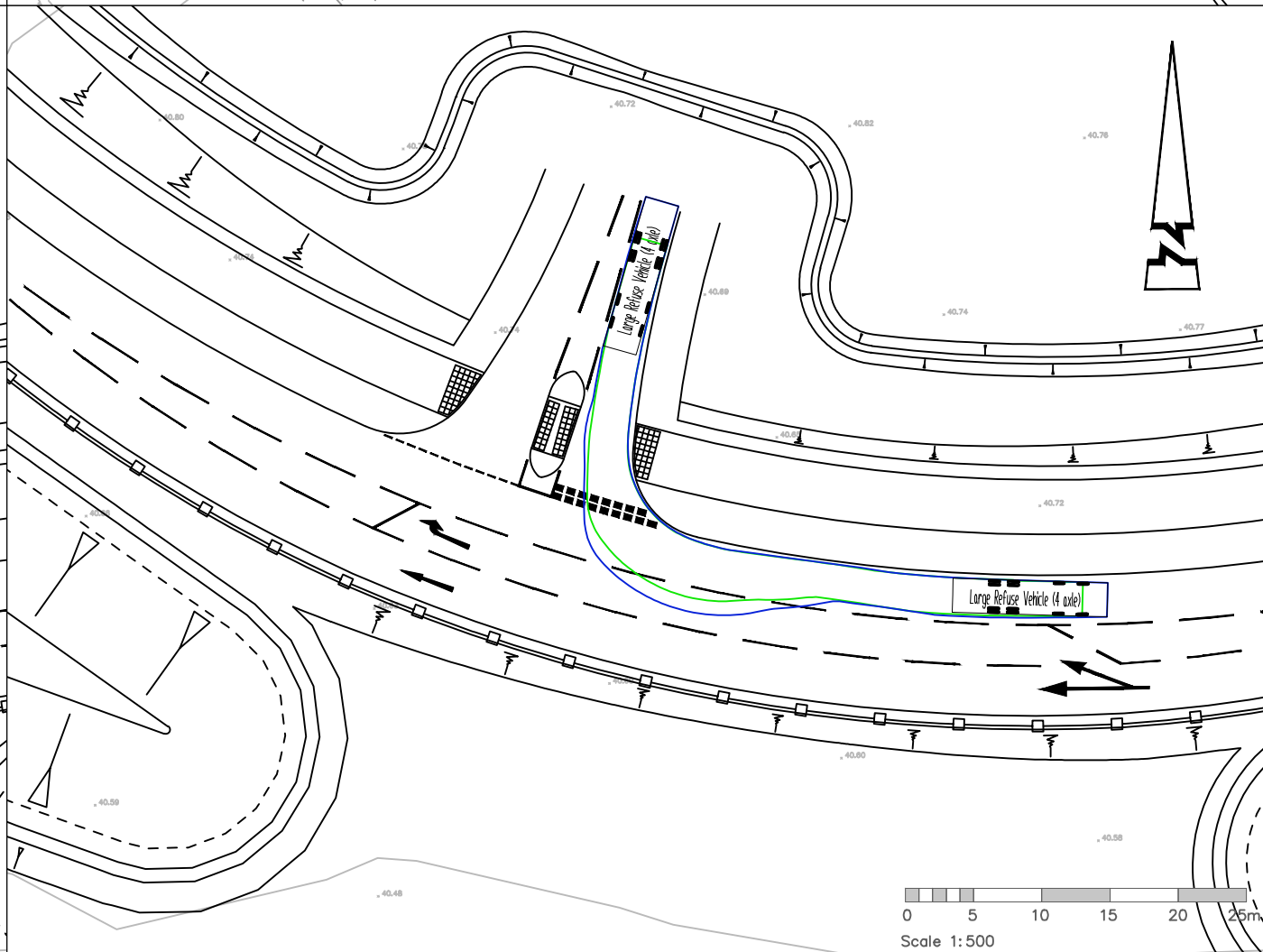
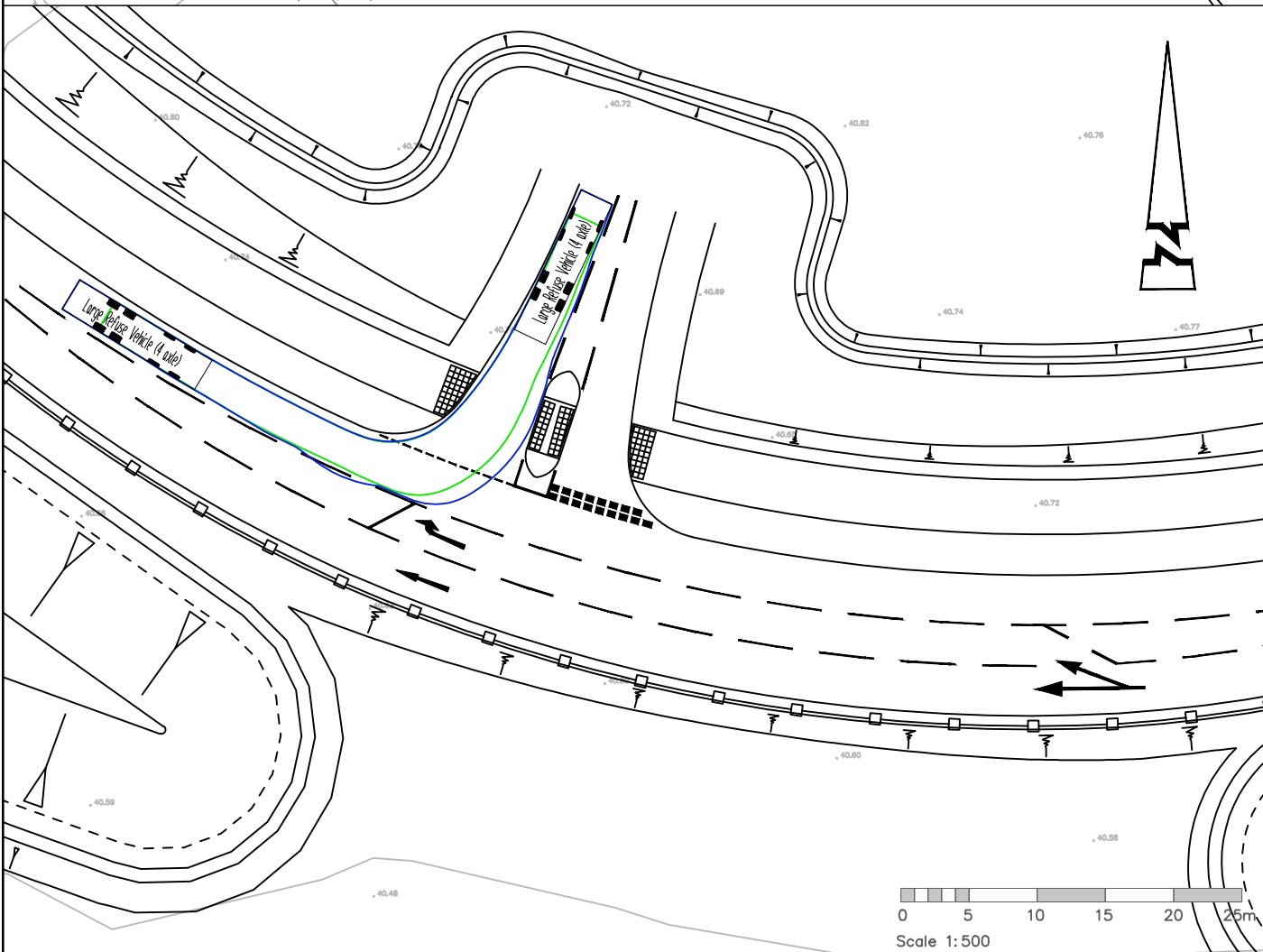
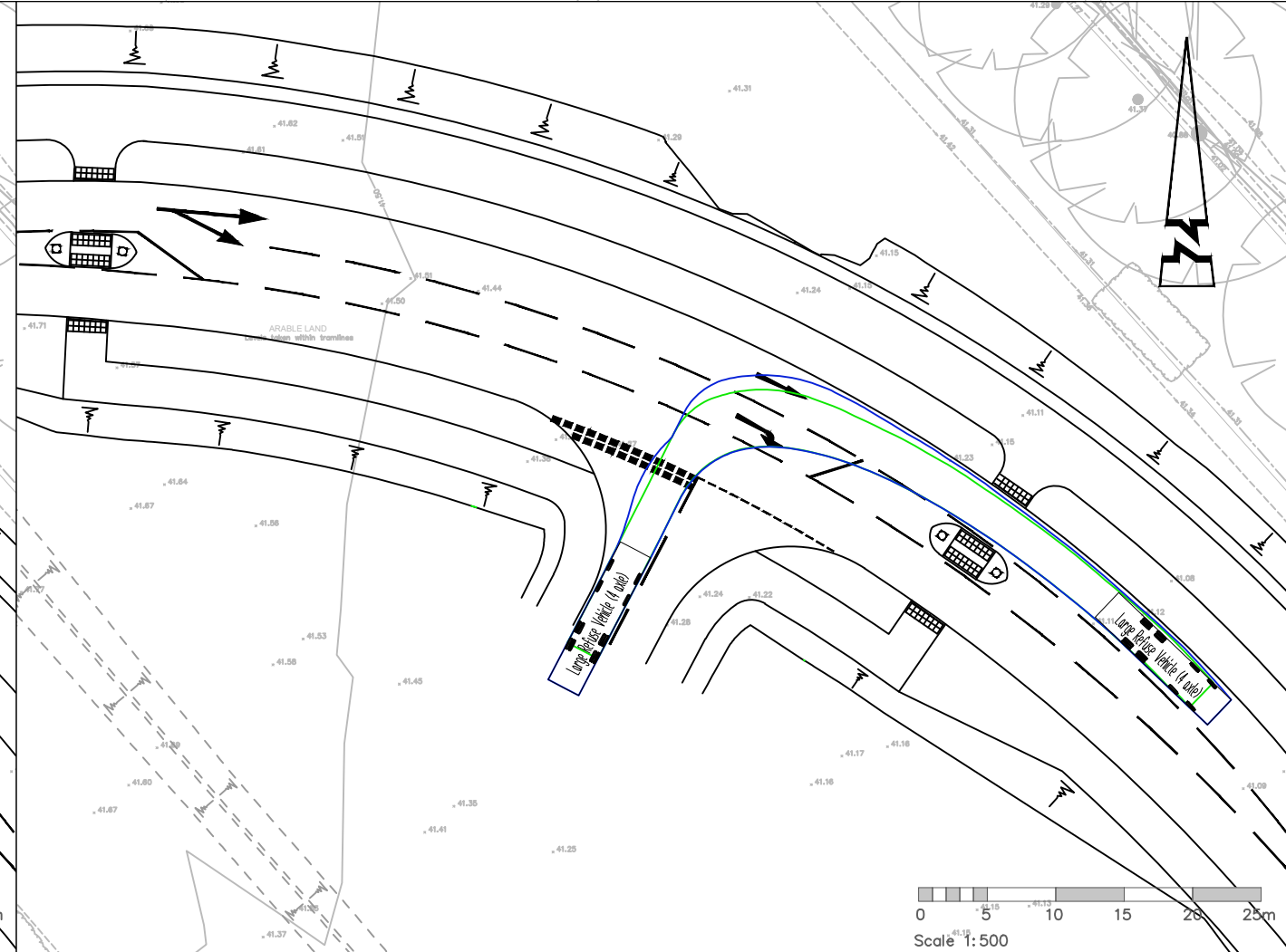
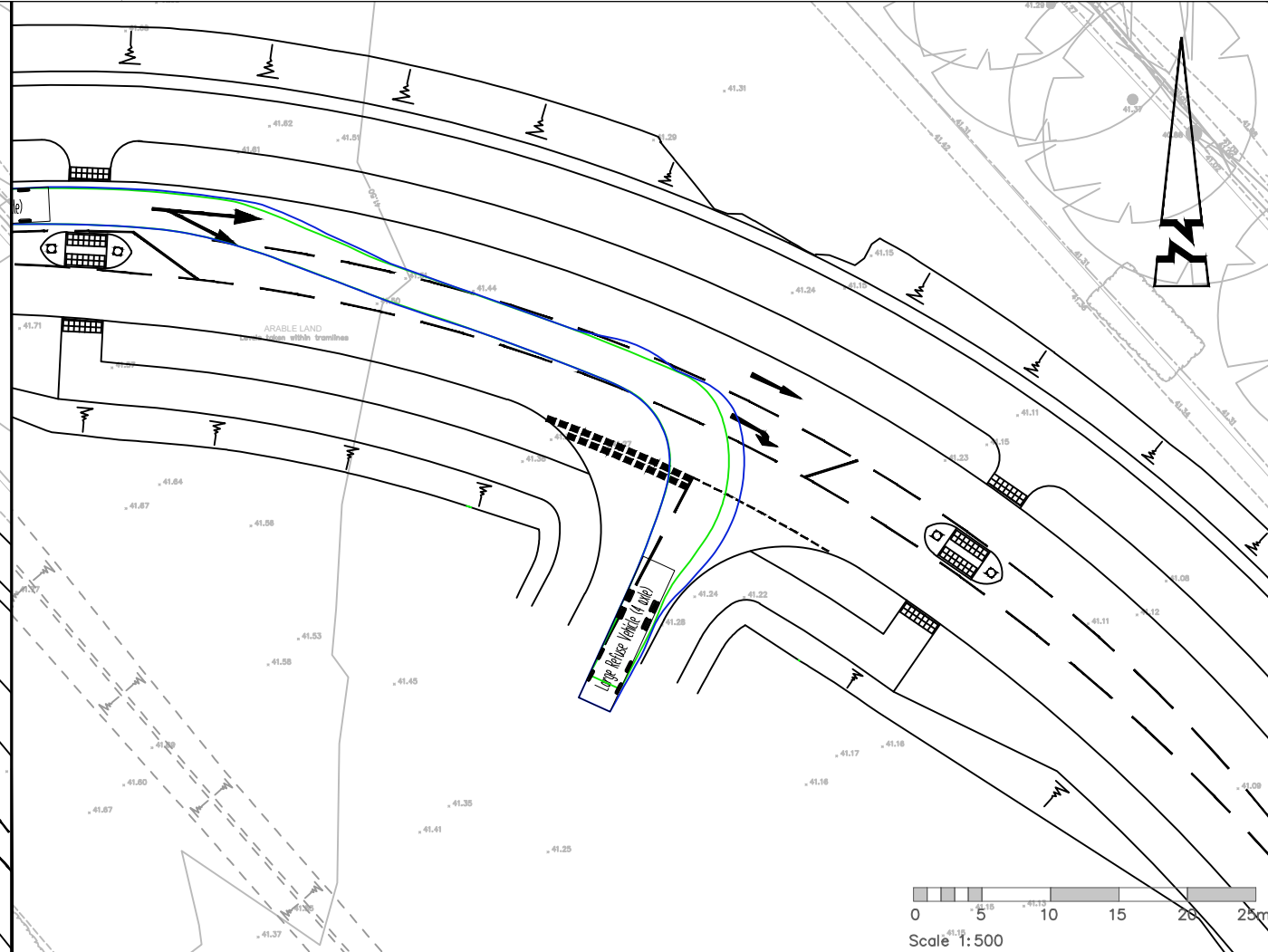
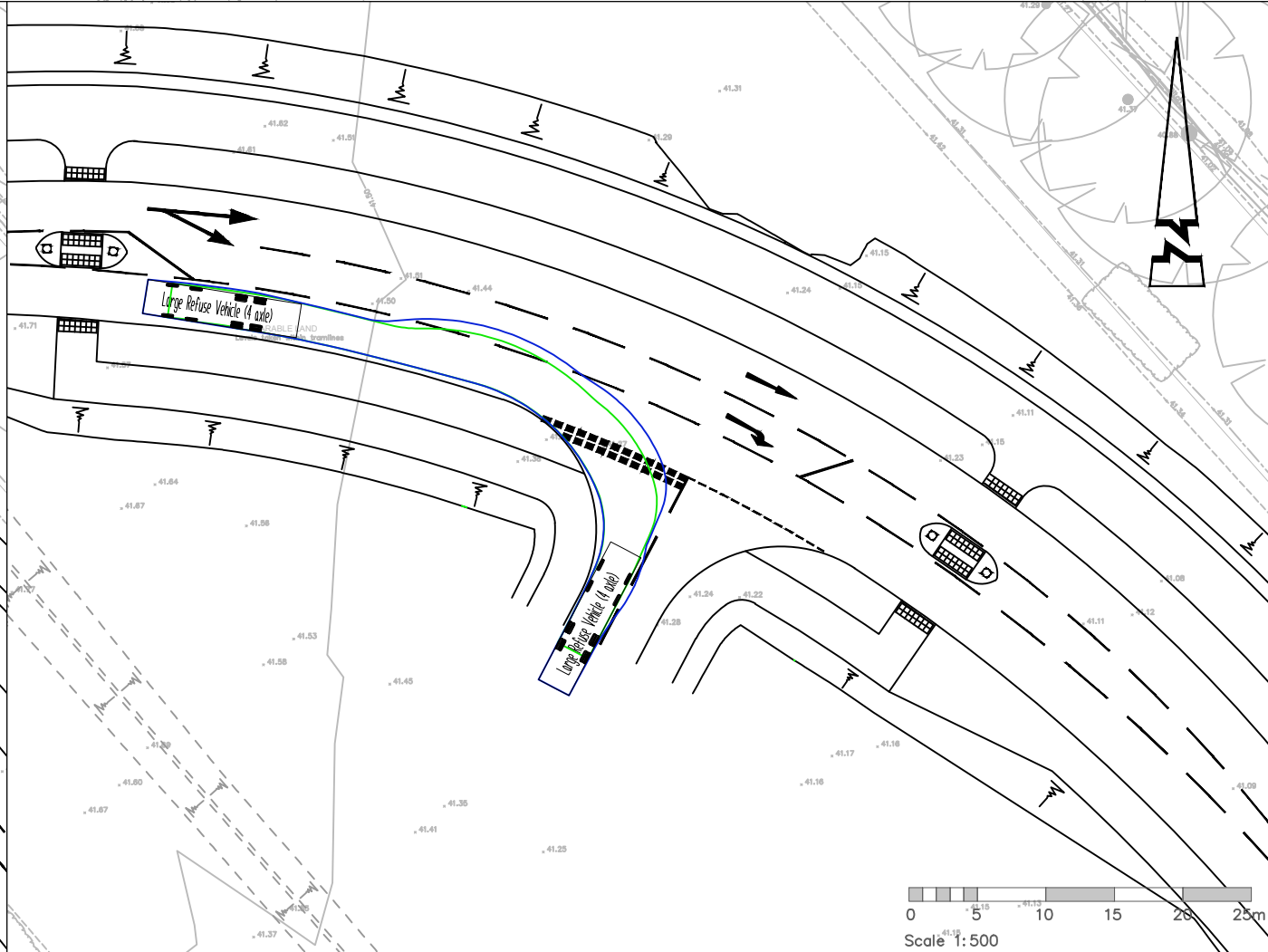
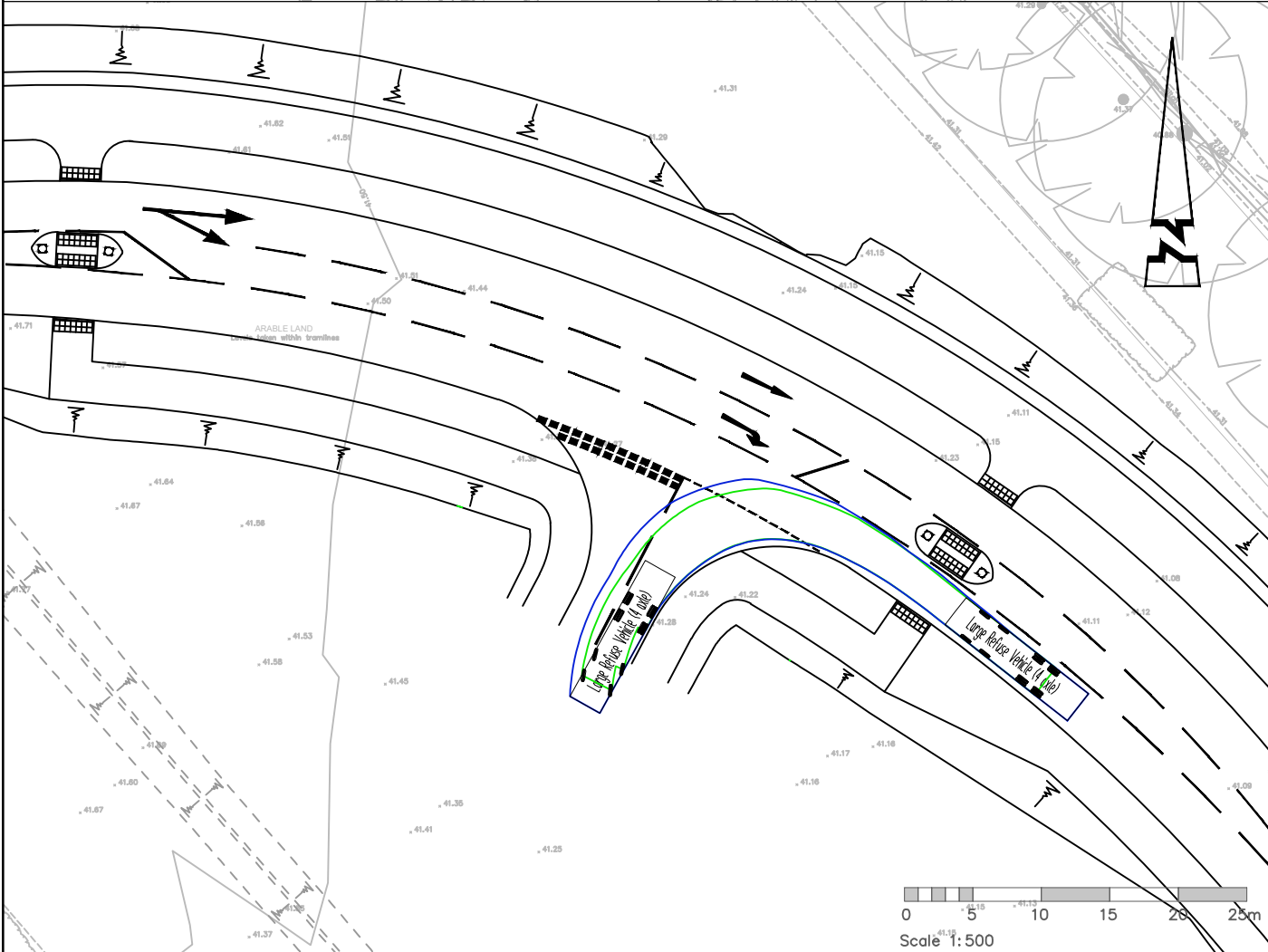
Large Refuse Vehicle (4 axle)
Overall Length 11.347m
Overall Width 2.500m
Overall Body Height 2.151m
Min Body Ground Clearance 0.304m
Track Width 2.500m
Lock to lock time 6.005
Wall to Wall Turning Radius 11.330m

GENERAL NOTES:
1. Do not scale.
2. Refer to all other Project Drawings and supporting notes.

