

Pell Frischmann

Bloch Wind Farm

Technical Appendix 10.2: Route Survey Report

October 2022

106193

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## 1 Introduction

### 1.1 Purpose of the Report

Pell Frischmann (PF) has been commissioned by RES (the applicant) to undertake a survey of the Abnormal Indivisible Load (AIL) delivery route for wind turbine loads associated with the construction and development of Bloch Wind Farm, located to the north-west of Canonbie.

The Route Survey Report (RSR) has been prepared to help inform the applicant on the likely issues associated with the development of the site with regards to off-site transport and access for AIL traffic. This RSR identifies the key issues associated with AIL deliveries and notes that remedial works, either in the form of physical works or as traffic management interventions will be required to accommodate the predicted loads.

The detailed assessment and subsequent designs of any remedial works are beyond the agreed scope of works between PF and the applicant at this point in time.

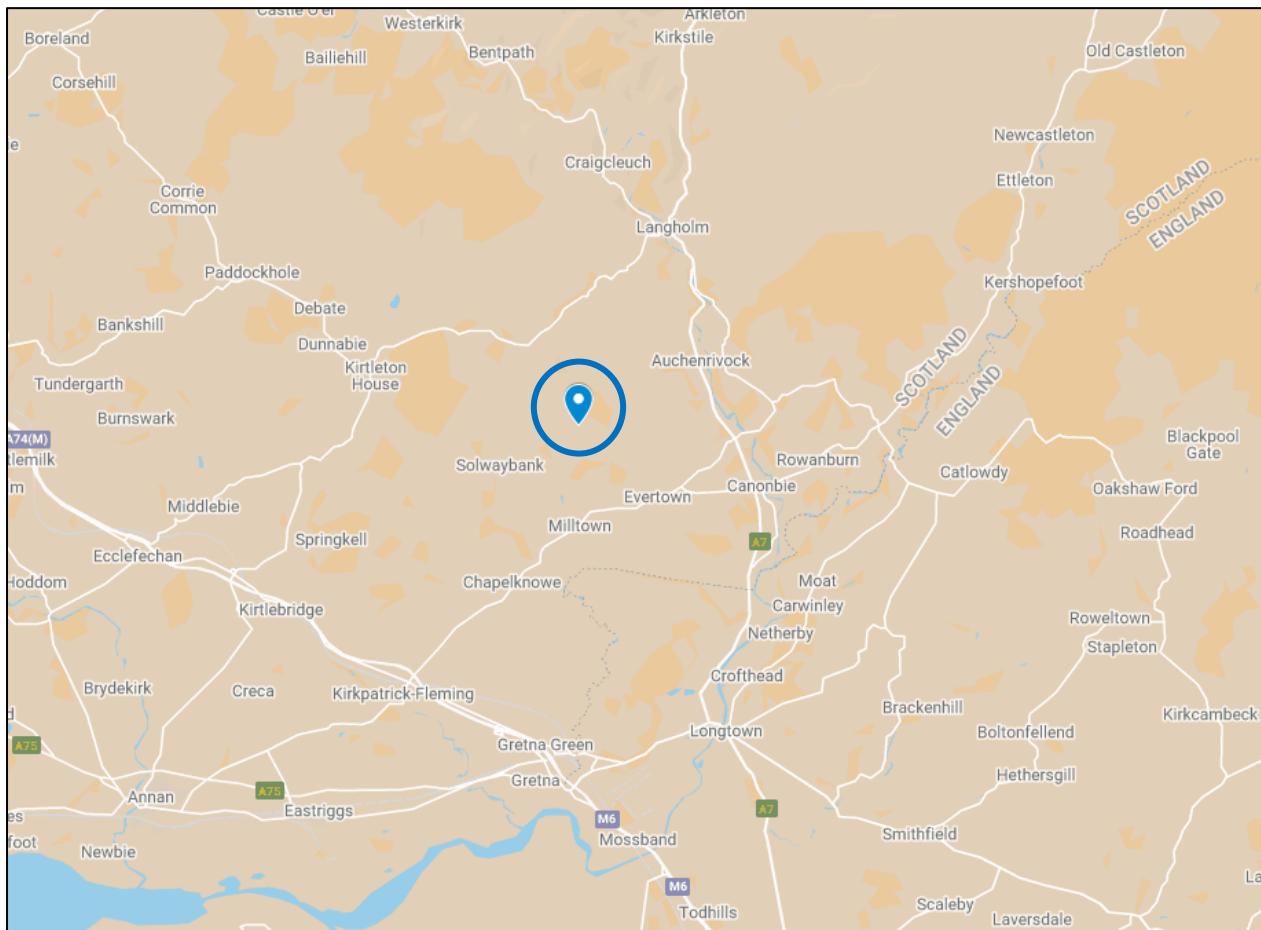
It is the responsibility of the the applicant to ensure that the entirety of the proposed access route is suitable and meets with their satisfaction. The applicant will be responsible for ensuring that the finalised proposals meet with the appropriate levels of health and safety consideration for all road users is in line with the relevant legislation at the time of delivery.