TVSP ROUNDABOUT PART OF LODDON GARDEN VILLAGE OUTLINE PLANNING APPLICATION REF: 252489

NFM BUILDING APPROVED UNDER APPLICATION No.252833

0 10 20 30 40 50m
Scale 1:1000



C	03/26	UPDATED TO REFLECT RSA 2 RESPONSES	JJS	CS
B	02/26	LAYOUT AMENDED	AS	CS
A	02/26	FOR REVIEW	JJS	CS
Rev	Date	Description	Drawn	Checked

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Project
THAMES VALLEY SCIENCE PARK - LODDON GARDEN VILLAGE LINK ROAD

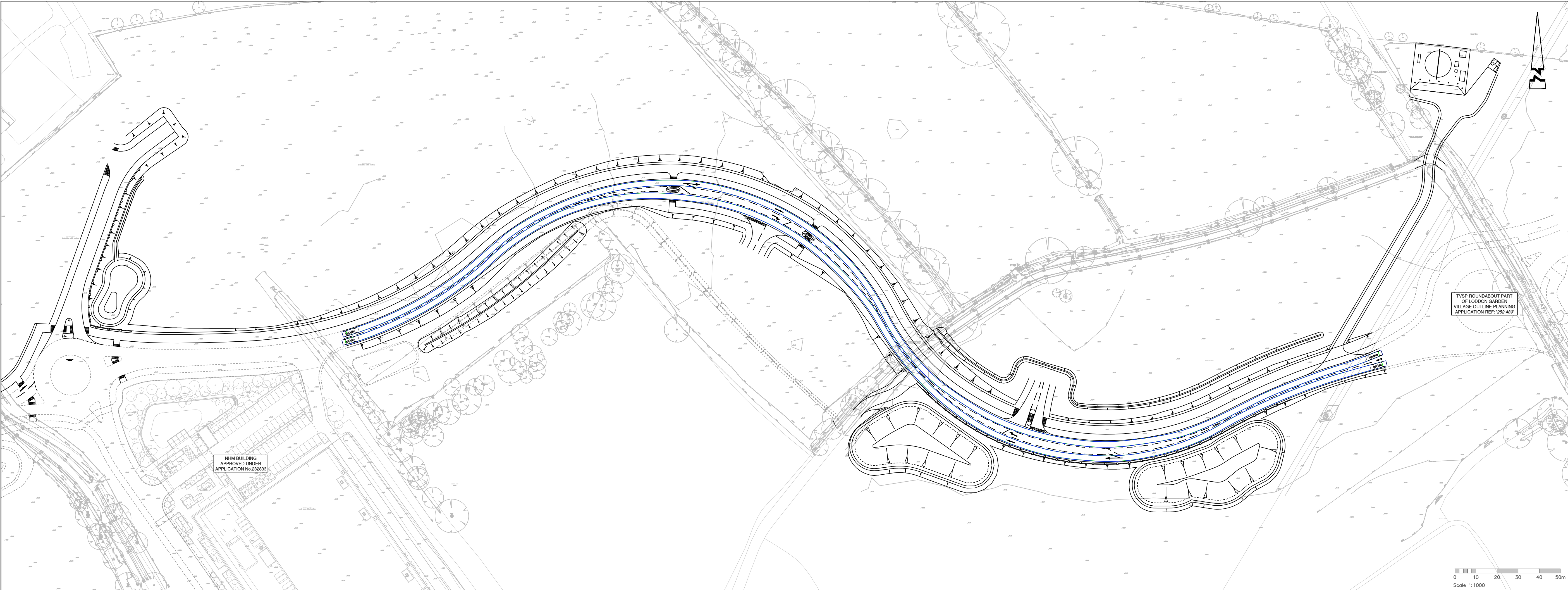
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SWEPT PATH ANALYSIS SHEET 3 REFUSE VEHICLE

Status

Scale	Date	Drawn	Checked
AS SHOWN @ A1	FEB 2026	JJS	CS

Drawing No.
HD169-TVSP-0107

Revision
C



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7.9
1.5 4.4

Pumping Appliance
Overall Length 7.900m
Overall Width 2.500m
Overall Body Height 3.500m
Min Body Ground Clearance 0.140m
Track Width 2.500m
Lock to lock time 4.00s
Kerb to Kerb Turning Radius 7.750m