## 2 Site Background

### 2.1 Site Location

The site of the proposed development is located to the north-west of Canonbie. Figure 1 illustrates the general site location.

**Figure 1: Site Location Plan**



### 2.2 Candidate Turbine

The applicant has indicated that they wish to consider the worst case components from an V150 turbine at a tip height of 230m for use at the site and this has been used for this preliminary assessment.

The details of the components have been provided by Vestas and are detailed in Table 1 below.

**Table 1: Turbine Size Summary**

Component	Length (m)	Width (m)	Height / Min Diameter (m)	Weight (t)
V150 Blade	74.303	4.425	4.068	23.950
Worst Case Tower Section	29.960	4.676	4.170	73.000
Nacelle	18.279	4.180	4.351	70.001
Drive Train	7.475	2.884	3.296	96.700
Hub	4.138	3.607	3.504	34.956

## 2.3 Proposed Delivery Equipment

To provide a robust assessment scenario based upon the known issues along the access route, it has been assumed that all blades would be carried on a Superwing Carrier trailer to reduce the need for mitigation in constrained sections of the route.

The base and mid towers would be carried on a 4+7 clamp trailer. The hub, nacelle housing, and top towers would be carried on a six-axle step frame trailer. The worst case loads for these sections will be considered in a further study.

**Figure 2: Superwing Carrier Trailer**



**Figure 3: Tower Trailer**



### 3 Access Route Review

#### 3.1 Port of Entry

The nearest feasible and economical Port of Entry (PoE) for the site is King George V (KGV) Docks in Glasgow. The port has been used by renewables deliveries in the past for a number of wind farms, including Kype Muir, Kilgallioch, and Clyde Wind Farms.