GENERAL NOTES:
1. Do not scale.
2. Refer to all other Project Drawings and supporting notes.

TVSP ROUNDABOUT PART OF LODDON GARDEN VILLAGE OUTLINE PLANNING APPLICATION REF: 252 489

NRM BUILDING APPROVED UNDER APPLICATION No 252833

0 10 20 30 40 50m
Scale 1:1000

C	03/26	UPDATED TO REFLECT RSA 2 RESPONSES	JJS	CS
B	02/26	LAYOUT AMENDED	AS	CS
A	02/26	FOR REVIEW	JJS	CS
Rev	Date	Description	Drawn	Checked

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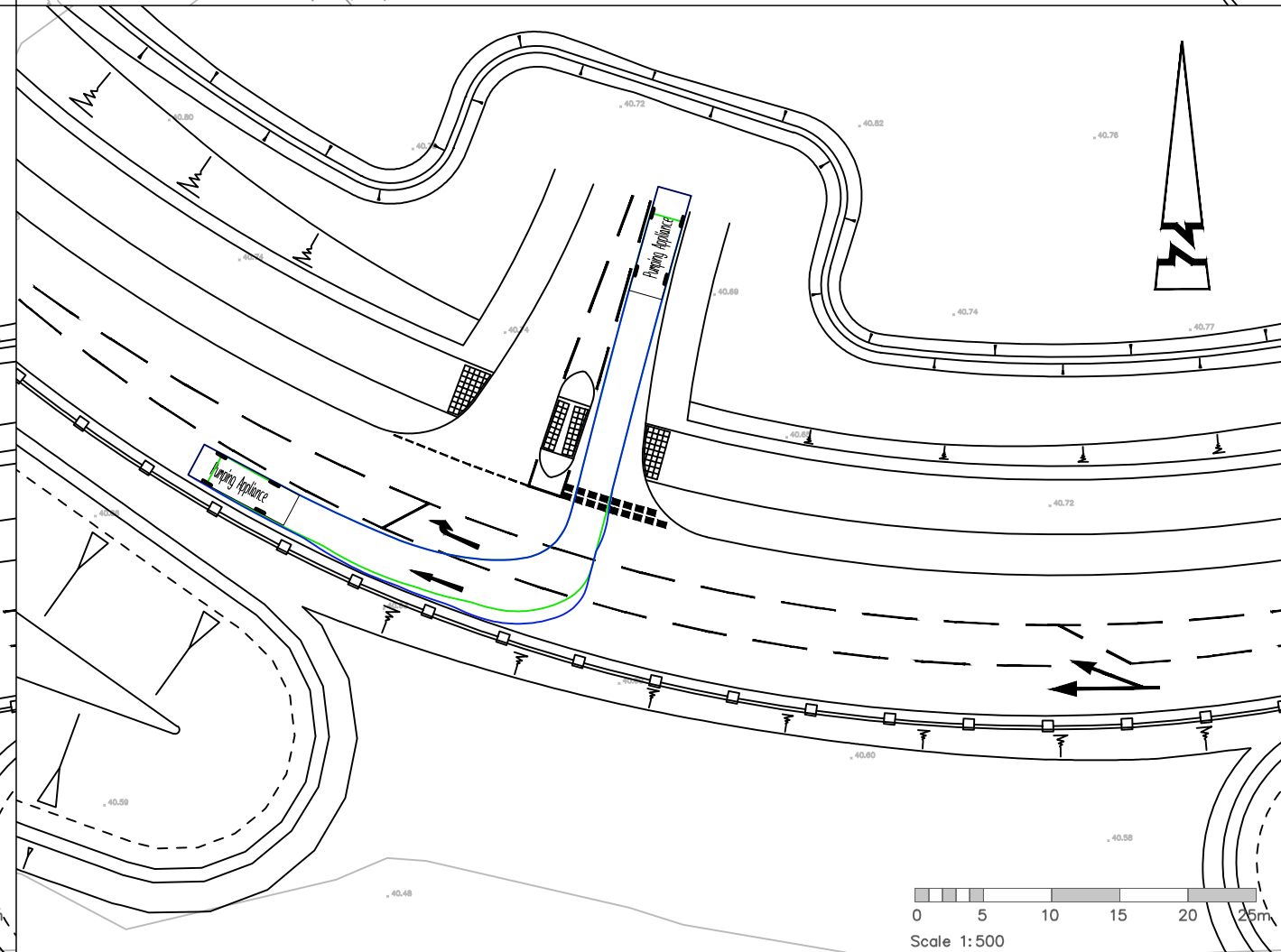
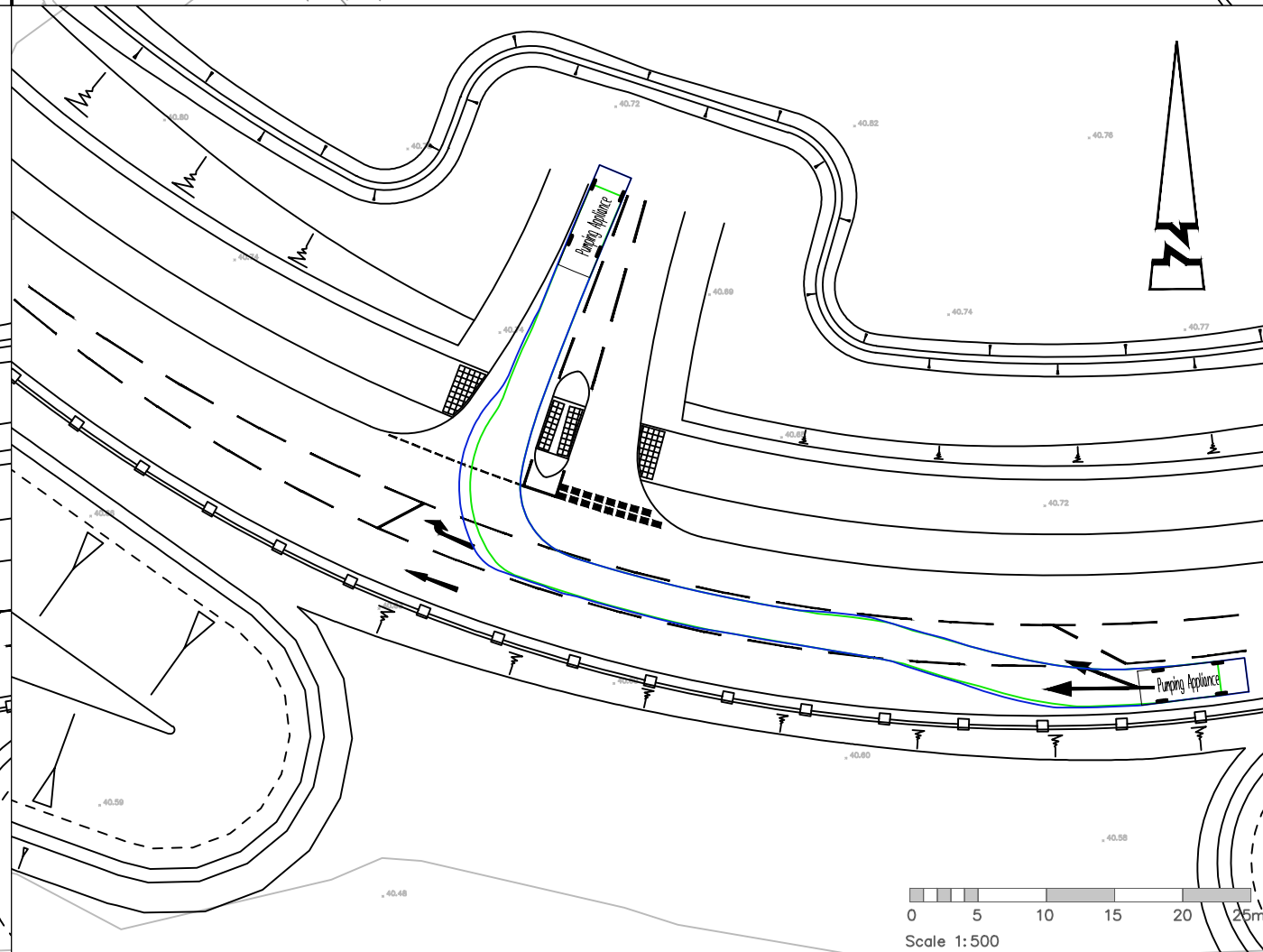
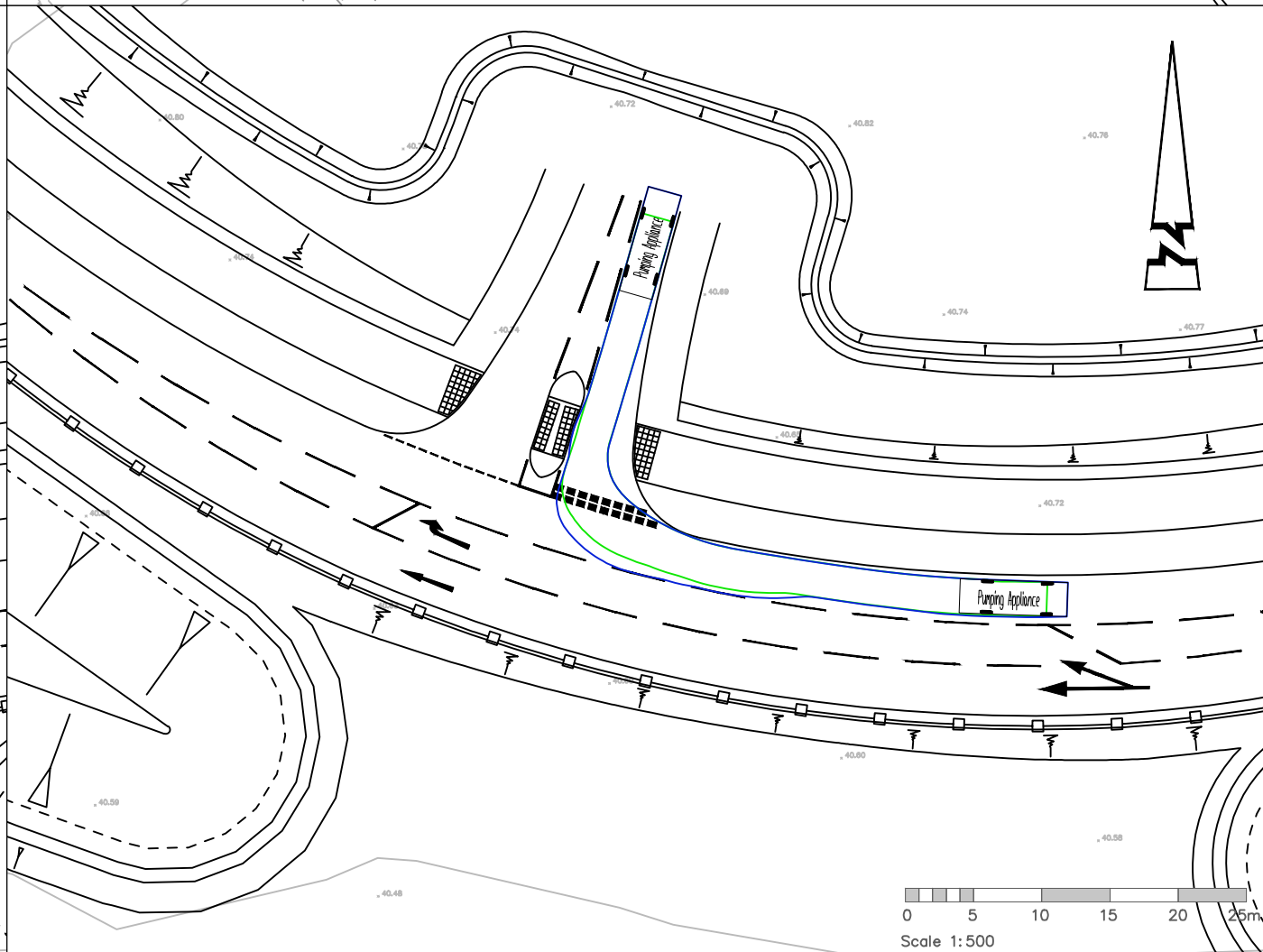
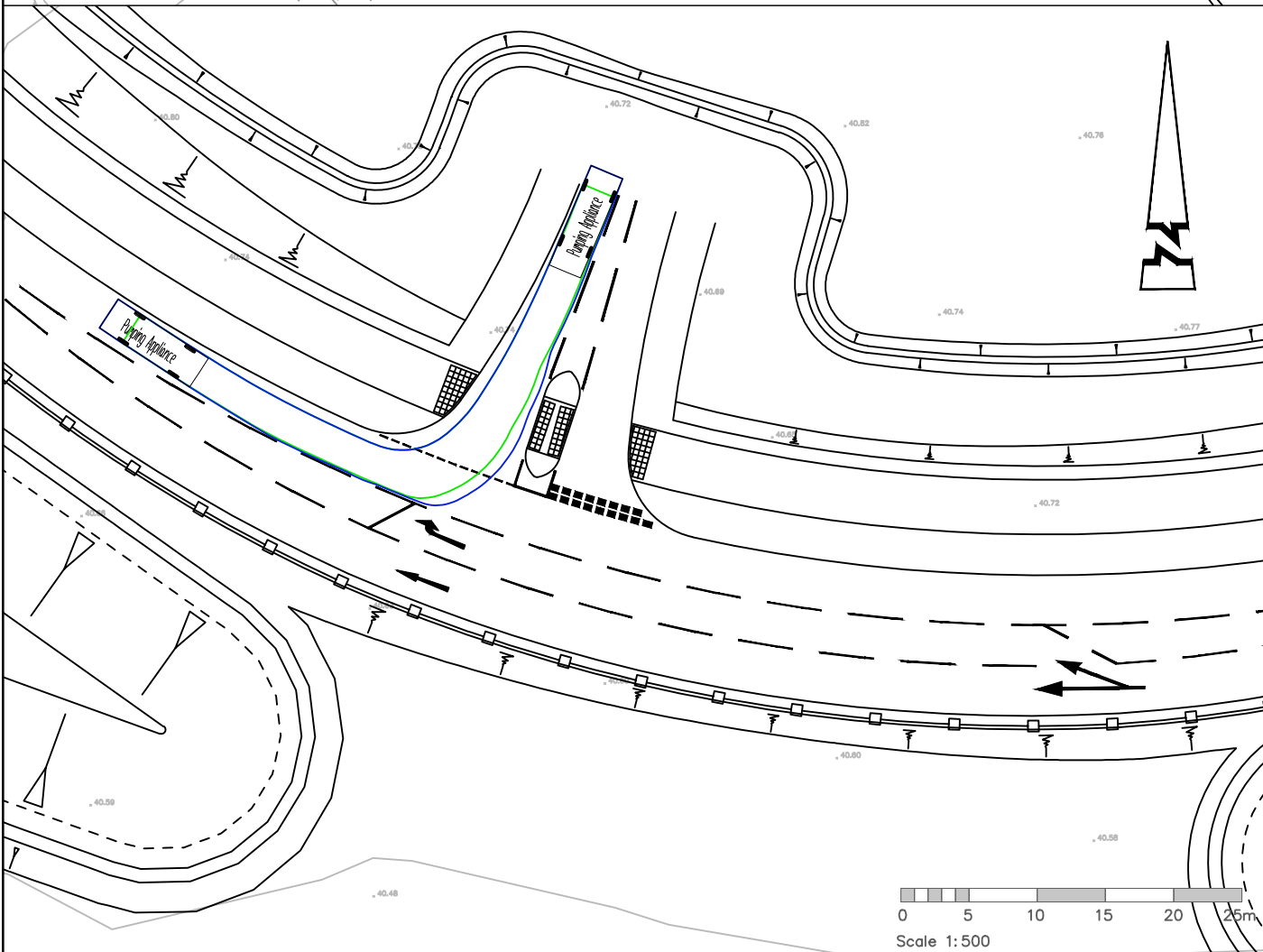
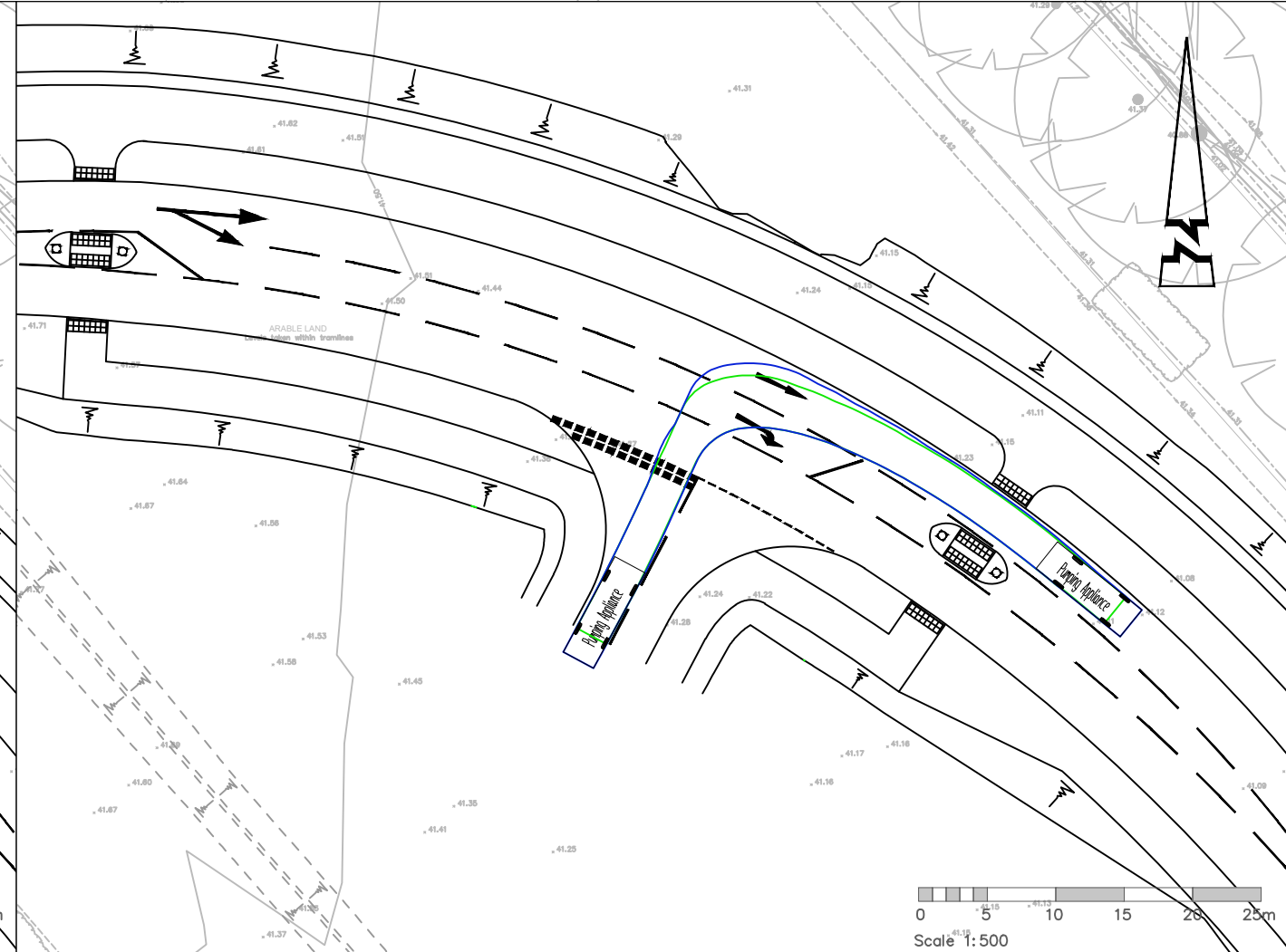
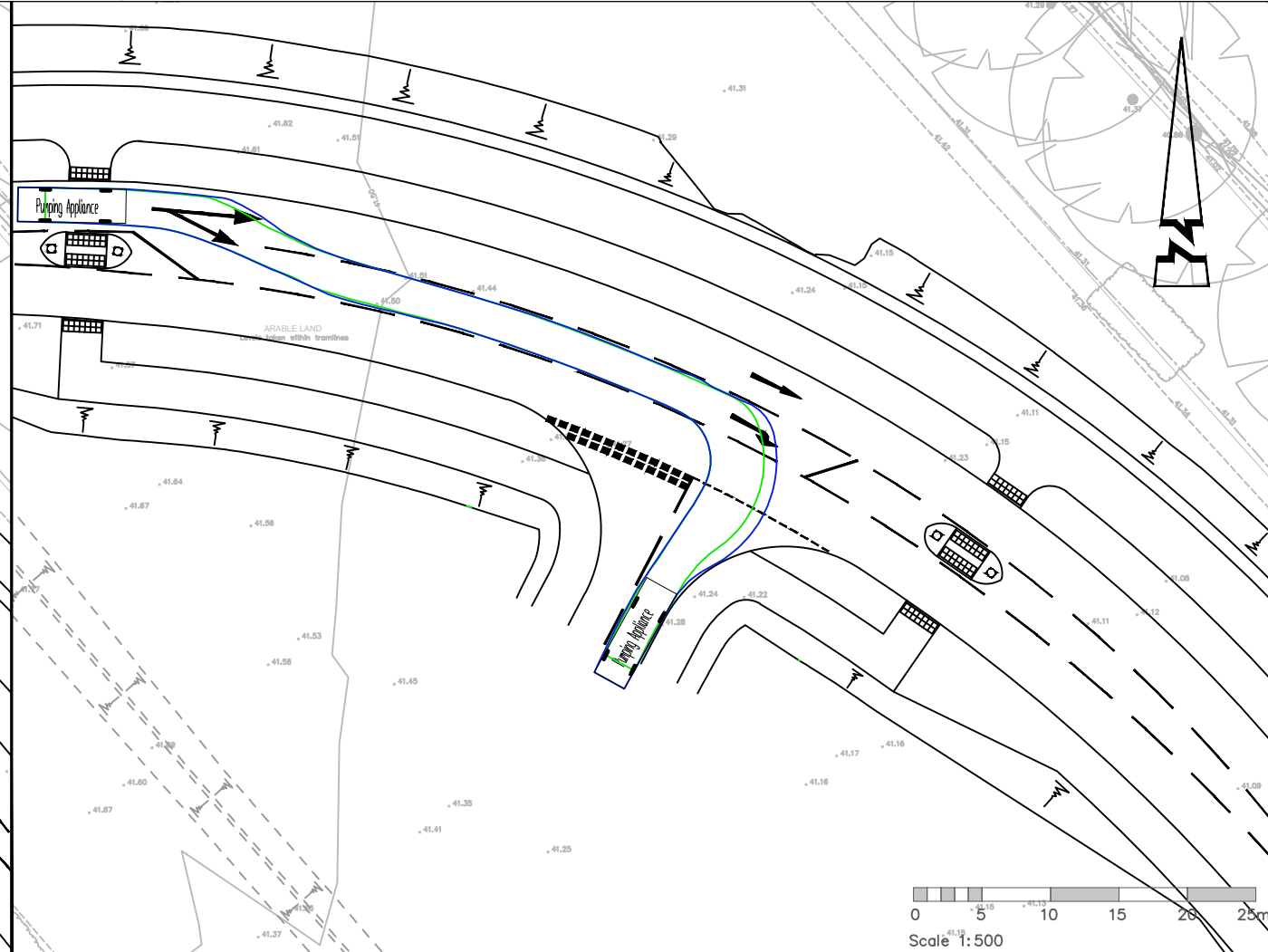
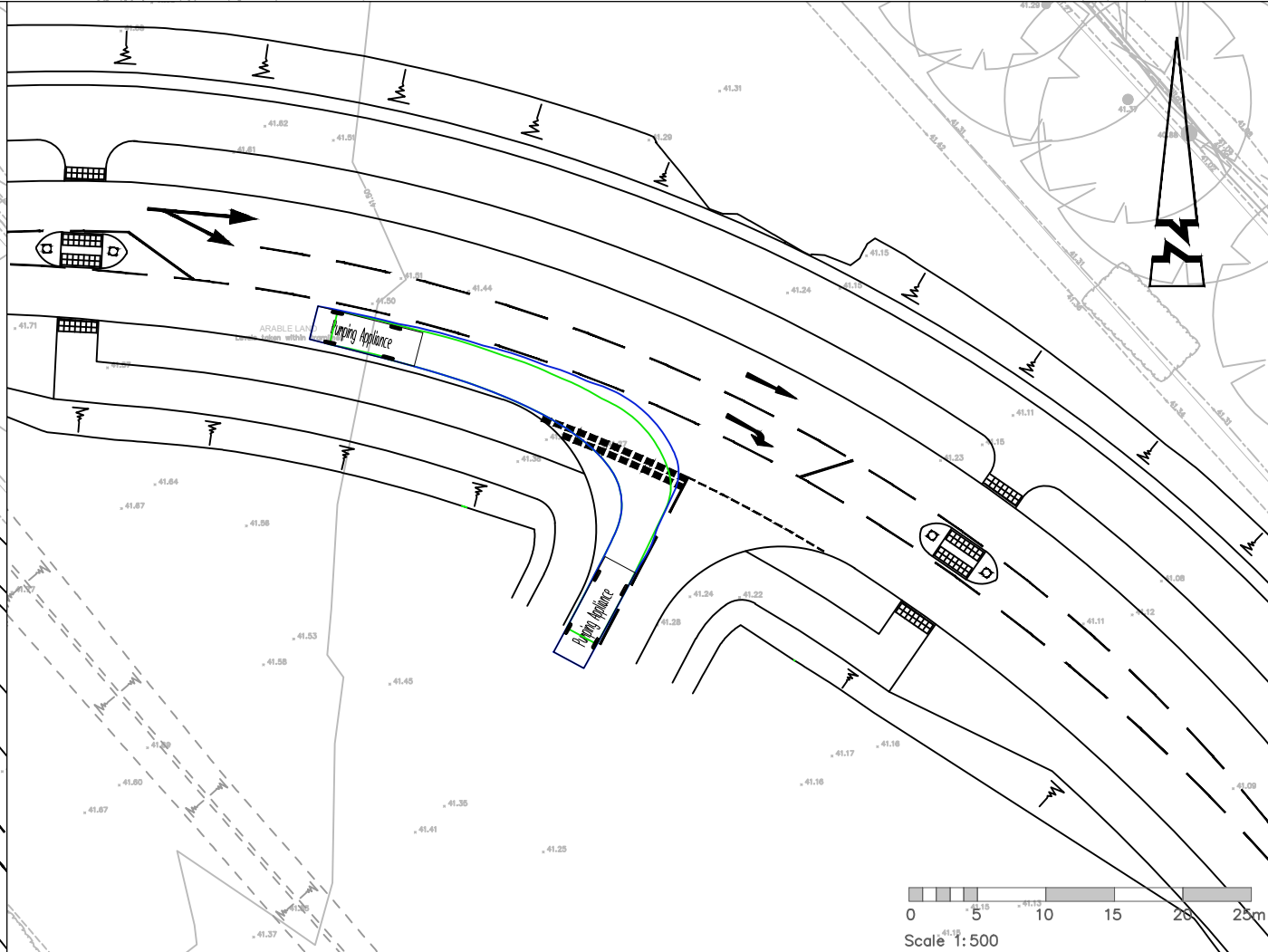
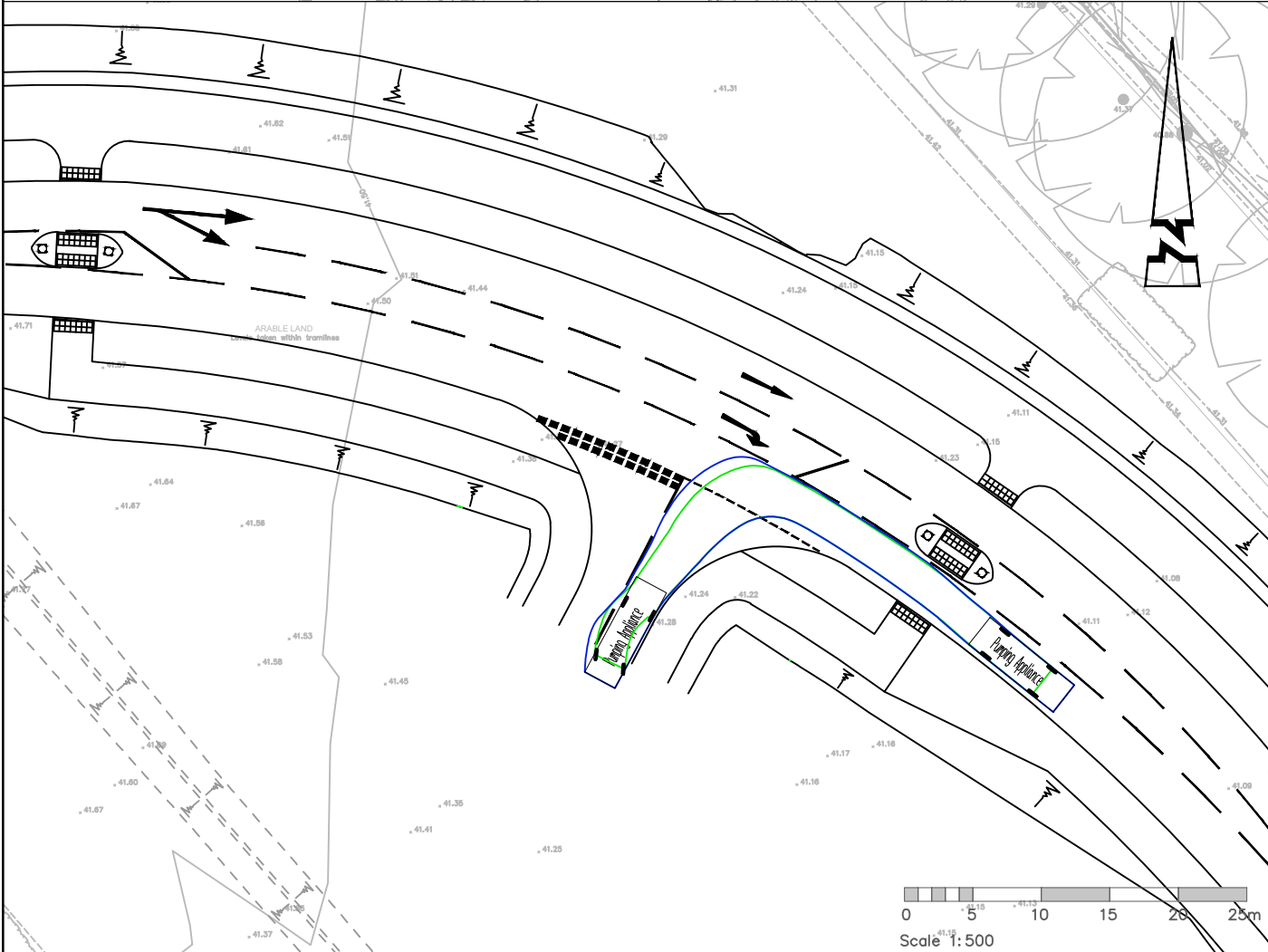
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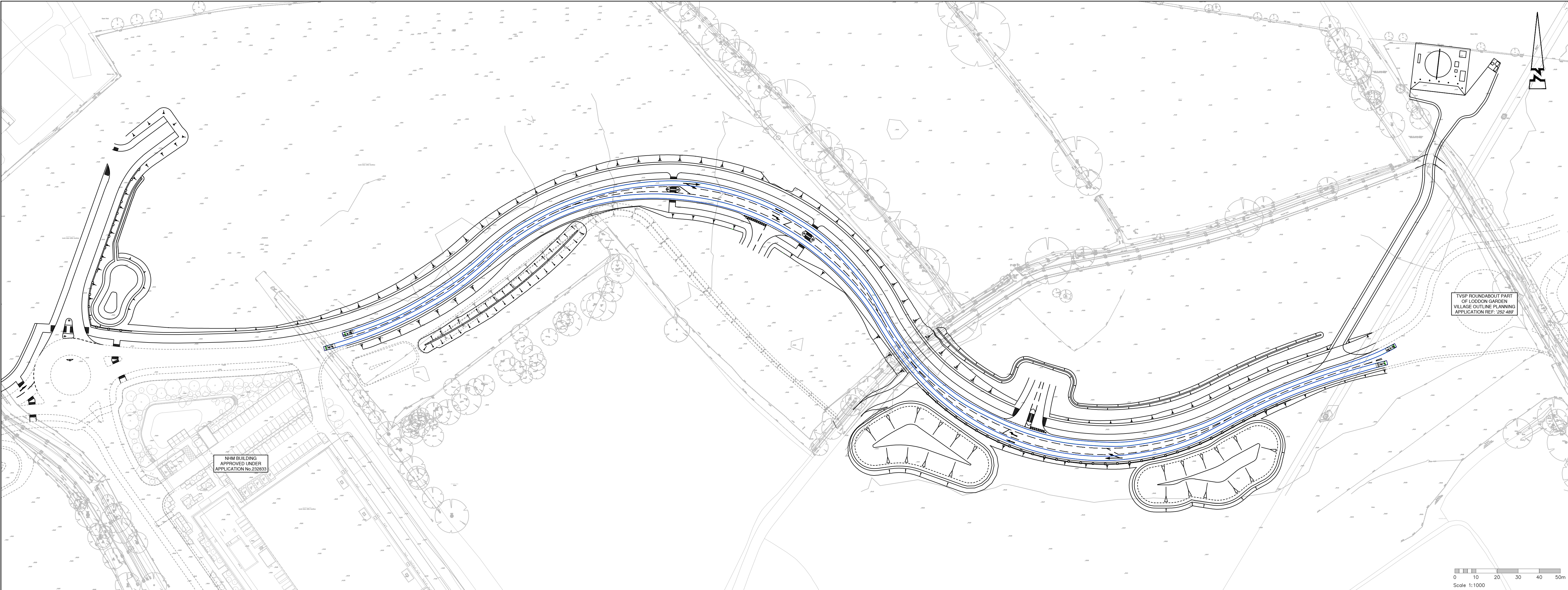
Project
THAMES VALLEY SCIENCE PARK - LODDON GARDEN VILLAGE LINK ROAD

Title
SWEPT PATH ANALYSIS SHEET 4 FIRE TENDER

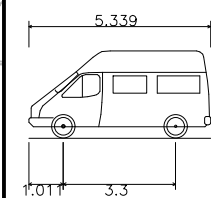
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AS SHOWN @ A1	FEB 2026	JJS	CS
Drawing No	HD169-TVSP-0108		Revision
			C

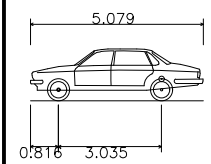




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3.5t Panel Van
Overall Length 5.339m
Overall Width 1.872m
Overall Body Height 1.872m
Min Body Ground Clearance 0.338m
Track Width 1.831m
Lock to lock time 4.00s
Kerb to Kerb Turning Radius 6.400m



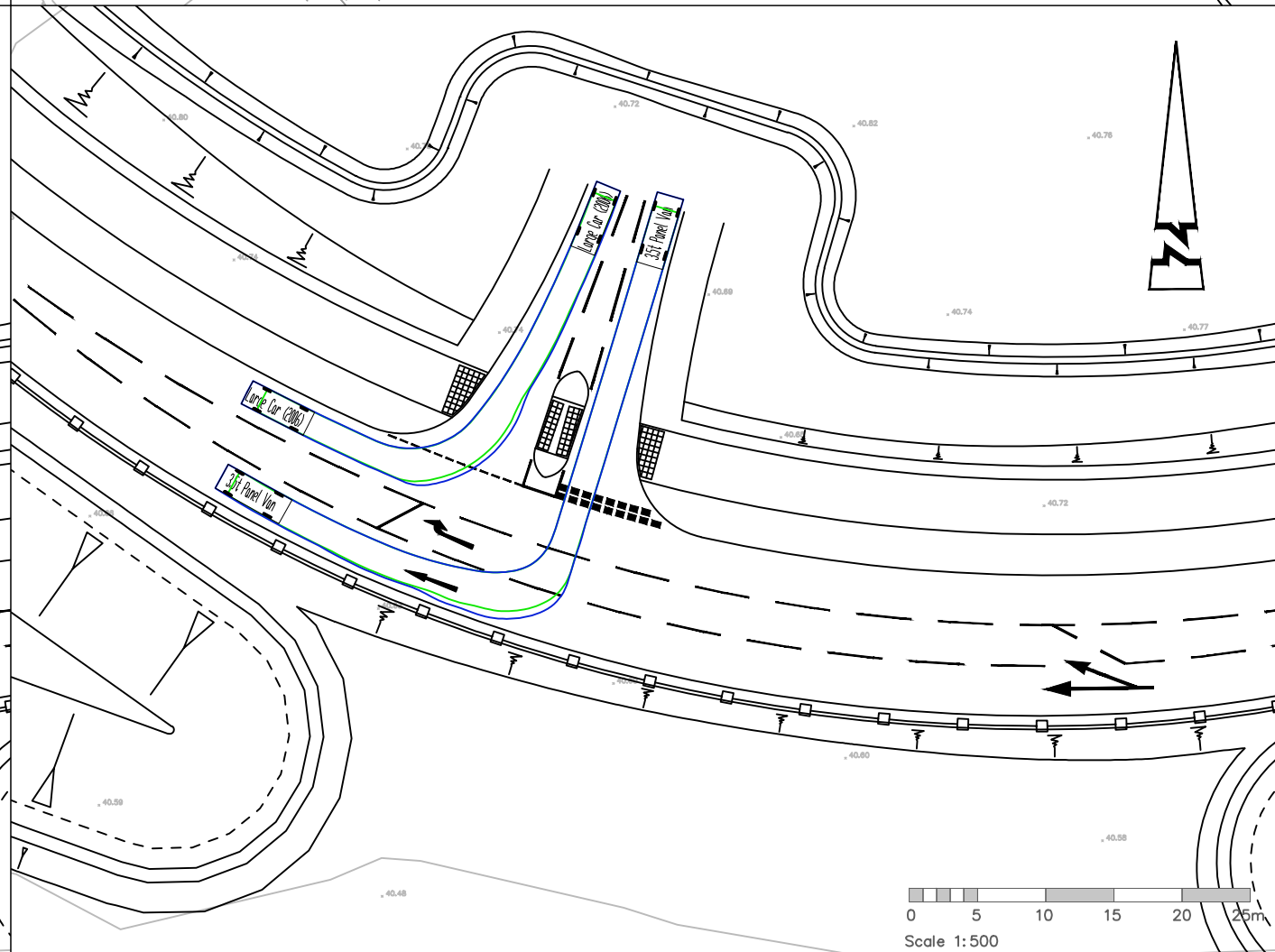
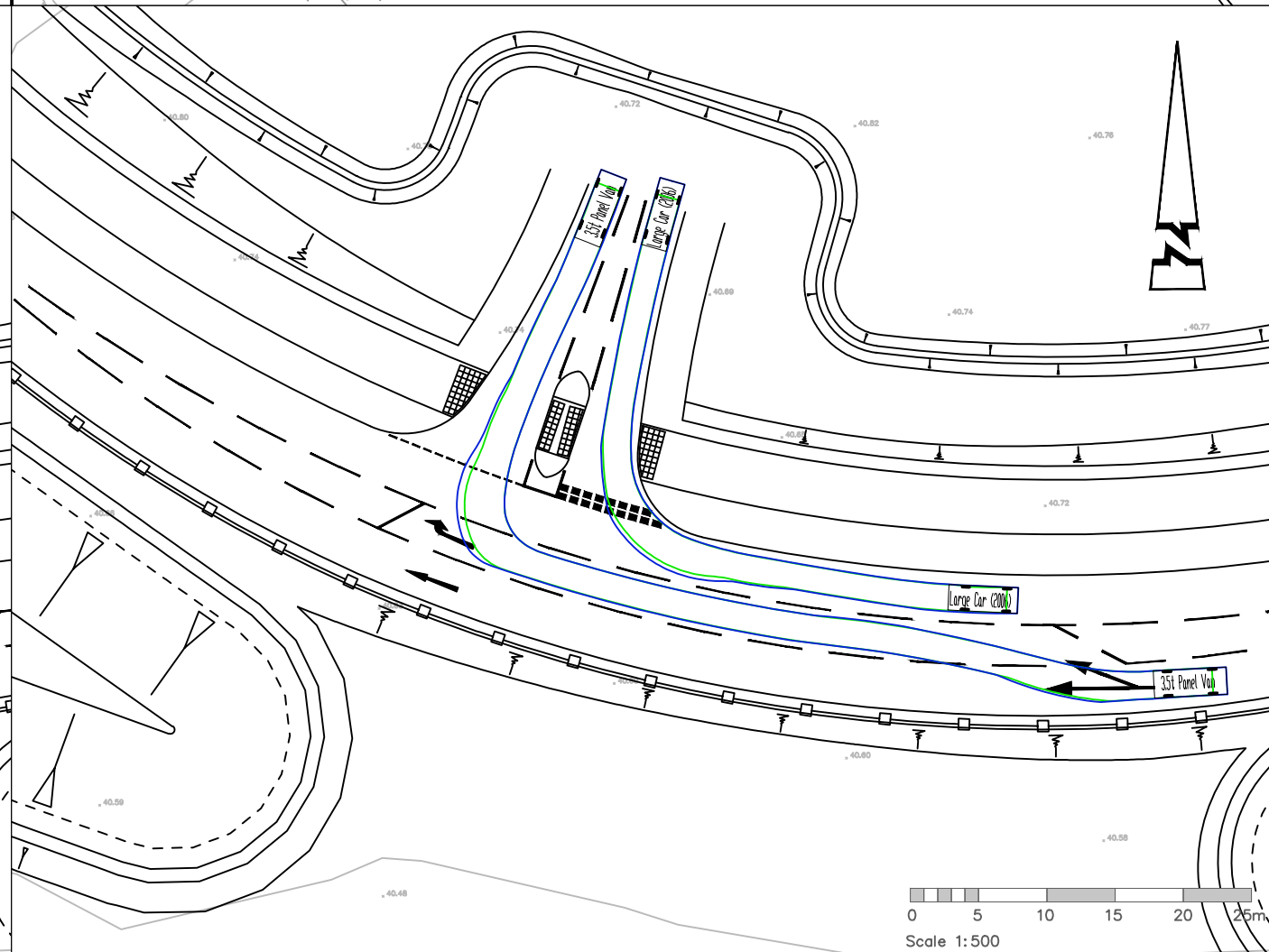
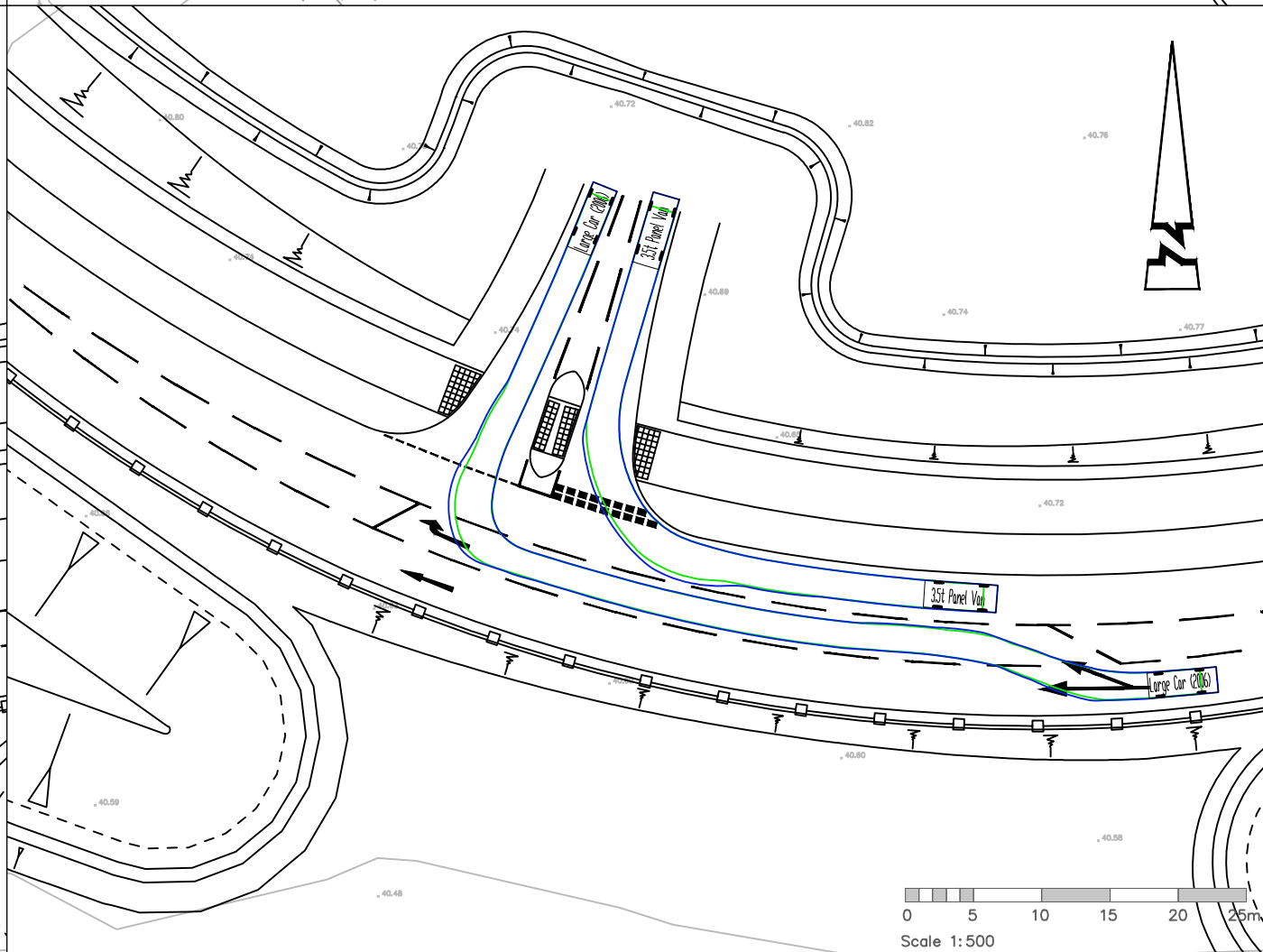
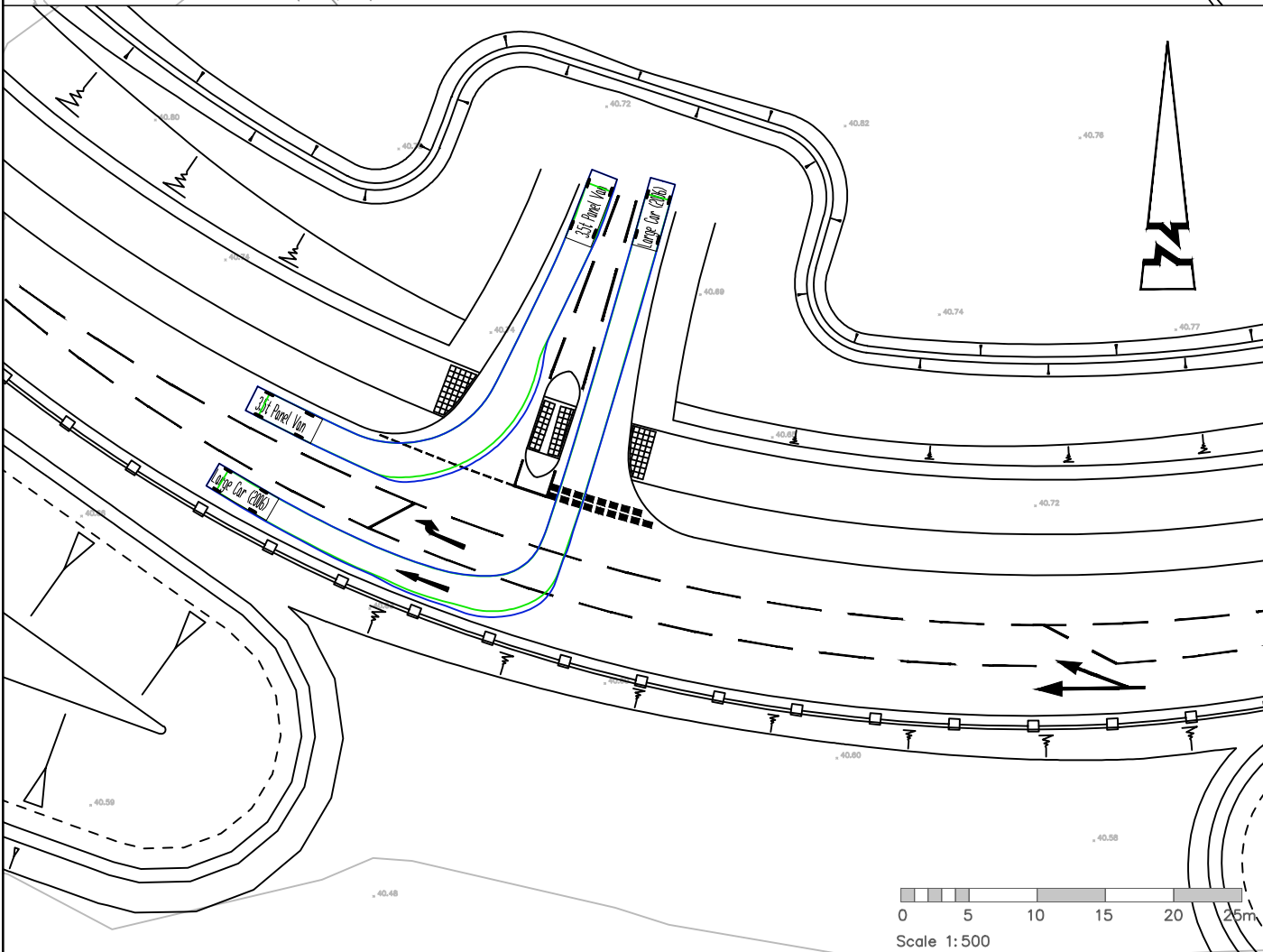
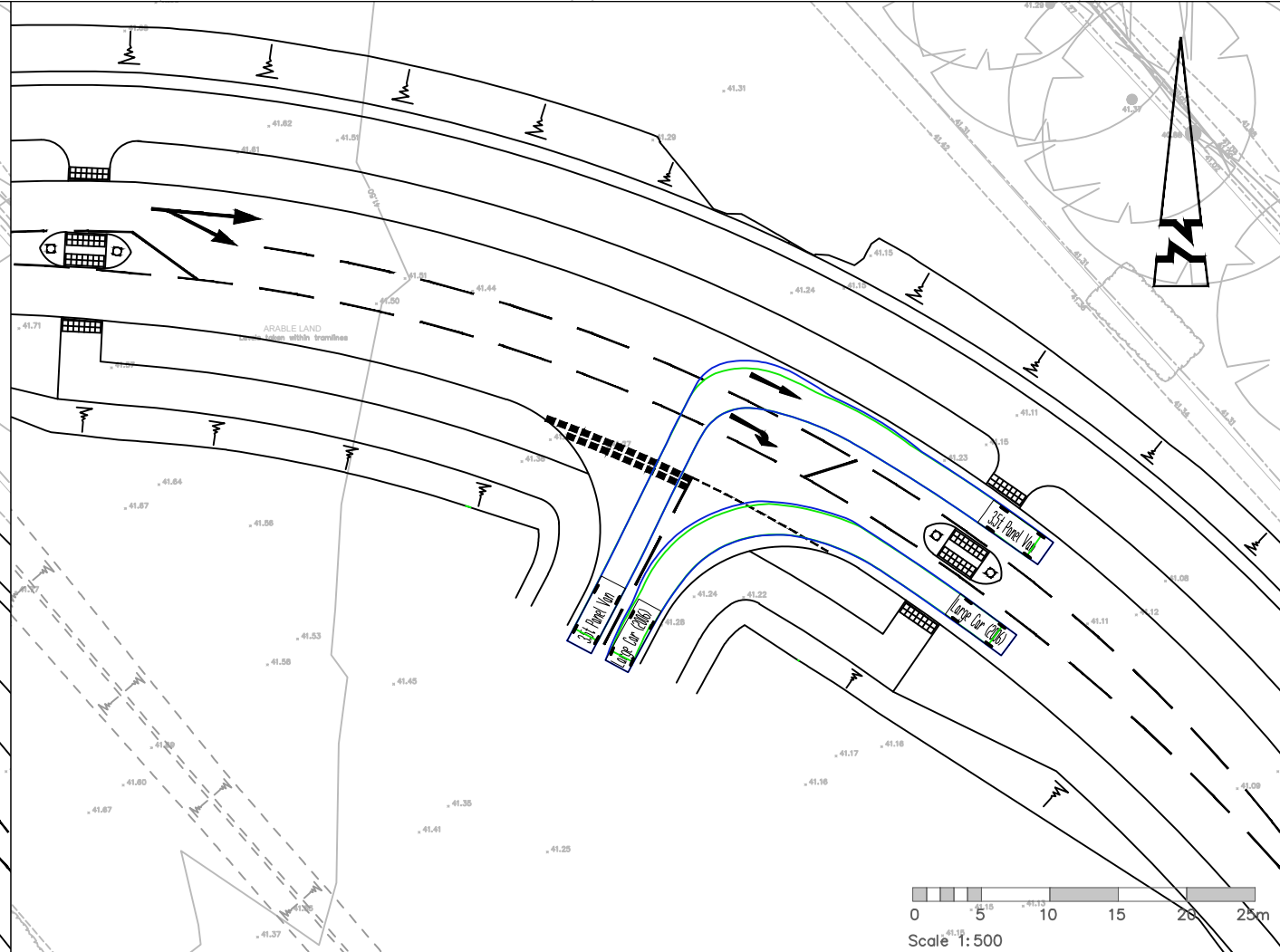
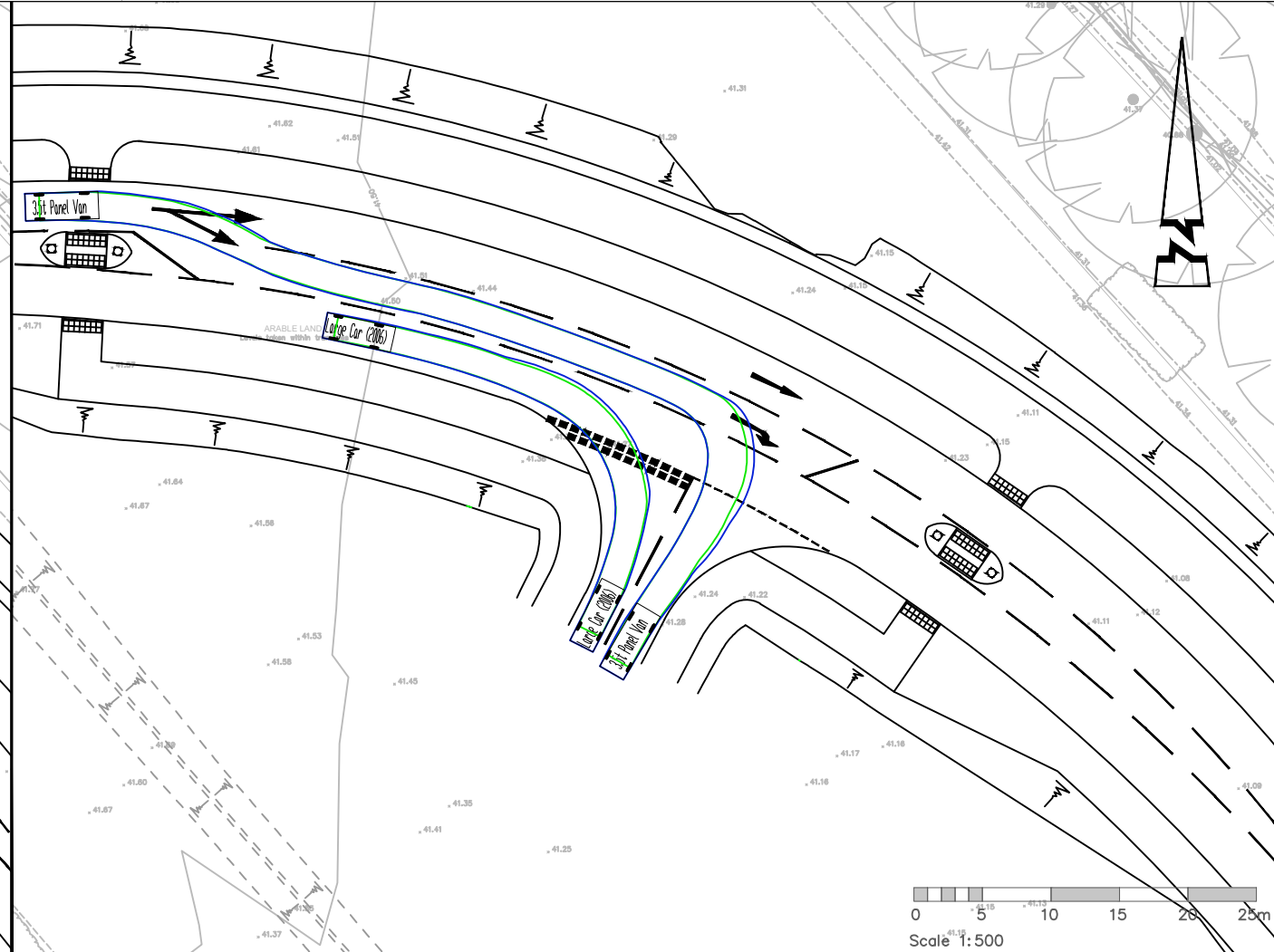
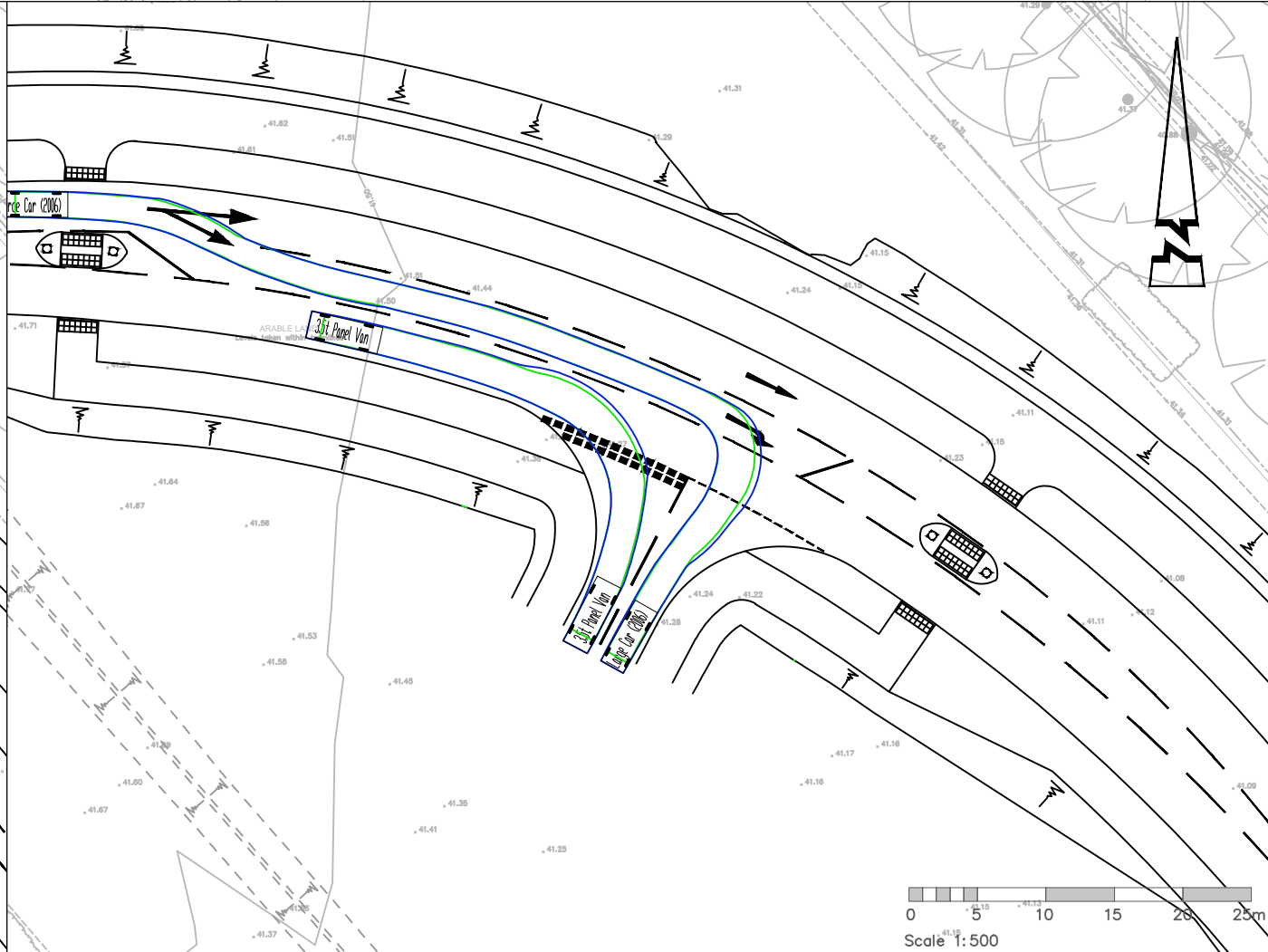
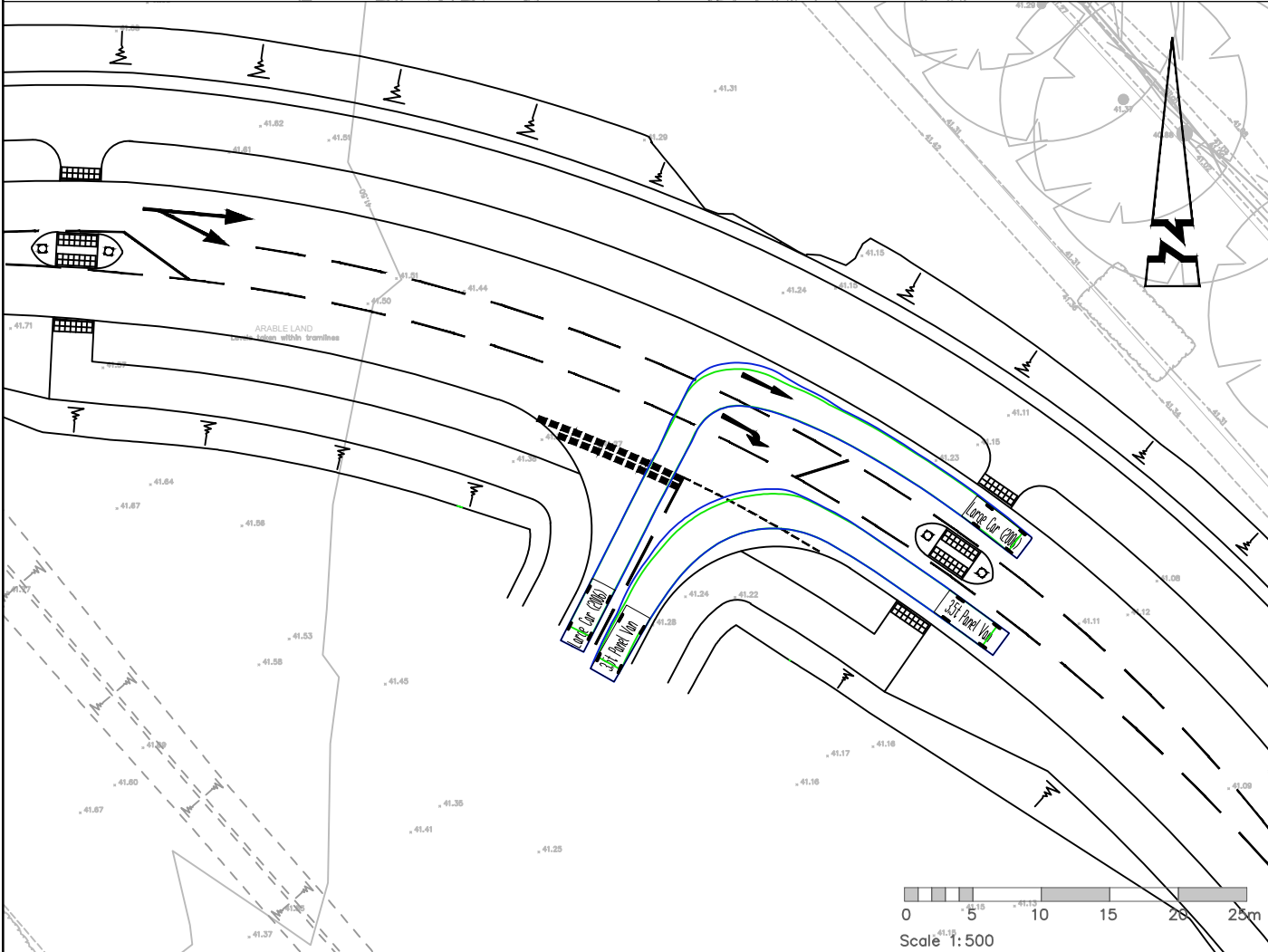
Large Car (2006)
Overall Length 5.079m
Overall Width 1.872m
Overall Body Height 1.872m
Min Body Ground Clearance 0.338m
Max Track Width 1.831m
Lock to lock time 4.00s
Kerb to Kerb Turning Radius 5.900m

GENERAL NOTES:
1. Do not scale.
2. Refer to all other Project Drawings and supporting notes.