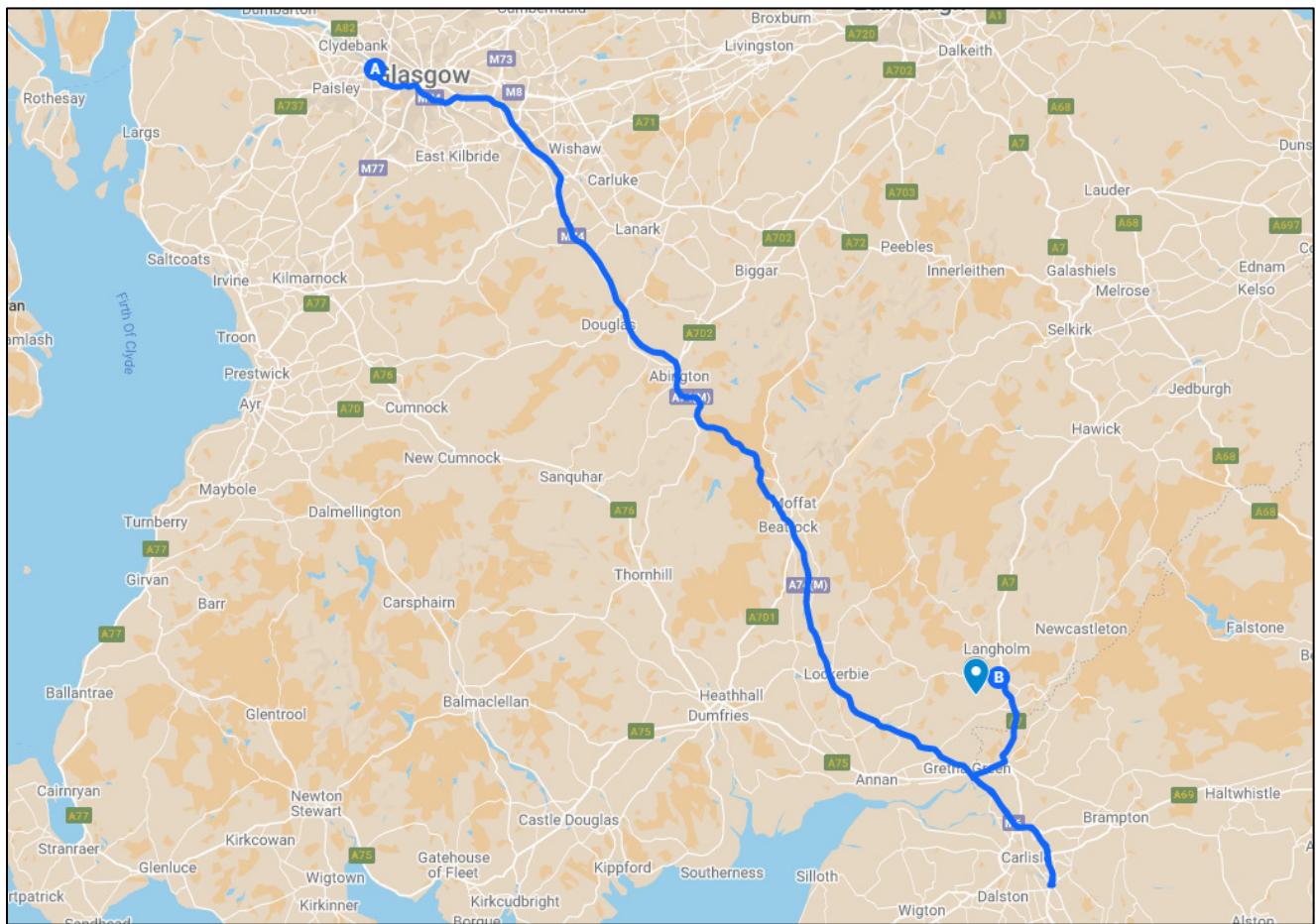
The port has sufficient quay and storage space and is well located for the strategic trunk road network.

#### 3.2 Proposed Access Route

The proposed access route is as follows:

- Components exit KGV Docks in Glasgow onto Kings Inch Drive;
- Continue along Kings Inch Drive before turning left onto the M8 slip road at Junction 25a;
- Continue east on the M8 to Junction 21 where they would join the M74 travelling south;
- Loads would travel south on the M74 and M6, before utilising the Golden Fleece Roundabout to turn around and travel north on the M6 and onto the M74 northbound;
- Loads would depart the M74 at Junction 45;
- Loads would turn right at the off-slip junction and continue east on the A6071;
- Loads would turn left onto the A7 and continue northbound;
- Loads would turn right onto Auchentivock Road and would travel north before turning left onto the U251A and passing under the A7; and
- Loads would then use the Old Irvine – Kerr Track to travel west, before turning right onto the C70A.

The proposed access route is illustrated in Figure 4.

**Figure 4: Proposed Access Route**

### 3.3 Route Constraints

The constraints noted on the route are detailed in Table 2. These cover all constraints from the port access gate through to the proposed site entrances with the end of the public road network. No consideration of the transport issues within the site has been undertaken as these will be the responsibility of the applicant as part of the site design process.

Plans illustrating the location of the constraints are provided in Appendix A.