TVSP ROUNDABOUT PART OF LODDON GARDEN VILLAGE OUTLINE PLANNING APPLICATION REF: 252489

NRM BUILDING APPROVED UNDER APPLICATION No.252833

0 10 20 30 40 50m
Scale 1:1000



C	03/26	UPDATED TO REFLECT RSA 2 RESPONSES	JJS	CS
B	02/26	LAYOUT AMENDED	AS	CS
A	02/26	FOR REVIEW	JJS	CS
Rev	Date	Description	Drawn	Checked



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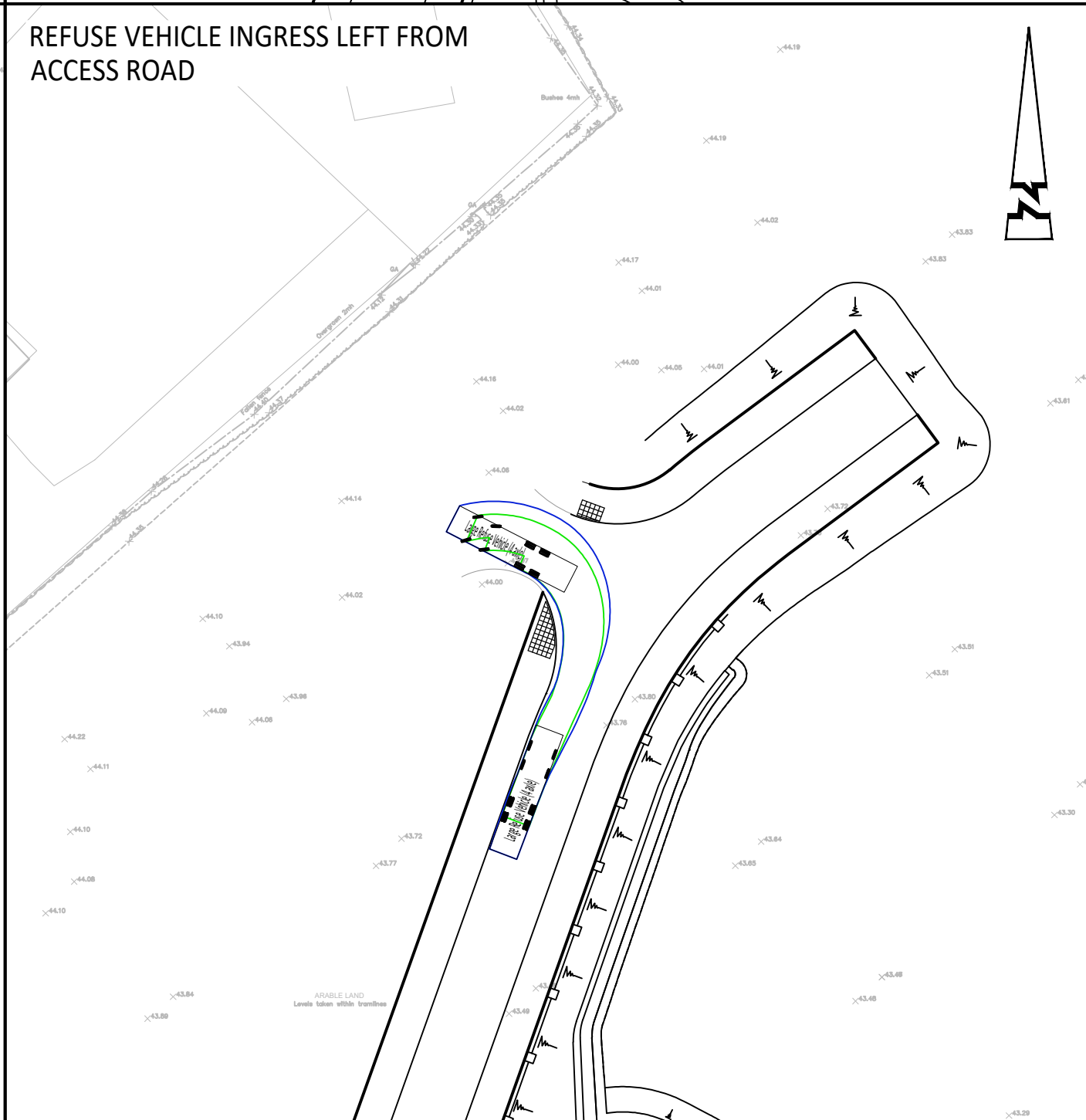
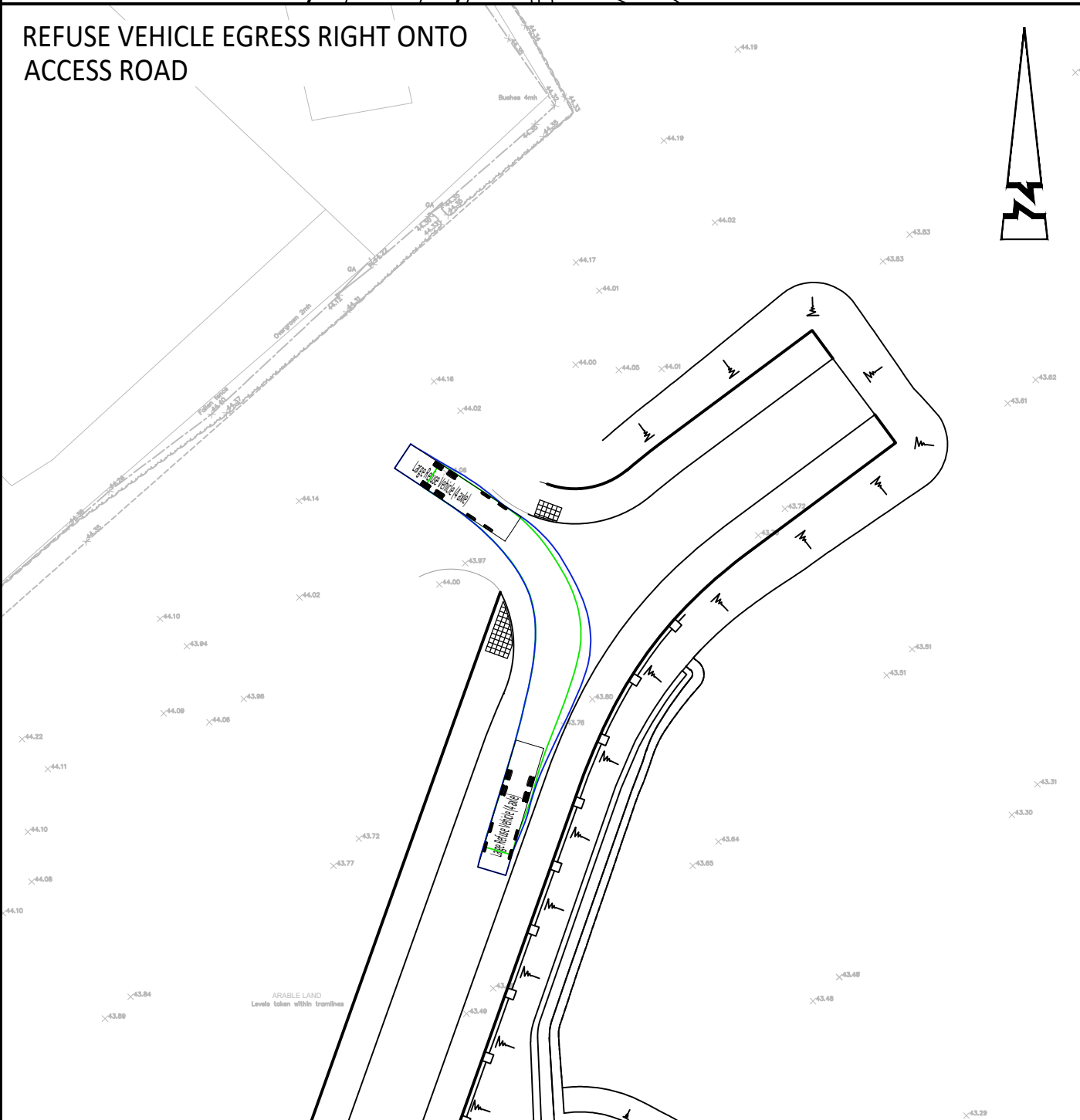
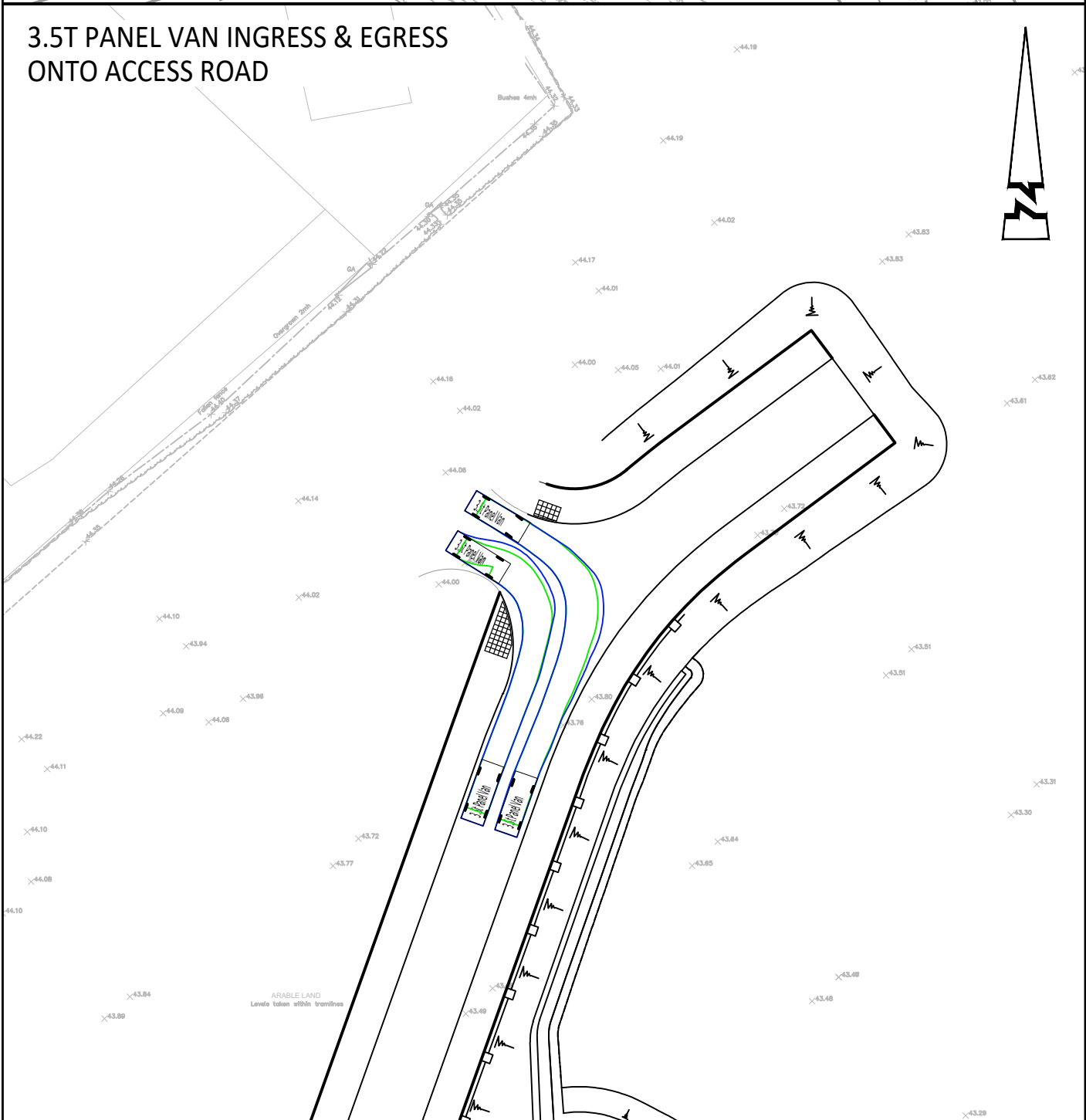
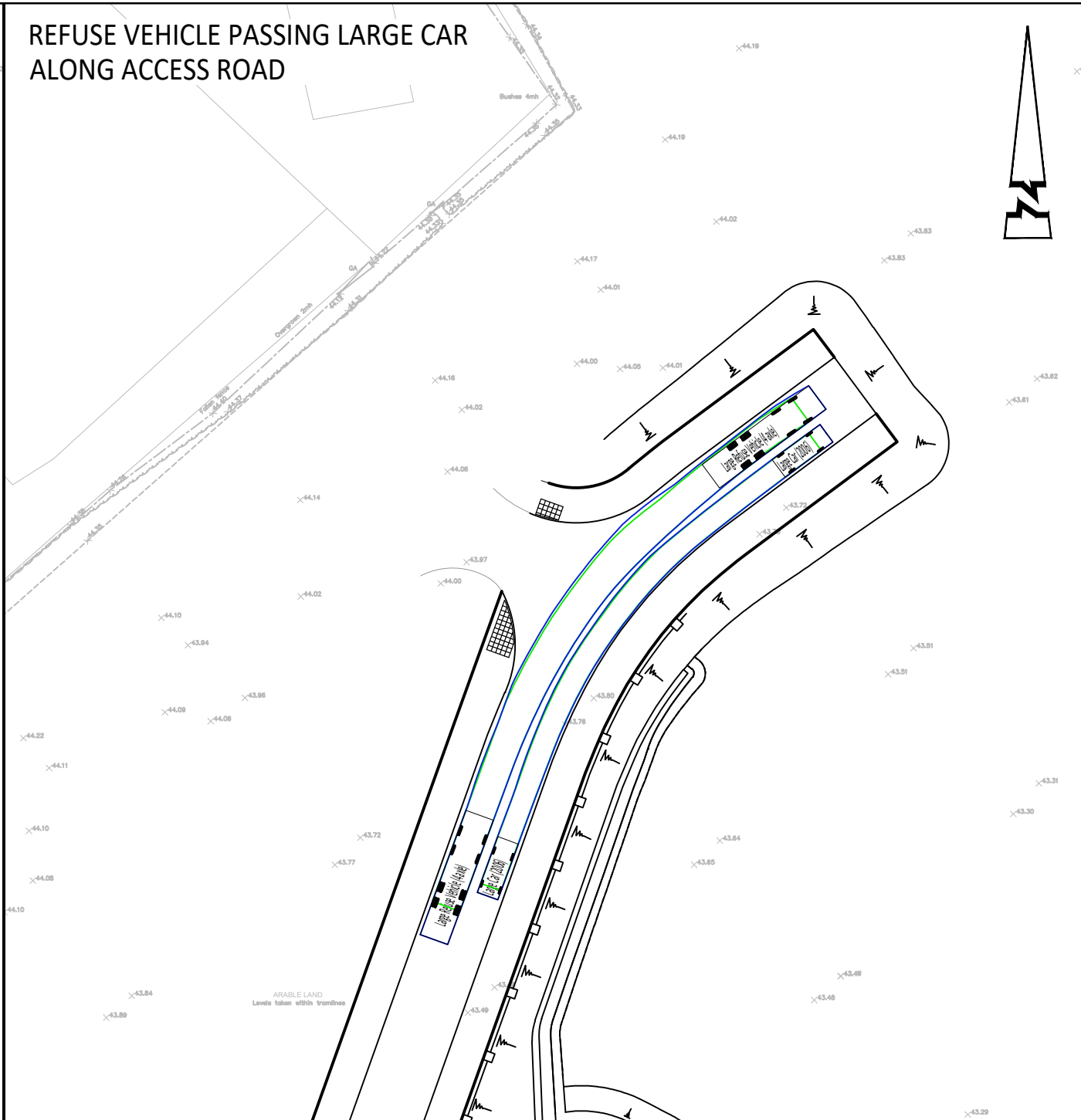
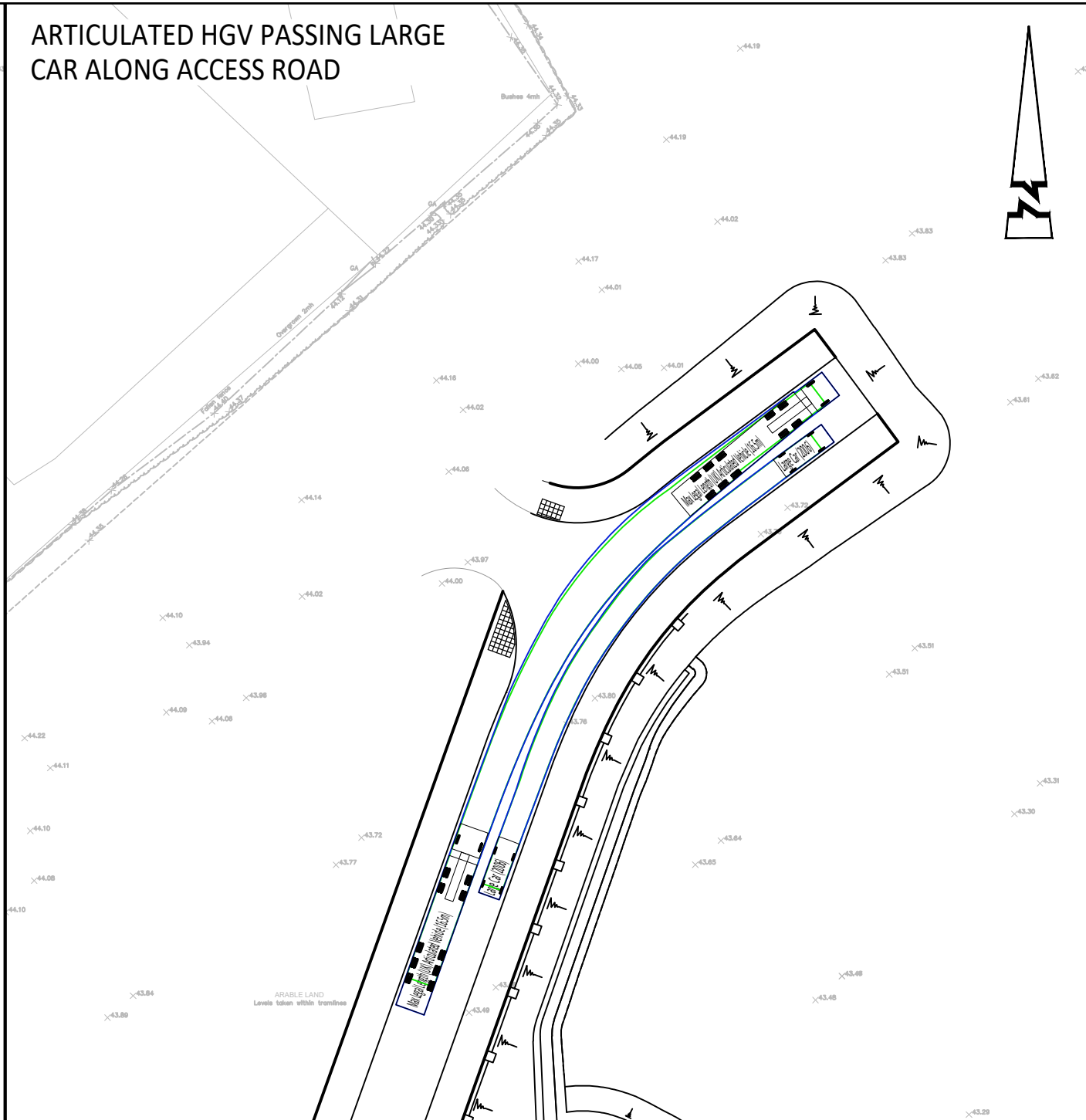
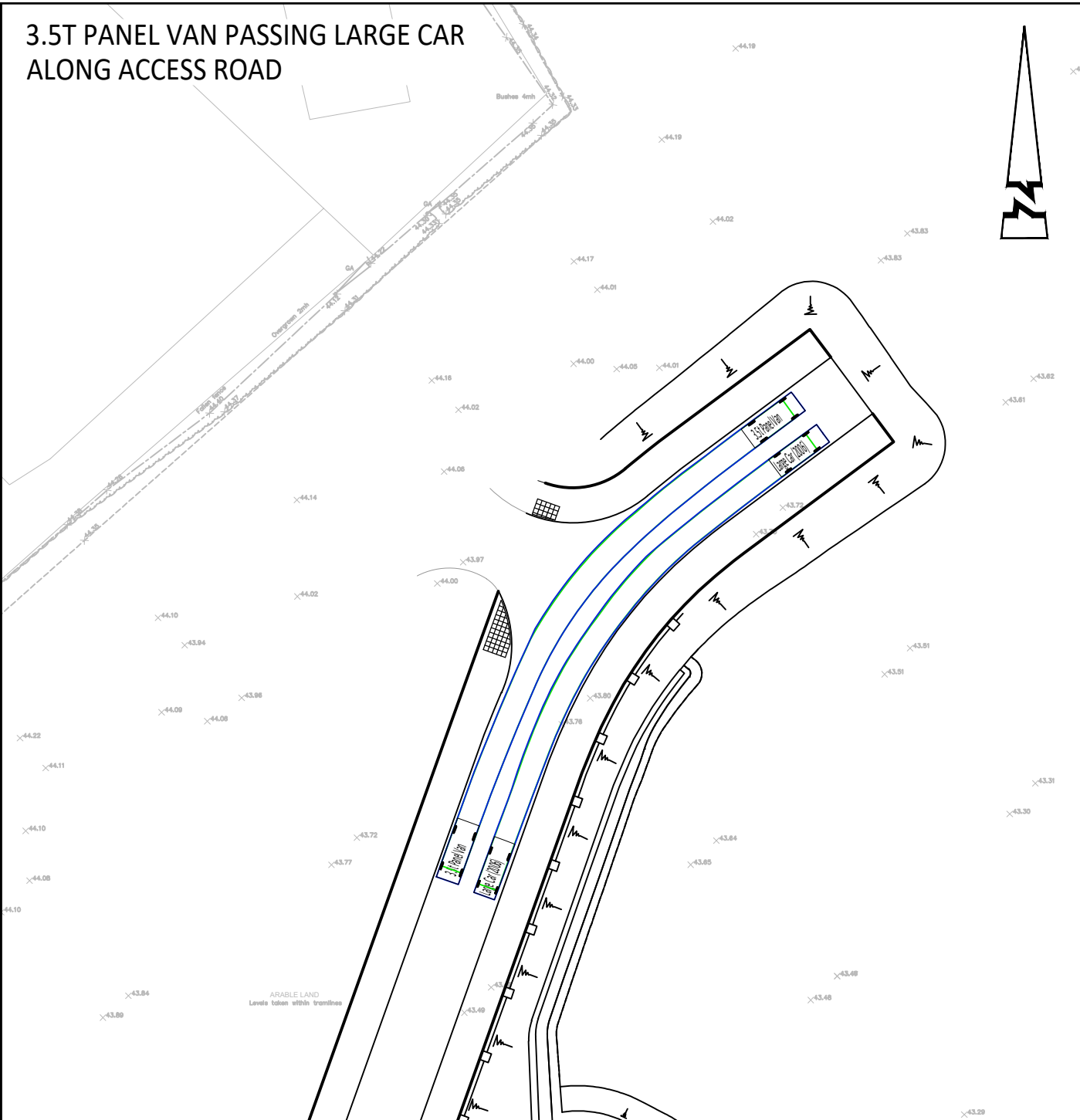
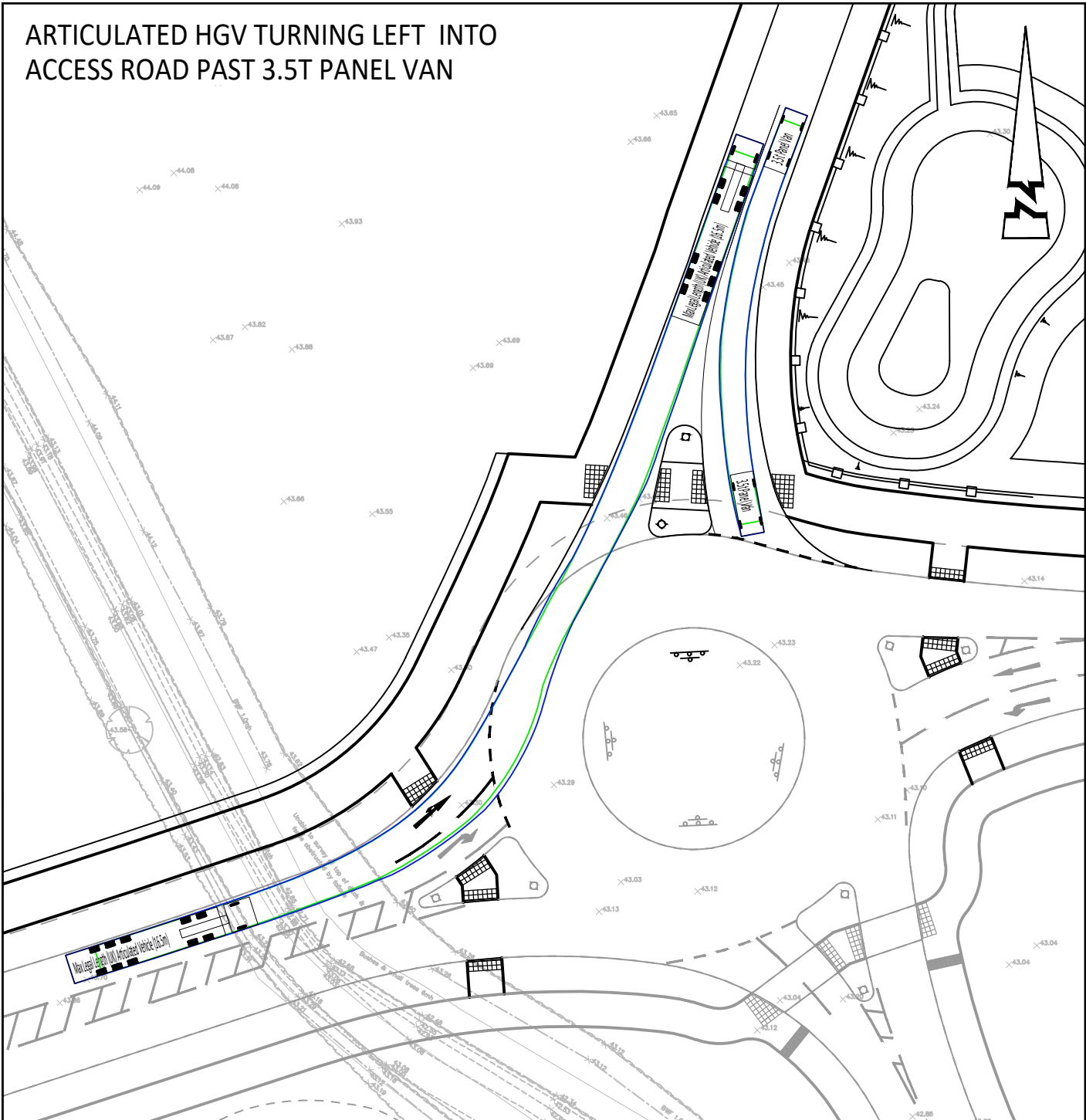
Project
THAMES VALLEY SCIENCE PARK - LODDON GARDEN VILLAGE LINK ROAD

Title
**SWEPT PATH ANALYSIS SHEET 5
PANEL VAN & LARGE CAR**

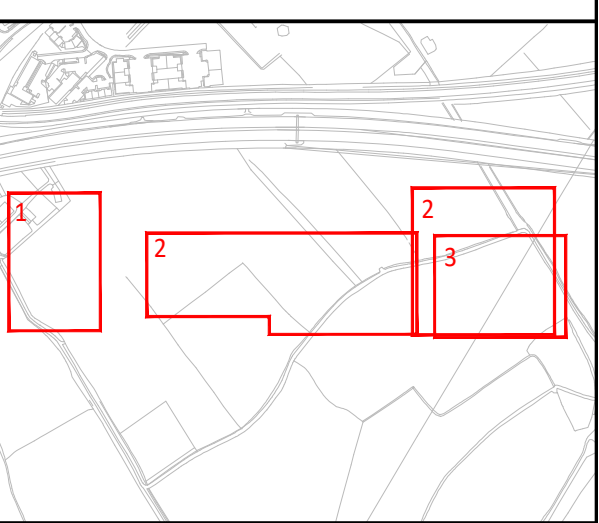
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Scale	Date	Drawn	Checked
AS SHOWN @ A1	FEB 2026	JJS	CS

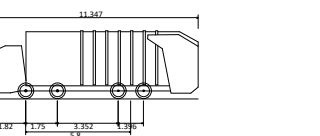
Drawing No.	Revision
HD169-TVSP-0109	C



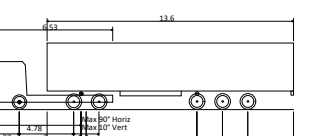
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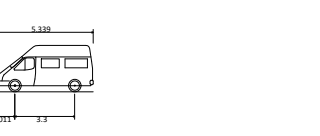
NOTES:
1. Do not scale.
2. Refer to all other Project Drawings and supporting notes.



Large Refuse Vehicle (4 axle)
Overall Length 11.347m
Overall Width 2.550m
Overall Body Height 3.130m
Min Body Ground Clearance 0.210m
Track Width 2.240m
Load to Deck Time 6.00m
Kerb to Kerb Turning Radius 11.500m



3.5t Panel Van
Overall Length 5.330m
Overall Width 1.920m
Overall Body Height 2.130m
Min Body Ground Clearance 0.210m
Track Width 1.840m
Load to Deck Time 4.00m
Kerb to Kerb Turning Radius 6.500m



Large Car (2000)
Overall Length 4.670m
Overall Width 1.920m
Overall Body Height 1.520m
Min Body Ground Clearance 0.210m
Track Width 1.840m
Load to Deck Time 4.00m
Kerb to Kerb Turning Radius 5.900m

C	03/26	UPDATED TO REFLECT RSA 2 RESPONSES	JJS	CS
B	02/26	LAYOUT AMENDED	AS	CS
A	02/26	FOR REVIEW	AS	CS
Rev	Date	Description	Drawn	Checked



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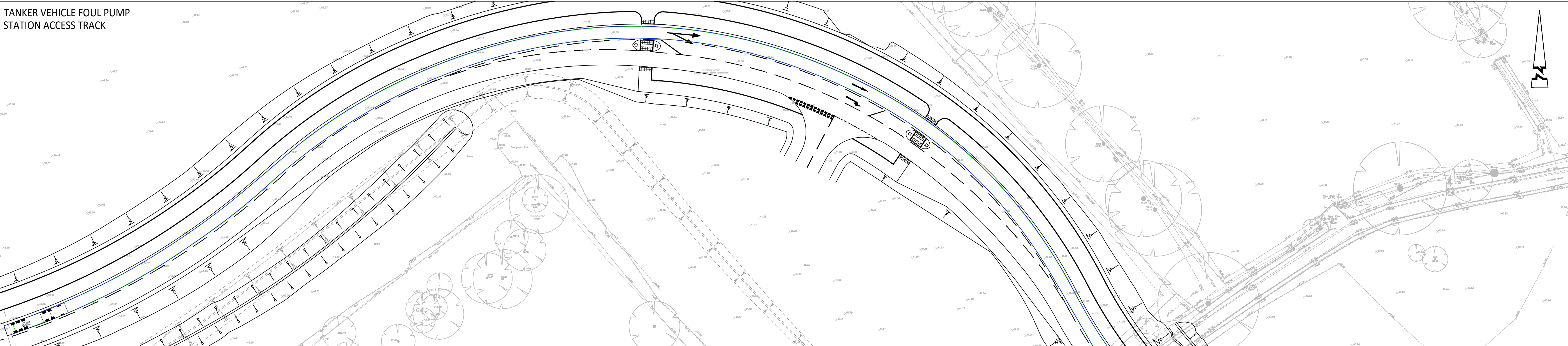
Project
THAMES VALLEY SCIENCE PARK - LODDON GARDEN VILLAGE LINK ROAD

Title
SWEEP PATH ANALYSIS SHEET 6

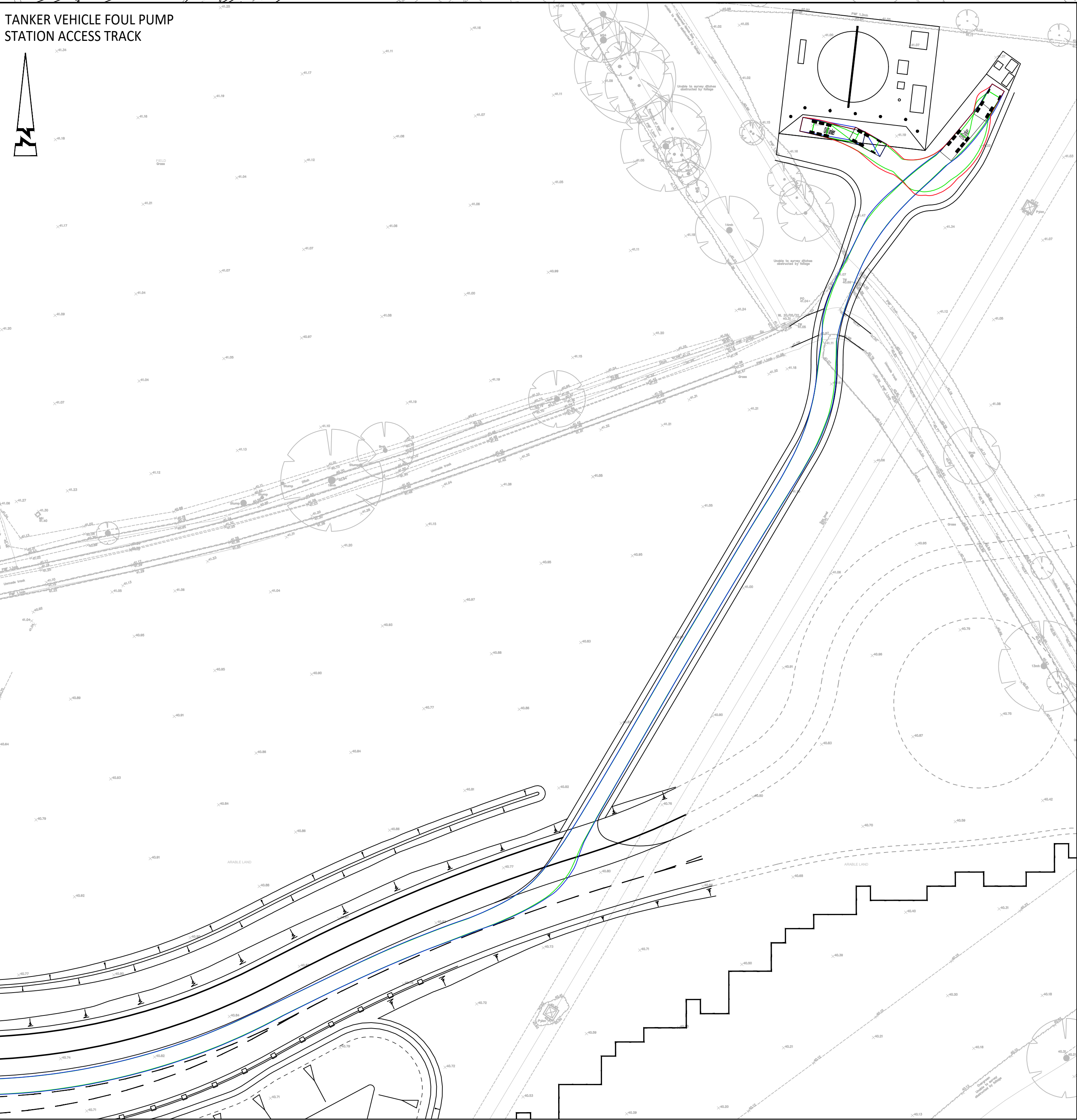
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Drawing No.	Revision		
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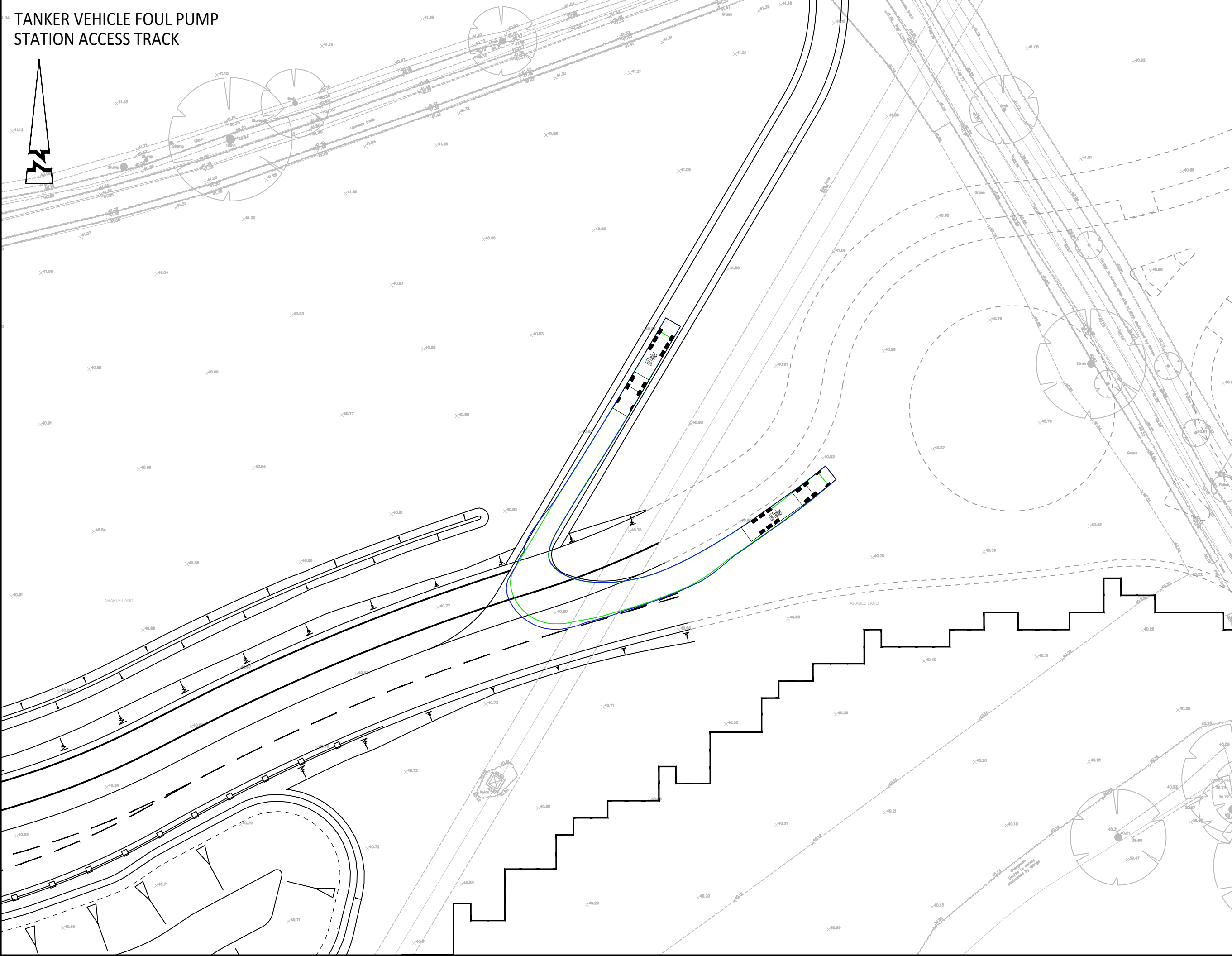
TANKER VEHICLE FOUL PUMP
STATION ACCESS TRACK



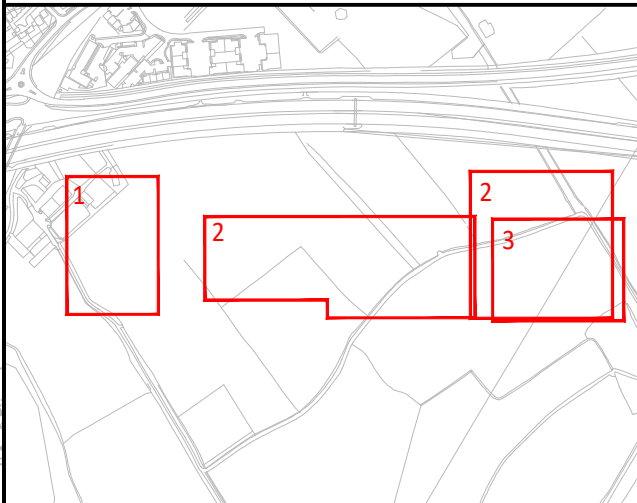
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STATION ACCESS TRACK



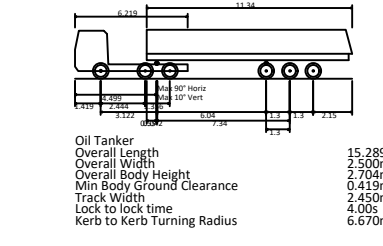
TANKER VEHICLE FOUL PUMP
STATION ACCESS TRACK



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NOTES:
1. Do not scale.
2. Refer to all other Project Drawings and supporting notes.



C	03/26	UPDATED TO REFLECT RSA 2 RESPONSES	JJS	CS
B	02/26	LAYOUT AMENDED	AS	CS
A	02/26	FOR REVIEW	AS	CS
Rev	Date	Description	Drawn	Checked



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Project
THAMES VALLEY SCIENCE
PARK - LODDON GARDEN
VILLAGE LINK ROAD

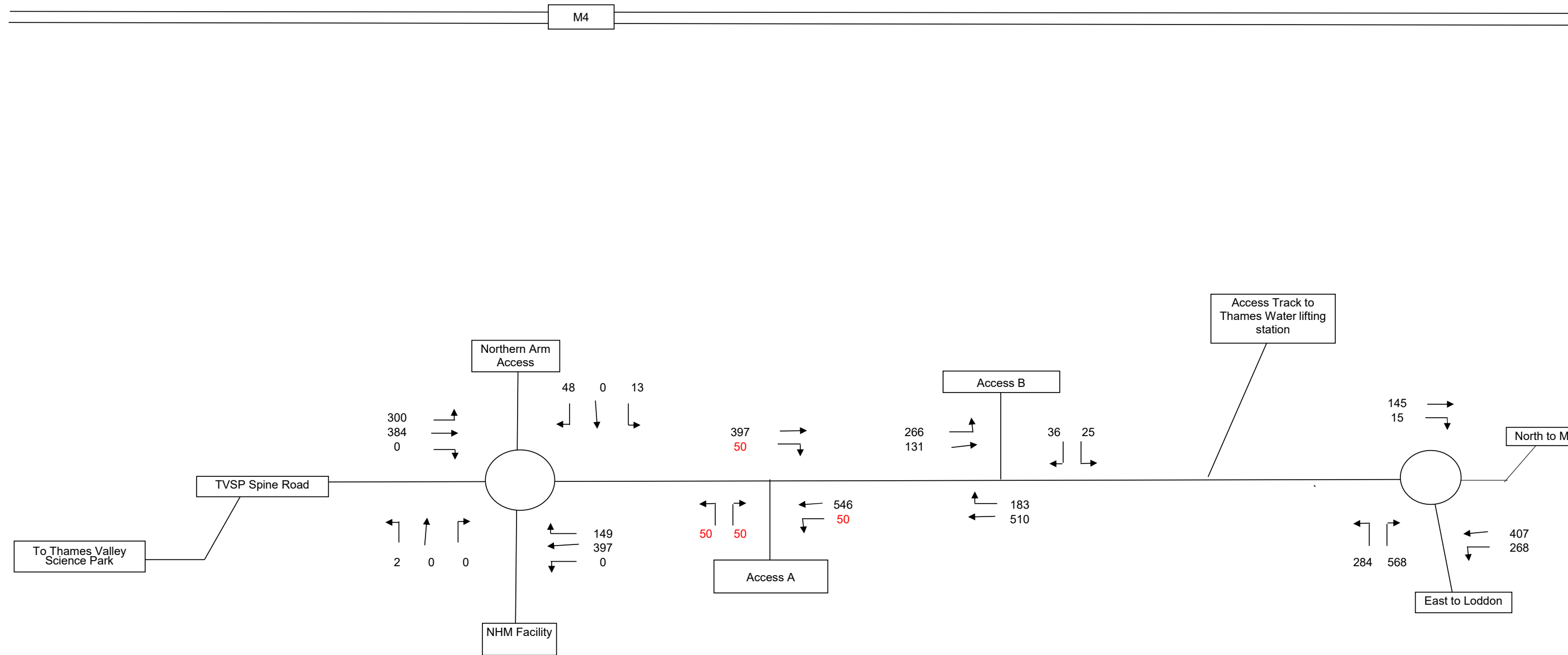
Title
SWEEP PATH ANALYSIS
SHEET 7

Status

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Drawing No	Revision		
HD169-TVSP-0111	C		



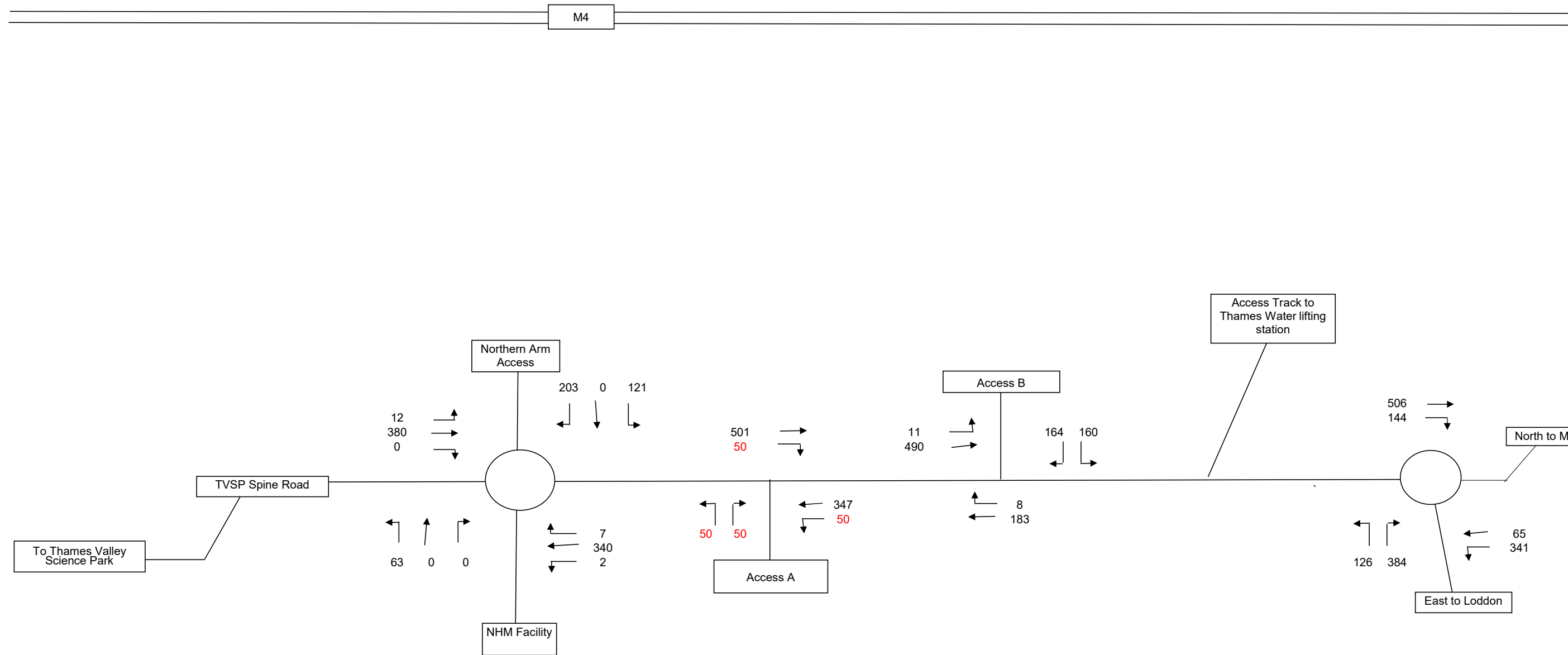
Appendix E – Traffic Flow Diagrams



NOTE		
0	-	Total Vehicles
0	-	Total vehicles (Trips assumed to provide robust estimate)



Job No HD169-TVSP	Project : HD169 TVSP Link Road
Date FEB 2026	Title : 2040 with LGV Development AM
Drawn EH	Figure No : TM-1



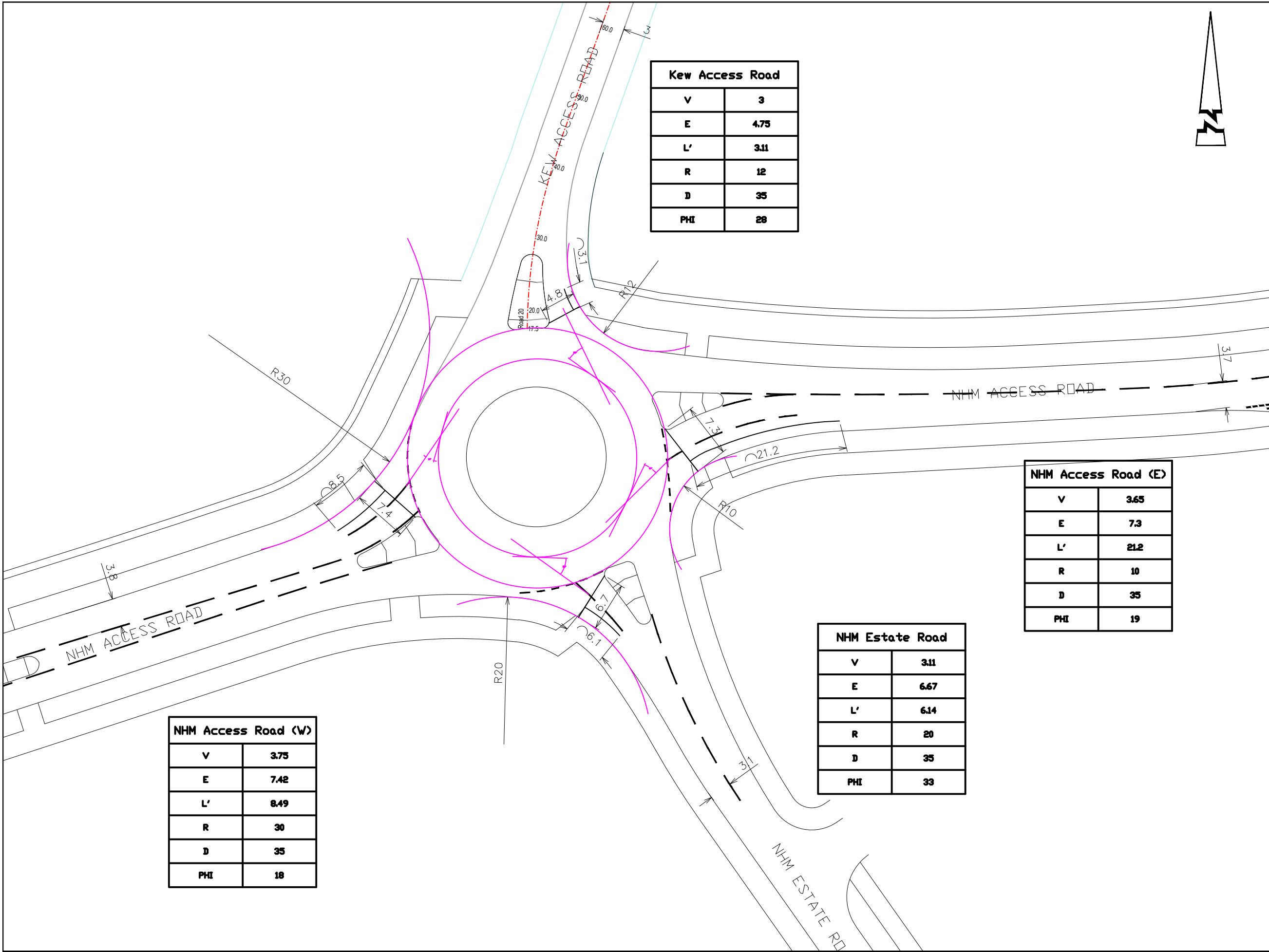
NOTE		
0	-	Total Vehicles
0	-	Total vehicles (Trips assumed to provide robust estimate)