**Table 2: Constraint Points and Details**

<b>POI</b>	<b>Constraint</b>	<b>Details</b>
<b>1</b>	<b>Port Exit - Kings Inch Drive Roundabout 1</b> 	<p>Loads will exit the port and take the second exit, proceeding west on King's Inch Drive.</p> <p>A swept path assessment has been undertaken and indicates that loads will overrun and oversail the central island, where they will utilise the existing overrun area.</p> <p>Loads will also oversail the splitter island upon exiting the roundabout, where two lit road signs should be removed.</p> <p>Swept path drawing SK01 is included in Appendix B.</p>
<b>2</b>	<b>Kings Inch Drive Roundabout 2</b> 	<p>Loads will take the second exit at the roundabout and proceed west.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail both sides of the carriageway on approach to the roundabout, as well as the central island of the roundabout, though no physical mitigation will be required. Clearances to a lighting column on the southern verge is constrained.</p> <p>Swept path drawing SK02 is included in Appendix B.</p>
<b>3</b>	<b>Kings Inch Drive Roundabout 3</b> 	<p>Loads will take the first exit at the roundabout before turning left at the following junction.</p> <p>A swept path assessment has been undertaken and indicates that no physical mitigation measures will be required.</p> <p>Swept path drawing SK03 is included in Appendix B.</p>

POI	Constraint	Details
4	<b>Kings Inch Drive / Mayo Avenue Junction</b> 	<p>Loads will turn left at the junction and proceed south.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail the central reservation on approach to the junction, where oncoming traffic should be held during movements.</p> <p>Loads will also oversail the south eastern verge of the carriageway, where one pedestrian call post should be lowered. A land search should be carried out at this location to confirm the extent of adopted boundary.</p> <p>Loads will oversail the central island at the north western verge, where three hinged signal columns should be laid down.</p> <p>Swept path drawing SK04 is included in Appendix B.</p>
5	<b>Merge onto the M8</b> 	<p>Loads will travel through the left hand bend, before joining onto the M8.</p> <p>A swept path assessment has been undertaken and indicates that loads will not overrun or oversail the verges at this location.</p> <p>Swept path drawing SK05 is included in Appendix B.</p> <p>Loads will continue ahead and will join the M74 southbound. The M74 transitions into the M6 and loads will continue southbound until M6 Junction 42.</p>

POI	Constraint	Details
27	<b>M6 - Golden Fleece Roundabout</b> 	<p>Loads will depart the M6 and perform a U Turn on the roundabout, departing on the northern slip road. This is the junction required by the Police to undertake such manoeuvres.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail both verges of the carriageway on approach to the roundabout, where one road sign, one lit road sign and one lighting column should be removed.</p> <p>Loads will oversail the inside verges of the junction where vegetation should be trimmed at multiple locations.</p> <p>Loads will overrun and oversail the south-eastern, south-western and north-western verges of the inner verges where load bearing surfaces should be laid. Four sets of lit chevron sign should be removed.</p> <p>Loads will also oversail the western verge of the off-slip, where one road sign should be removed.</p> <p>Swept path drawing SK23 is included in Appendix B.</p>
28	<b>M6 Junction 45 - Northbound Off-slip</b> 	<p>Loads will exit the M6 and will turn right at the junction.</p> <p>A swept path assessment has been undertaken and indicates that loads will overrun and oversail the southern verge of the carriageway, where a load bearing surface should be laid. Two lighting columns and two lit road signs should be removed.</p> <p>Loads will also overrun and oversail the inside of the junction, where a load bearing surface should be laid. Two lit road signs should also be removed. They will then overrun the western verge of the overpass, where a load bearing surface should be laid.</p> <p>Swept path drawing SK24 is included in Appendix B.</p>

POI	Constraint	Details
29, 30,	<b>A6071 - Caldron Ditch</b> 	<p>Loads will travel through the bends and continue north on the A6071.</p> <p>A swept path assessment has been undertaken and indicates that loads will require access to both lanes of the road. No physical mitigation measures are however required.</p> <p>Swept path drawing SK25 is included in Appendix B.</p>
31	<b>A6071 – Gaitle</b> 	<p>Loads will continue to travel east.</p> <p>Loads will occupy both lanes of the carriageway at this location. Escort vehicles should ensure traffic is held during movement.</p> <p>The vertical profile of the road 150m east of this location is pronounced and should be reviewed during the test run stage to ascertain if tar wedges will be required to prevent grounding.</p>
32	<b>A6071/A7 Junction</b> 	<p>Loads will turn left and travel north on the A7.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail and over-run the southern verge where a load bearing surface will be provided. Earthworks will be required at the pond and fencing, two road signs, gates, one utility pole and two underground service markers will need to be removed. Underground services will need protection.</p> <p>Loads will oversail the splitter island where one column and one bollard should be removed. They will also oversail both verges of the A7 however no physical works are required.</p> <p>Swept path drawing SK26 is included in Appendix B.</p>