Job No HD169-TVSP	Project : HD169 TVSP Link Road
Date FEB 2026	Title : 2040 with LGV Development AM
Drawn EH	Figure No : TM-2



Appendix F – Junction Geometries



Kew Access Road	
V	3
E	4.75
L'	3.11
R	12
D	35
PHI	28

NHM Access Road (E)	
V	3.65
E	7.3
L'	21.2
R	10
D	35
PHI	19

NHM Estate Road	
V	3.11
E	6.67
L'	6.14
R	20
D	35
PHI	33

NHM Access Road (W)	
V	3.75
E	7.42
L'	8.49
R	30
D	35
PHI	18

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A	02.26	FIRST ISSUE	EH	AG
Rev	Date	Description	Drawn	Checked



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Project

TVSP LGV LINK ROAD

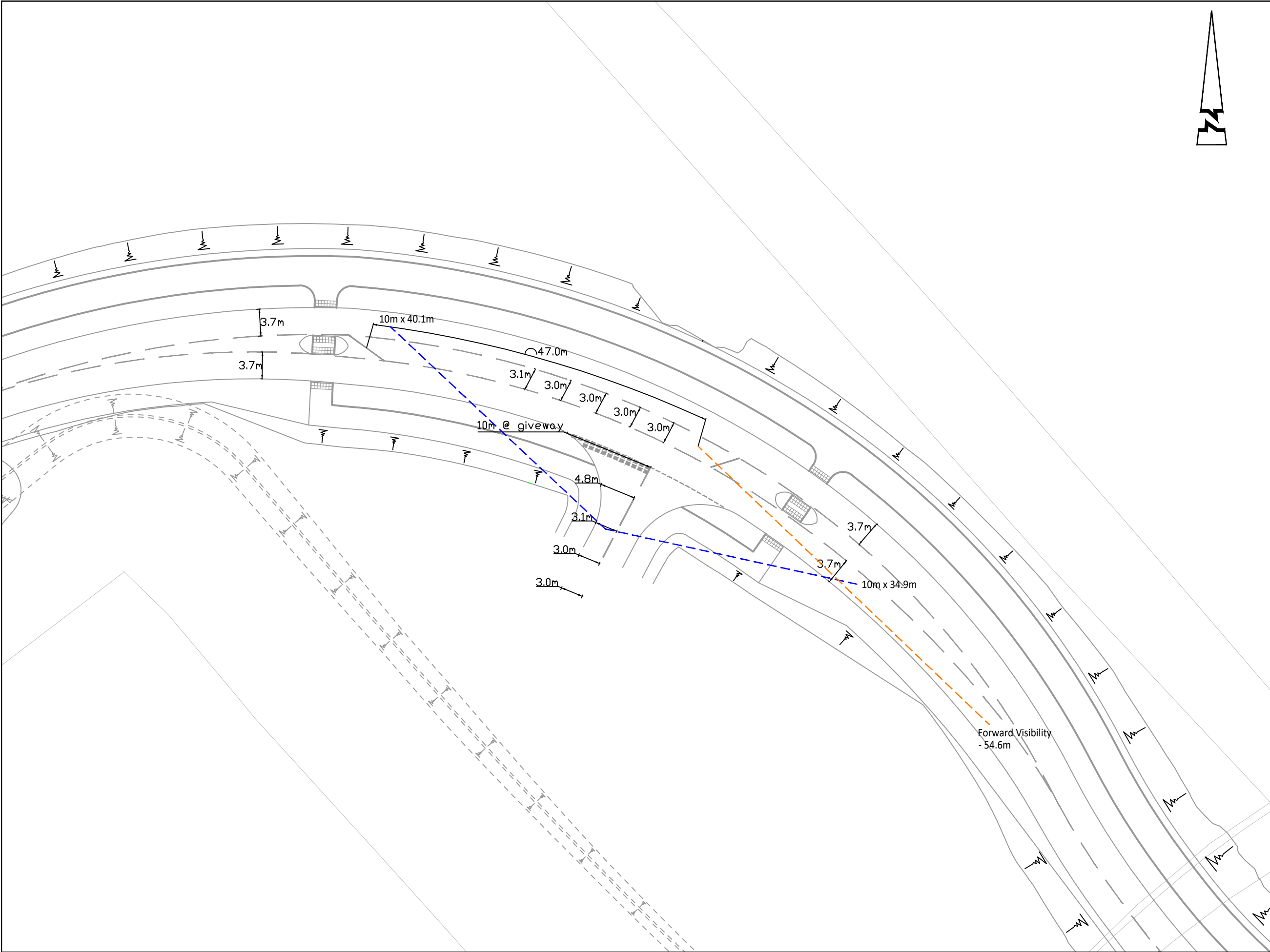
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NHM ACCESS ROUNDABOUT

Status

FOR INFORMATION

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Drawing No			Revision
HD169-008			A



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TVSP LGV LINK ROAD

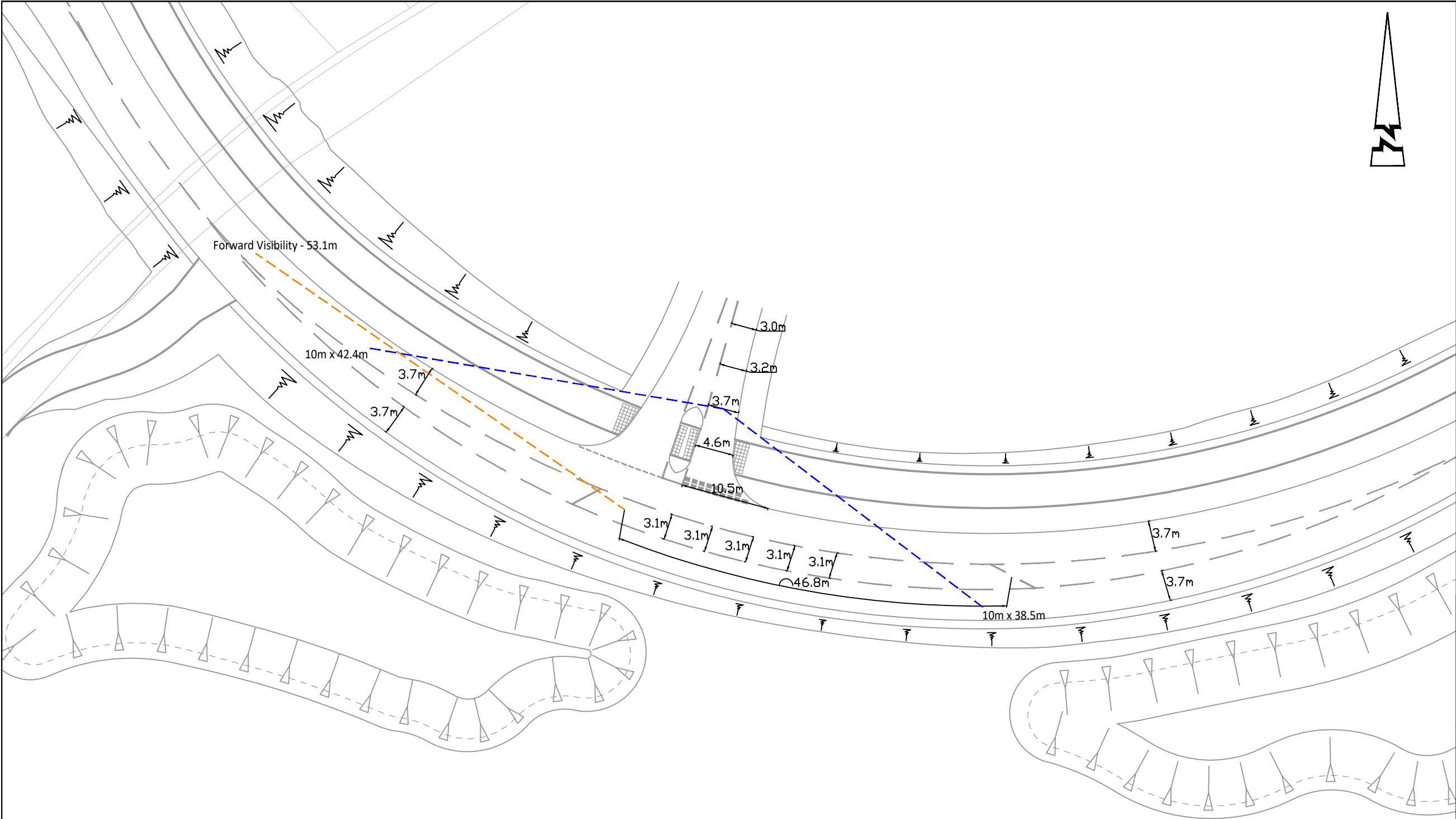
Title

PRIORITY JUNCTION ON
SOUTHERN SIDE OF LINK
ROAD

Status

FOR INFORMATION

Scale	Date	Drawn	Checked
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Drawing No	Revision		
HD169-TVSP-002	A		



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Project

TVSP LGV LINK ROAD

Title

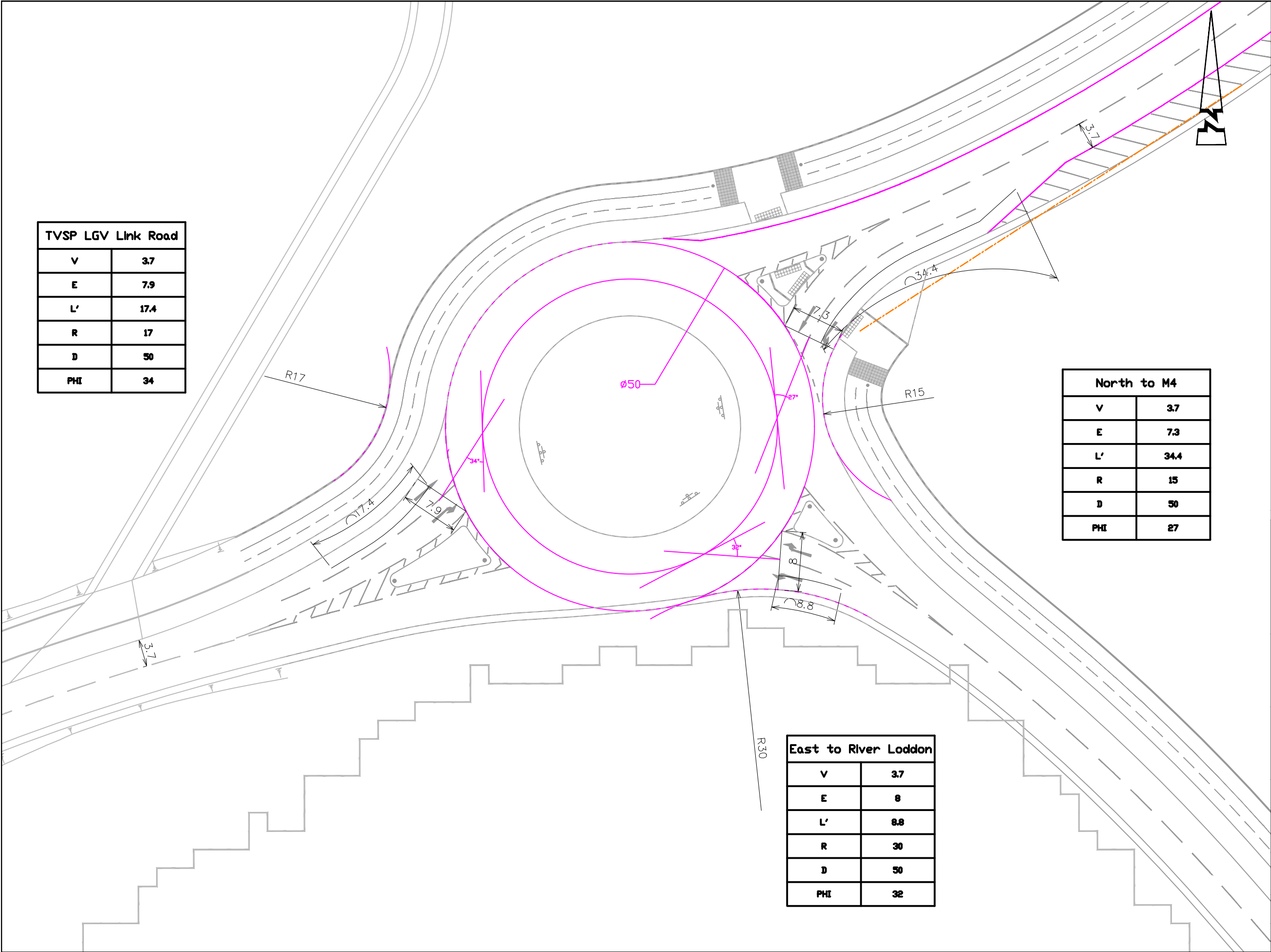
PRIORITY JUNCTION ON
NORTHERN SIDE OF LINK
ROAD

Status

FOR INFORMATION

Scale	Date	Drawn	Checked
1:500@A3	FEB 2026	EH	AG

Drawing No	Revision
HD169-TVSP-002	A



TVSP LGV Link Road	
V	3.7
E	7.9
L'	17.4
R	17
D	50
PHI	34

North to M4	
V	3.7
E	7.3
L'	34.4
R	15
D	50
PHI	27

East to River Loddon	
V	3.7
E	8
L'	8.8
R	30
D	50
PHI	32

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A	02.26	FIRST ISSUE	EH	AG
Rev	Date	Description	Drawn	Checked



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Client
UNIVERSITY OF READING

Project
TVSP LGV LINK ROAD

Title
**INTERNAL LGV
ROUNDBABOUT**

Status
FOR INFORMATION

Scale 1:500@A3	Date FEB 2026	Drawn EH	Checked AG
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Drawing No HD169-TVSP-007	Revision A
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Appendix G – Capacity Assessments

Junctions 11					
ARCADY 11 - Roundabout Module					
Version: 11.0.0.2177					
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Filename: 260218 NHM Access Roundabout.j11

Path: P:\HD169 TVSP Access Roads\Deliverables\Transport\Modelling\Junction\Junction 11

Report generation date: 25/02/2026 10:58:12

»2040 | With Dev | AM

»2040 | With Dev | PM

Summary of junction performance

	AM			PM		
	Queue (Veh)	Delay (s)	RFC	Queue (Veh)	Delay (s)	RFC
2040 - With Dev						
A - Kew Access Road	0.1	4.65	0.08	0.7	7.39	0.42
B - TVSP LGV Link Road	0.5	3.14	0.34	0.3	2.88	0.24
C - NHM Facility	0.0	0.00	0.00	0.1	4.09	0.07
D - NHM Access Road	0.9	4.41	0.48	0.3	2.90	0.26

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	NHM Access Roundabout
Location	TVSP
Site number	HD169
Date	18/02/2026
Version	
Status	(new file)
Identifier	E Hine
Client	
Jobnumber	HHD169
Enumerator	ALPCE\transportuser
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	Veh	Veh	perHour	s	-Min	perMin

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	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D1	2040	With Dev	AM	ONE HOUR	08:00	09:30	15
D2	2040	With Dev	PM	ONE HOUR	17:00	18:30	15

Analysis Set Details

ID	Network flow scaling factor (%)
A1	100.000

2040 | With Dev | AM

Data Errors and Warnings

No errors or warnings

Junction Network

Junctions

Junction	Name	Junction type	Use circulating lanes	Arm order	Junction Delay (s)	Junction LOS
1	untitled	Standard Roundabout		A, B, C, D	3.89	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	3.89	A

Arms

Arms

Arm	Name	Description	No give-way line
A	Kew Access Road		
B	TVSP LGV Link Road		
C	NHM Facility		
D	NHM Access Road		

Roundabout Geometry

Arm	V - Approach road half-width (m)	E - Entry width (m)	I' - Effective flare length (m)	R - Entry radius (m)	D - Inscribed circle diameter (m)	PHI - Conflict (entry) angle (deg)	Entry only	Exit only
A - Kew Access Road	3.00	4.75	3.1	12.0	35.0	28.0		
B - TVSP LGV Link Road	3.65	7.30	21.2	10.0	35.0	19.0		
C - NHM Facility	3.11	6.67	6.1	20.0	35.0	33.0		
D - NHM Access Road	3.75	7.42	8.5	30.0	35.0	18.0		

Slope / Intercept / Capacity

Roundabout Slope and Intercept used in model

Arm	Final slope	Final intercept (PCU/hr)
A - Kew Access Road	0.516	1070
B - TVSP LGV Link Road	0.668	1800
C - NHM Facility	0.569	1306
D - NHM Access Road	0.668	1696

The slope and intercept shown above include any corrections and adjustments.

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D1	2040	With Dev	AM	ONE HOUR	08:00	09:30	15

Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - Kew Access Road		✓	61	100.000
B - TVSP LGV Link Road		✓	546	100.000
C - NHM Facility		✓	2	100.000
D - NHM Access Road		✓	684	100.000

Origin-Destination Data

Demand (Veh/hr)

	To				
		A - Kew Access Road	B - TVSP LGV Link Road	C - NHM Facility	D - NHM Access Road
From	A - Kew Access Road	0	13	0	48
	B - TVSP LGV Link Road	149	0	0	397
	C - NHM Facility	0	0	0	2
	D - NHM Access Road	300	384	0	0

Vehicle Mix

Heavy Vehicle %

	To				
		A - Kew Access Road	B - TVSP LGV Link Road	C - NHM Facility	D - NHM Access Road
From	A - Kew Access Road	0	1	0	1
	B - TVSP LGV Link Road	1	0	0	1
	C - NHM Facility	0	0	0	1
	D - NHM Access Road	1	1	0	0

Results

Results Summary for whole modelled period

Arm	Max RFC	Max Delay (s)	Max Queue (Veh)	Max LOS
A - Kew Access Road	0.08	4.65	0.1	A
B - TVSP LGV Link Road	0.34	3.14	0.5	A
C - NHM Facility	0.00	0.00	0.0	A
D - NHM Access Road	0.48	4.41	0.9	A

Main Results for each time segment

08:00 - 08:15

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
A - Kew Access Road	46	288	911	0.050	46	0.1	4.159	A
B - TVSP LGV Link Road	411	36	1758	0.234	410	0.3	2.668	A
C - NHM Facility	0	446	1040	0.000	0	0.0	0.000	A
D - NHM Access Road	515	112	1604	0.321	513	0.5	3.294	A

08:15 - 08:30

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
A - Kew Access Road	55	345	882	0.062	55	0.1	4.354	A
B - TVSP LGV Link Road	491	43	1753	0.280	491	0.4	2.851	A
C - NHM Facility	0	534	990	0.000	0	0.0	0.000	A
D - NHM Access Road	615	134	1589	0.387	614	0.6	3.690	A

08:30 - 08:45

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
A - Kew Access Road	67	422	842	0.080	67	0.1	4.647	A
B - TVSP LGV Link Road	601	53	1746	0.344	601	0.5	3.140	A
C - NHM Facility	0	653	922	0.000	0	0.0	0.000	A
D - NHM Access Road	753	164	1569	0.480	752	0.9	4.397	A

08:45 - 09:00

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
A - Kew Access Road	67	423	841	0.080	67	0.1	4.649	A
B - TVSP LGV Link Road	601	53	1746	0.344	601	0.5	3.142	A
C - NHM Facility	0	654	922	0.000	0	0.0	0.000	A
D - NHM Access Road	753	164	1569	0.480	753	0.9	4.410	A

09:00 - 09:15

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
A - Kew Access Road	55	346	881	0.062	55	0.1	4.359	A
B - TVSP LGV Link Road	491	43	1753	0.280	491	0.4	2.856	A
C - NHM Facility	0	535	989	0.000	0	0.0	0.000	A
D - NHM Access Road	615	134	1589	0.387	616	0.6	3.702	A

09:15 - 09:30

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
A - Kew Access Road	46	289	910	0.050	46	0.1	4.165	A
B - TVSP LGV Link Road	411	36	1758	0.234	411	0.3	2.674	A
C - NHM Facility	0	448	1039	0.000	0	0.0	0.000	A
D - NHM Access Road	515	112	1604	0.321	516	0.5	3.309	A

2040 | With Dev | PM

Data Errors and Warnings

No errors or warnings

Junction Network

Junctions

Junction	Name	Junction type	Use circulating lanes	Arm order	Junction Delay (s)	Junction LOS
1	untitled	Standard Roundabout		A, B, C, D	4.25	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	4.25	A

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D2	2040	With Dev	PM	ONE HOUR	17:00	18:30	15

Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A - Kew Access Road		✓	324	100.000
B - TVSP LGV Link Road		✓	349	100.000
C - NHM Facility		✓	63	100.000
D - NHM Access Road		✓	392	100.000

Origin-Destination Data

Demand (Veh/hr)

	To				
		A - Kew Access Road	B - TVSP LGV Link Road	C - NHM Facility	D - NHM Access Road
From	A - Kew Access Road	0	121	0	203
	B - TVSP LGV Link Road	7	0	2	340
	C - NHM Facility	0	0	0	63
	D - NHM Access Road	12	380	0	0

Vehicle Mix

Heavy Vehicle %

	To				
		A - Kew Access Road	B - TVSP LGV Link Road	C - NHM Facility	D - NHM Access Road
From	A - Kew Access Road	0	1	0	1
	B - TVSP LGV Link Road	1	0	1	1
	C - NHM Facility	0	0	0	1
	D - NHM Access Road	1	1	0	0

Results

Results Summary for whole modelled period

Arm	Max RFC	Max Delay (s)	Max Queue (Veh)	Max LOS
A - Kew Access Road	0.42	7.39	0.7	A
B - TVSP LGV Link Road	0.24	2.88	0.3	A
C - NHM Facility	0.07	4.09	0.1	A
D - NHM Access Road	0.26	2.90	0.3	A

Main Results for each time segment

17:00 - 17:15

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
A - Kew Access Road	244	285	912	0.267	242	0.4	5.364	A
B - TVSP LGV Link Road	263	152	1680	0.156	262	0.2	2.537	A
C - NHM Facility	47	412	1059	0.045	47	0.0	3.558	A
D - NHM Access Road	295	5	1675	0.176	294	0.2	2.605	A

17:15 - 17:30

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
A - Kew Access Road	291	341	883	0.330	291	0.5	6.069	A
B - TVSP LGV Link Road	314	182	1660	0.189	314	0.2	2.673	A
C - NHM Facility	57	494	1013	0.056	57	0.1	3.764	A
D - NHM Access Road	352	6	1675	0.210	352	0.3	2.721	A