POI	Constraint	Details
33	<b>A7 - Dickstree Cottage</b> 	<p>Loads will travel through the right hand bend at this location.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail the eastern verge of the carriageway, through no physical mitigation measures are required.</p> <p>Swept path drawing SK27 is included in Appendix B.</p>
34, 35	<b>A7 – West of Netherby</b>  	<p>Loads will continue to travel north on the A7.</p> <p>Loads will occupy both lanes of the carriageway at this location. Escort vehicles should ensure that oncoming traffic is held during movement.</p>
36	<b>A7 - Scotland/England Border</b> 	<p>Loads will travel through the right hand bend at this location.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail the eastern verge of the carriageway, however no physical mitigation is required.</p> <p>Swept path drawing SK28 is included in Appendix B.</p>
37	<b>A7 - Scotland/England Border</b> 	<p>Loads will continue to travel north, where they will occupy both lanes of the carriageway at this location. Escort vehicles should ensure traffic is held during movement.</p>

POI	Constraint	Details
38	<b>A7 / Auchenrivock Road Junction</b> 	<p>Loads will turn right at the junction and continue north on the unclassified road.</p> <p>A swept path assessment has been undertaken and indicates that loads will overrun and oversail the splitter island the norther verge of the junction, where load bearing surfaces should be laid. One bollard and one road sign should be removed from the splitter island. Vegetation should also be trimmed.</p> <p>Swept path drawing SK29 is included in Appendix B.</p>
39	<b>Auchenrivock Road - West of River Esk</b> 	<p>Loads will travel through the bends at this location. The condition of the road from the A7 junction onwards was exceptionally poor and will require to be improved prior to loads using the road.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail the western verge of the carriageway, where the proximity to the embankment should be confirmed on a topographical survey of the area.</p> <p>Loads will also oversail the eastern verge of the carriageway, where overhanging trees should be trimmed.</p> <p>Swept path drawing SK30 is included in Appendix B.</p>
40	<b>Auchenrivock Road - South of Irvine Burn</b> 	<p>Loads will travel through the left hand bend and continue north.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail the western verge of the carriageway, where the proximity to the embankment should be confirmed on a topographical survey of the area.</p> <p>Swept path drawing SK31 is included in Appendix B.</p>

POI	Constraint	Details
41, 42	<b>Auchenrivock Road - North of Irvine Burn</b>  	<p>Loads will travel through the bends at this location.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail both verges of the carriageway and boundary walls. Trees and verge vegetation should be trimmed / removed.</p> <p>Swept path drawing SK32 is included in Appendix B.</p>
43	<b>Auchenrivock Road - South of Docken Beck</b> 	<p>Loads will turn left at the junction and proceed northwest.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail the eastern verge of the carriageway on approach to the junction, where trees and vegetation should be trimmed.</p> <p>Loads will also overrun and oversail the inside verge of the junction, where a load bearing surface should be laid. A section of a stone wall and a gate should also be removed.</p> <p>From this point onwards, the road should be widened to a minimum of 4.5m and ensure that a minimum of 5.5m wide clearance to be provided for oversail areas.</p> <p>Swept path drawing SK33 is included in Appendix B.</p>