17:30 - 17:45

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
A - Kew Access Road	357	418	844	0.423	356	0.7	7.365	A
B - TVSP LGV Link Road	384	223	1633	0.235	384	0.3	2.882	A
C - NHM Facility	69	605	950	0.073	69	0.1	4.089	A
D - NHM Access Road	432	8	1674	0.258	431	0.3	2.897	A

17:45 - 18:00

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
A - Kew Access Road	357	418	844	0.423	357	0.7	7.392	A
B - TVSP LGV Link Road	384	223	1632	0.235	384	0.3	2.883	A
C - NHM Facility	69	606	949	0.073	69	0.1	4.091	A
D - NHM Access Road	432	8	1674	0.258	432	0.3	2.897	A

18:00 - 18:15

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
A - Kew Access Road	291	342	883	0.330	292	0.5	6.103	A
B - TVSP LGV Link Road	314	183	1659	0.189	314	0.2	2.676	A
C - NHM Facility	57	495	1012	0.056	57	0.1	3.768	A
D - NHM Access Road	352	6	1675	0.210	353	0.3	2.725	A

18:15 - 18:30

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
A - Kew Access Road	244	286	912	0.268	244	0.4	5.397	A
B - TVSP LGV Link Road	263	153	1679	0.156	263	0.2	2.543	A
C - NHM Facility	47	415	1058	0.045	47	0.0	3.562	A
D - NHM Access Road	295	5	1675	0.176	295	0.2	2.610	A

Junctions 11				
PICADY 11 - Priority Intersection Module				
Version: 11.0.0.2177				
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Filename: 260217 TVSP LGV Link Access A Priority.j11

Path: P:\HD169 TVSP Access Roads\Deliverables\Transport\Modelling\Junction\Junction 11

Report generation date: 25/02/2026 11:06:47

»2040 | With Dev | AM

»2040 | With Dev | PM

Summary of junction performance

	AM				PM			
	Set ID	Queue (Veh)	Delay (s)	RFC	Set ID	Queue (Veh)	Delay (s)	RFC
2040 - With Dev								
Stream B-AC	D1	0.4	12.76	0.28	D2	0.3	11.08	0.25
Stream C-AB		0.1	8.19	0.11		0.1	7.32	0.10

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	TVSP LGV Link Access A Priority
Location	TVSP
Site number	HD169
Date	17/02/2026
Version	
Status	(new file)
Identifier	EH
Client	
Jobnumber	HD169 TVSP
Enumerator	ALPCE\transportuser
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	Veh	Veh	perHour	s	-Min	perMin

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	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D1	2040	With Dev	AM	ONE HOUR	08:00	09:30	15
D2	2040	With Dev	PM	ONE HOUR	17:00	18:30	15

Analysis Set Details

ID	Network flow scaling factor (%)
A1	100.000

2040 | With Dev | AM

Data Errors and Warnings

No errors or warnings

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
1	untitled	T-Junction	Two-way	Two-way	Two-way		1.47	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	1.47	A

Arms

Arms

Arm	Name	Description	Arm type
A	Link Road (E)		Major
B	Site A		Minor
C	Link Road (W)		Major

Major Arm Geometry

Arm	Width of carriageway (m)	Has kerbed central reserve	Has right-turn storage	Width for right-turn storage (m)	Visibility for right turn (m)	Blocks?	Blocking queue (PCU)
C	7.40		✓	3.00	54.6	✓	8.00

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	One lane	3.78	40	35

Slope / Intercept / Capacity

Priority Intersection Slopes and Intercepts

Stream	Intercept (Veh/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
B-A	547	0.094	0.237	0.149	0.338
B-C	696	0.100	0.253	-	-
C-B	658	0.240	0.240	-	-

The slopes and intercepts shown above include custom intercept adjustments only.

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	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D1	2040	With Dev	AM	ONE HOUR	08:00	09:30	15

Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A		✓	596	100.000
B		✓	100	100.000
C		✓	447	100.000

Origin-Destination Data

Demand (Veh/hr)

	To			
	A	B	C	
From	A	0	50	546
	B	50	0	50
	C	397	50	0

Vehicle Mix

Heavy Vehicle %

	To			
	A	B	C	
From	A	0	1	1
	B	1	0	1
	C	1	1	0

Detailed Demand Data

Demand for each time segment

Time Segment	Arm	Demand (Veh/hr)	Demand in PCU (PCU/hr)
08:00-08:15	A	449	453
	B	75	76
	C	337	340
08:15-08:30	A	536	541
	B	90	91
	C	402	406
08:30-08:45	A	656	663
	B	110	111
	C	492	497
08:45-09:00	A	656	663
	B	110	111
	C	492	497
09:00-09:15	A	536	541
	B	90	91
	C	402	406
09:15-09:30	A	449	453
	B	75	76
	C	337	340

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (Veh)	Max LOS
B-AC	0.28	12.76	0.4	B
C-AB	0.11	8.19	0.1	A
C-A				
A-B				
A-C				

Main Results for each time segment

08:00 - 08:15

Stream	Total Demand (Veh/hr)	Pedestrian demand (Ped/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
B-AC	75	0.00	463	0.163	75	0.2	9.264	A
C-AB	38	0.00	544	0.069	37	0.1	7.098	A
C-A	299	0.00			299			
A-B	38	0.00			38			
A-C	411	0.00			411			

08:15 - 08:30

Stream	Total Demand (Veh/hr)	Pedestrian demand (Ped/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
B-AC	90	0.00	433	0.207	90	0.3	10.457	B
C-AB	45	0.00	523	0.086	45	0.1	7.522	A
C-A	357	0.00			357			
A-B	45	0.00			45			
A-C	491	0.00			491			

08:30 - 08:45

Stream	Total Demand (Veh/hr)	Pedestrian demand (Ped/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
B-AC	110	0.00	392	0.281	110	0.4	12.714	B
C-AB	55	0.00	495	0.111	55	0.1	8.186	A
C-A	437	0.00			437			
A-B	55	0.00			55			
A-C	601	0.00			601			

08:45 - 09:00

Stream	Total Demand (Veh/hr)	Pedestrian demand (Ped/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
B-AC	110	0.00	392	0.281	110	0.4	12.758	B
C-AB	55	0.00	495	0.111	55	0.1	8.189	A
C-A	437	0.00			437			
A-B	55	0.00			55			
A-C	601	0.00			601			

09:00 - 09:15

Stream	Total Demand (Veh/hr)	Pedestrian demand (Ped/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
B-AC	90	0.00	433	0.207	90	0.3	10.512	B
C-AB	45	0.00	523	0.086	45	0.1	7.526	A
C-A	357	0.00			357			
A-B	45	0.00			45			
A-C	491	0.00			491			

09:15 - 09:30

Stream	Total Demand (Veh/hr)	Pedestrian demand (Ped/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
B-AC	75	0.00	462	0.163	76	0.2	9.313	A
C-AB	38	0.00	544	0.069	38	0.1	7.106	A
C-A	299	0.00			299			
A-B	38	0.00			38			
A-C	411	0.00			411			

2040 | With Dev | PM

Data Errors and Warnings

No errors or warnings

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
1	untitled	T-Junction	Two-way	Two-way	Two-way		1.41	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	1.41	A

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D2	2040	With Dev	PM	ONE HOUR	17:00	18:30	15

Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A		✓	397	100.000
B		✓	100	100.000
C		✓	551	100.000

Origin-Destination Data

Demand (Veh/hr)

	To			
	A	B	C	
From	A	0	50	347
	B	50	0	50
	C	501	50	0

Vehicle Mix

Heavy Vehicle %

	To			
	A	B	C	
From	A	0	1	1
	B	1	0	1
	C	1	1	0

Detailed Demand Data

Demand for each time segment

Time Segment	Arm	Demand (Veh/hr)	Demand in PCU (PCU/hr)
17:00-17:15	A	299	302
	B	75	76
	C	415	419
17:15-17:30	A	357	360
	B	90	91
	C	495	500
17:30-17:45	A	437	441
	B	110	111
	C	607	613
17:45-18:00	A	437	441
	B	110	111
	C	607	613
18:00-18:15	A	357	360
	B	90	91
	C	495	500
18:15-18:30	A	299	302
	B	75	76
	C	415	419

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (Veh)	Max LOS
B-AC	0.25	11.08	0.3	B
C-AB	0.10	7.32	0.1	A
C-A				
A-B				
A-C				

Main Results for each time segment

17:00 - 17:15

Stream	Total Demand (Veh/hr)	Pedestrian demand (Ped/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
B-AC	75	0.00	492	0.153	75	0.2	8.614	A
C-AB	38	0.00	580	0.065	37	0.1	6.629	A
C-A	377	0.00			377			
A-B	38	0.00			38			
A-C	261	0.00			261			

17:15 - 17:30

Stream	Total Demand (Veh/hr)	Pedestrian demand (Ped/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
B-AC	90	0.00	468	0.192	90	0.2	9.502	A
C-AB	45	0.00	566	0.079	45	0.1	6.904	A
C-A	450	0.00			450			
A-B	45	0.00			45			
A-C	312	0.00			312			

17:30 - 17:45

Stream	Total Demand (Veh/hr)	Pedestrian demand (Ped/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
B-AC	110	0.00	435	0.253	110	0.3	11.051	B
C-AB	55	0.00	547	0.101	55	0.1	7.312	A
C-A	552	0.00			552			
A-B	55	0.00			55			
A-C	382	0.00			382			

17:45 - 18:00

Stream	Total Demand (Veh/hr)	Pedestrian demand (Ped/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
B-AC	110	0.00	435	0.253	110	0.3	11.078	B
C-AB	55	0.00	547	0.101	55	0.1	7.315	A
C-A	552	0.00			552			
A-B	55	0.00			55			
A-C	382	0.00			382			

18:00 - 18:15

Stream	Total Demand (Veh/hr)	Pedestrian demand (Ped/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
B-AC	90	0.00	468	0.192	90	0.2	9.534	A
C-AB	45	0.00	566	0.079	45	0.1	6.909	A
C-A	450	0.00			450			
A-B	45	0.00			45			
A-C	312	0.00			312			

18:15 - 18:30

Stream	Total Demand (Veh/hr)	Pedestrian demand (Ped/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
B-AC	75	0.00	492	0.153	76	0.2	8.655	A
C-AB	38	0.00	580	0.065	38	0.1	6.636	A
C-A	377	0.00			377			
A-B	38	0.00			38			
A-C	261	0.00			261			

Junctions 11						
PICADY 11 - Priority Intersection Module						
Version: 11.0.0.2177						
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Filename: 260217 TVSP LGV Link Access B Priority.j11

Path: P:\HD169 TVSP Access Roads\Deliverables\Transport\Modelling\Junction\Junction 11

Report generation date: 25/02/2026 11:11:58

»2040 | With Dev | AM

»2040 | With Dev | PM

Summary of junction performance

	AM			PM		
	Queue (Veh)	Delay (s)	RFC	Queue (Veh)	Delay (s)	RFC
2040 - With Dev						
Stream B-AC	0.2	10.20	0.16	3.3	34.89	0.78
Stream C-AB	0.6	10.12	0.36	0.0	6.98	0.02

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	TVSP LGV Link Northern Priority Junction
Location	TVSP
Site number	HD169 TVSP
Date	17/02/2026
Version	
Status	(new file)
Identifier	EH
Client	
Jobnumber	HD169
Enumerator	ALPCE\transportuser
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	Veh	Veh	perHour	s	-Min	perMin

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	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D1	2040	With Dev	AM	ONE HOUR	08:00	09:30	15
D2	2040	With Dev	PM	ONE HOUR	17:00	18:30	15

Analysis Set Details

ID	Network flow scaling factor (%)
A1	100.000

2040 | With Dev | AM

Data Errors and Warnings

No errors or warnings

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
1-1	TVSP LGV Link Northern Priority	T-Junction	Two-way	Two-way	Two-way		2.19	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	2.19	A

Arms

Arms

Arm	Name	Description	Arm type
A	Link Road (W)		Major
B	Access B		Minor
C	LGV TVSP Link (E)		Major

Major Arm Geometry

Arm	Width of carriageway (m)	Has kerbed central reserve	Has right-turn storage	Width for right-turn storage (m)	Visibility for right turn (m)	Blocks?	Blocking queue (PCU)
C	7.40		✓	3.10	53.1	✓	8.00

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	One lane	3.90	39	42

Slope / Intercept / Capacity

Priority Intersection Slopes and Intercepts

Stream	Intercept (Veh/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
B-A	557	0.095	0.241	0.151	0.344
B-C	709	0.102	0.258	-	-
C-B	664	0.242	0.242	-	-

The slopes and intercepts shown above include custom intercept adjustments only.

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	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D1	2040	With Dev	AM	ONE HOUR	08:00	09:30	15

Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A		✓	377	100.000
B		✓	61	100.000
C		✓	693	100.000

Origin-Destination Data

Demand (Veh/hr)

	To			
	A	B	C	
From	A	0	266	111
	B	36	0	25
	C	510	183	0

Vehicle Mix

Heavy Vehicle %

	To			
	A	B	C	
From	A	0	1	1
	B	1	0	1
	C	1	1	0

Detailed Demand Data

Demand for each time segment

Time Segment	Arm	Demand (Veh/hr)	Demand in PCU (PCU/hr)
08:00-08:15	A	284	287
	B	46	46
	C	522	527
08:15-08:30	A	339	342
	B	55	55
	C	623	629
08:30-08:45	A	415	419
	B	67	68
	C	763	771
08:45-09:00	A	415	419
	B	67	68
	C	763	771
09:00-09:15	A	339	342
	B	55	55
	C	623	629
09:15-09:30	A	284	287
	B	46	46
	C	522	527

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (Veh)	Max LOS
B-AC	0.16	10.20	0.2	B
C-AB	0.36	10.12	0.6	B
C-A				
A-B				
A-C				

2040 | With Dev | PM

Data Errors and Warnings

No errors or warnings

Junction Network

Junctions

Junction	Name	Junction type	Arm A Direction	Arm B Direction	Arm C Direction	Use circulating lanes	Junction Delay (s)	Junction LOS
1-1	TVSP LGV Link Northern Priority	T-Junction	Two-way	Two-way	Two-way		11.18	B

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	11.18	B

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D2	2040	With Dev	PM	ONE HOUR	17:00	18:30	15

Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
A		✓	501	100.000
B		✓	324	100.000
C		✓	191	100.000

Origin-Destination Data

Demand (Veh/hr)

	To			
From		A	B	C
	A	0	11	490
	B	164	0	160
	C	183	8	0

Vehicle Mix

Heavy Vehicle %

		To		
From		A	B	C
	A	0	1	1
	B	1	0	1
	C	1	1	0

Detailed Demand Data

Demand for each time segment

Time Segment	Arm	Demand (Veh/hr)	Demand in PCU (PCU/hr)
17:00-17:15	A	377	381
	B	244	246
	C	144	145
17:15-17:30	A	450	455
	B	291	294
	C	172	173
17:30-17:45	A	552	557
	B	357	360
	C	210	212
17:45-18:00	A	552	557
	B	357	360
	C	210	212
18:00-18:15	A	450	455
	B	291	294
	C	172	173
18:15-18:30	A	377	381
	B	244	246
	C	144	145

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (Veh)	Max LOS
B-AC	0.78	34.89	3.3	D
C-AB	0.02	6.98	0.0	A
C-A				
A-B				
A-C				

Junctions 11				
ARCADY 11 - Roundabout Module				
Version: 11.0.0.2177				
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Filename: 260226 LGV Internal Roundabout.j11

Path: P:\HD169 TVSP Access Roads\Deliverables\Transport\Modelling\Junction\Junction 11

Report generation date: 25/02/2026 11:23:17

»2040 | with Dev | AM

»2040 | with Dev | PM

Summary of junction performance

	AM			PM		
	Queue (Veh)	Delay (s)	RFC	Queue (Veh)	Delay (s)	RFC
2040 - with Dev						
1 - North to M4	0.6	3.12	0.39	0.3	2.65	0.25
2 - East to Loddon	2.2	8.54	0.69	0.5	3.52	0.35
3 - untitled	0.1	2.96	0.13	0.9	4.49	0.47

There are warnings associated with one or more model runs - see the 'Data Errors and Warnings' tables for each Analysis or Demand Set.

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	TVSP LGV Link Road Southern Priority
Location	TVSP
Site number	HD169
Date	17/02/2026
Version	
Status	(new file)
Identifier	E Hine
Client	
Jobnumber	HD169
Enumerator	ALPCE\transportuser
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	Veh	Veh	perHour	s	-Min	perMin

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	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D1	2040	with Dev	AM	ONE HOUR	08:00	09:30	15
D2	2040	with Dev	PM	ONE HOUR	17:00	18:30	15

Analysis Set Details

ID	Network flow scaling factor (%)
A1	100.000

2040 | with Dev | AM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Geometry	1 - North to M4 - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.

Junction Network

Junctions

Junction	Name	Junction type	Use circulating lanes	Arm order	Junction Delay (s)	Junction LOS
1	untitled	Standard Roundabout		1, 2, 3	5.84	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	5.84	A

Arms

Arms

Arm	Name	Description	No give-way line
1	North to M4		
2	East to Loddon		
3	untitled		

Roundabout Geometry

Arm	V - Approach road half-width (m)	E - Entry width (m)	I' - Effective flare length (m)	R - Entry radius (m)	D - Inscribed circle diameter (m)	PHI - Conflict (entry) angle (deg)	Entry only	Exit only
1 - North to M4	3.70	7.30	34.4	15.0	50.0	27.0		
2 - East to Loddon	3.70	8.00	8.8	30.0	50.0	32.0		
3 - untitled	3.70	7.90	17.4	17.0	50.0	34.0		

Slope / Intercept / Capacity

Roundabout Slope and Intercept used in model

Arm	Final slope	Final intercept (PCU/hr)
1 - North to M4	0.650	1927
2 - East to Loddon	0.601	1645
3 - untitled	0.621	1798

The slope and intercept shown above include any corrections and adjustments.

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D1	2040	with Dev	AM	ONE HOUR	08:00	09:30	15

Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
1 - North to M4		✓	675	100.000
2 - East to Loddon		✓	852	100.000
3 - untitled		✓	160	100.000

Origin-Destination Data

Demand (Veh/hr)

	To			
		1 - North to M4	2 - East to Loddon	3 - untitled
From	1 - North to M4	0	268	407
	2 - East to Loddon	568	0	284
	3 - untitled	145	15	0

Vehicle Mix

Heavy Vehicle %

	To			
		1 - North to M4	2 - East to Loddon	3 - untitled
From	1 - North to M4	0	1	1
	2 - East to Loddon	1	0	1
	3 - untitled	1	1	0

Results

Results Summary for whole modelled period

Arm	Max RFC	Max Delay (s)	Max Queue (Veh)	Max LOS
1 - North to M4	0.39	3.12	0.6	A
2 - East to Loddon	0.69	8.54	2.2	A
3 - untitled	0.13	2.96	0.1	A

Main Results for each time segment

08:00 - 08:15

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
1 - North to M4	508	11	1900	0.267	507	0.4	2.581	A
2 - East to Loddon	641	306	1445	0.444	638	0.8	4.447	A
3 - untitled	120	426	1516	0.079	120	0.1	2.579	A

08:15 - 08:30

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
1 - North to M4	607	13	1899	0.320	606	0.5	2.785	A
2 - East to Loddon	766	366	1409	0.544	764	1.2	5.574	A
3 - untitled	144	510	1464	0.098	144	0.1	2.727	A

08:30 - 08:45

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
1 - North to M4	743	17	1897	0.392	742	0.6	3.116	A
2 - East to Loddon	938	448	1359	0.690	934	2.2	8.388	A
3 - untitled	176	623	1393	0.126	176	0.1	2.956	A

08:45 - 09:00

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
1 - North to M4	743	17	1897	0.392	743	0.6	3.119	A
2 - East to Loddon	938	448	1359	0.690	938	2.2	8.541	A
3 - untitled	176	625	1392	0.127	176	0.1	2.960	A

09:00 - 09:15

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
1 - North to M4	607	13	1899	0.320	607	0.5	2.790	A
2 - East to Loddon	766	366	1408	0.544	770	1.2	5.675	A
3 - untitled	144	513	1461	0.098	144	0.1	2.734	A

09:15 - 09:30

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
1 - North to M4	508	11	1900	0.267	509	0.4	2.588	A
2 - East to Loddon	641	307	1444	0.444	643	0.8	4.502	A
3 - untitled	120	429	1514	0.080	121	0.1	2.583	A

2040 | with Dev | PM

Data Errors and Warnings

Severity	Area	Item	Description
Warning	Geometry	1 - North to M4 - Roundabout Geometry	Effective flare length is over 30m, which is outside the normal range. Treat capacities with increasing caution.

Junction Network

Junctions

Junction	Name	Junction type	Use circulating lanes	Arm order	Junction Delay (s)	Junction LOS
1	untitled	Standard Roundabout		1, 2, 3	3.69	A

Junction Network

Driving side	Lighting	Network delay (s)	Network LOS
Left	Normal/unknown	3.69	A

Traffic Demand

Demand Set Details

ID	Year	Scenario	Time period	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
D2	2040	with Dev	PM	ONE HOUR	17:00	18:30	15

Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (Veh/hr)	Scaling Factor (%)
1 - North to M4		✓	406	100.000
2 - East to Loddon		✓	510	100.000
3 - untitled		✓	650	100.000

Origin-Destination Data

Demand (Veh/hr)

	To			
		1 - North to M4	2 - East to Loddon	3 - untitled
From	1 - North to M4	0	341	65
	2 - East to Loddon	384	0	126
	3 - untitled	506	144	0

Vehicle Mix

Heavy Vehicle %

	To			
		1 - North to M4	2 - East to Loddon	3 - untitled
From	1 - North to M4	0	1	1
	2 - East to Loddon	1	0	1
	3 - untitled	1	1	0

Results

Results Summary for whole modelled period

Arm	Max RFC	Max Delay (s)	Max Queue (Veh)	Max LOS
1 - North to M4	0.25	2.65	0.3	A
2 - East to Loddon	0.35	3.52	0.5	A
3 - untitled	0.47	4.49	0.9	A

Main Results for each time segment

17:00 - 17:15

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
1 - North to M4	306	108	1838	0.166	305	0.2	2.347	A
2 - East to Loddon	384	49	1599	0.240	383	0.3	2.957	A
3 - untitled	489	288	1601	0.306	488	0.4	3.223	A

17:15 - 17:30

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
1 - North to M4	365	129	1824	0.200	365	0.2	2.467	A
2 - East to Loddon	458	58	1593	0.288	458	0.4	3.171	A
3 - untitled	584	345	1566	0.373	584	0.6	3.664	A

17:30 - 17:45

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
1 - North to M4	447	158	1805	0.248	447	0.3	2.650	A
2 - East to Loddon	562	72	1585	0.354	561	0.5	3.512	A
3 - untitled	716	422	1518	0.472	714	0.9	4.475	A

17:45 - 18:00

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
1 - North to M4	447	159	1805	0.248	447	0.3	2.650	A
2 - East to Loddon	562	72	1585	0.354	562	0.5	3.515	A
3 - untitled	716	423	1518	0.472	716	0.9	4.489	A

18:00 - 18:15

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
1 - North to M4	365	130	1823	0.200	365	0.3	2.468	A
2 - East to Loddon	458	58	1593	0.288	459	0.4	3.175	A
3 - untitled	584	346	1565	0.373	585	0.6	3.677	A

18:15 - 18:30

Arm	Total Demand (Veh/hr)	Circulating flow (Veh/hr)	Capacity (Veh/hr)	RFC	Throughput (Veh/hr)	End queue (Veh)	Delay (s)	Unsignalised level of service
1 - North to M4	306	109	1837	0.166	306	0.2	2.352	A
2 - East to Loddon	384	49	1599	0.240	384	0.3	2.964	A
3 - untitled	489	289	1600	0.306	490	0.4	3.245	A



Transport Planning | Flood & Water Management | Civil Engineering

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