POI	Constraint	Details
44, 45	<p><b>U251A Road</b></p> 	<p>Loads will turn left at this bend and continue to the site access.</p> <p>A swept path assessment has been undertaken and indicates that loads will overrun and oversail the southern verge of the turn, where a load bearing surface should be laid. A section of fencing, one utility post and vegetation should also be removed.</p> <p>A topographical survey of the vertical profile is required to consider clearances through the bridges for all loads.</p> <p>Swept path drawing SK34 is included in Appendix B.</p>
46	<p><b>U251A – End of Public Road</b></p> 	<p>The road will need to be widened to minimum Vestas standards (4.5m) and utility poles will need to be relocated to allow loads to oversail the verges.</p> <p>It is likely that the road will need to be reconstructed to accommodate the proposed axle loads.</p> <p>Proximity to utility posts should be checked to confirm whether their relocation is necessary.</p> <p>Tree canopies along the road would need to be trimmed to allow for a 5.5m height clearance.</p> <p>From this location, the existing private access tracks would be upgraded to allow access to the wind farm site.</p> <p>Swept path drawing SK35 is included in Appendix B.</p>
47	<p><b>Old Irvine – Kerr Track Bend 1</b></p> 	<p>Loads will travel through the right-hand bend.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail the northern verge of the road, where all street furniture and vegetation should be removed.</p> <p>Loads will also overrun and oversail the southern verge of the bend, where a load bearing surface should be laid. All street furniture, gates and fencing should be removed. Trees and vegetation to be cleared.</p> <p>Swept path drawing SK36 is included in Appendix B.</p>

POI	Constraint	Details
48	<b>Old Irvine – Kerr Track Bend 2</b> 	<p>Loads will turn left at the junction and continue westbound.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail the eastern verge of the road, where all street furniture and vegetation should be removed.</p> <p>Loads will also overrun and oversail the southern verge of the road, where a load bearing surface should be laid. All street furniture, gates and fencing should be removed. Trees and vegetation to be cleared.</p> <p>Proximity to water course should be confirmed to determine appropriate mitigation. A topographical survey is required at this location.</p> <p>From this point onwards, the road should be widened to a minimum of 4.5m and ensure that a minimum of 5.5m wide clearance to be provided for oversail areas.</p> <p>Swept path drawing SK37 is included in Appendix B.</p>
49	<b>Old Irvine – Kerr Track</b> 	<p>Loads will continue southbound.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail both verges of the road.</p> <p>All street furniture, vegetation and fencing should be removed.</p> <p>Swept path drawing SK38 is included in Appendix B.</p>

POI	Constraint	Details
<b>50</b>	<b>C70A / Old Irvine – Kerr Track Junction</b> 	<p>Loads will turn right at the junction and continue northbound.</p> <p>A swept path assessment has been undertaken and indicates that loads will overrun and oversail the northern verge of the junction, where a load bearing surface should be laid. Section of fencing and one utility column should be removed. Vegetation to be trimmed.</p> <p>A services consultation should be undertaken at this location to determine the exact location of Scottish Water underground infrastructure and if they require any further protection measures at this location.</p> <p>From this point onwards, the road should be widened to a minimum of 4.5m and ensure that a minimum of 5.5m wide clearance to be provided for oversail areas.</p> <p>Swept path drawing SK39 is included in Appendix B.</p>
<b>51</b>	<b>C70A Bend</b> 	<p>Loads will travel northbound.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail the northern verge, where trees and vegetation should be removed.</p> <p>Swept path drawing SK40 is included in Appendix B.</p>
<b>52</b>	<b>C70A Bend 2</b> 	<p>Loads will travel through the bend and continue northbound.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail both verges of the road, where trees and vegetation should be removed.</p> <p>Swept path drawing SK41 is included in Appendix B.</p>

POI	Constraint	Details
53	<b>C70A near Site Accesses</b> 	<p>Loads will travel through the right-hand bend and arrive at the site access.</p> <p>A swept path assessment has been undertaken and indicates that loads will oversail the north-eastern verge on approach to the bend, where one road sign and cattle grid gate should be removed. Trees and vegetation should also be trimmed.</p> <p>Loads will also oversail both verges through the bend, where the gates and fencing should be removed. <b>Third party lands</b> will be required.</p> <p>Swept path drawing SK42 is included in Appendix B.</p>

### 3.4 Swept Path Assessment Results and Summary

The detailed swept path drawings for the locations assessed are provided in Appendix B for review. The drawings in Appendix B illustrate tracking undertaken for the worst case loads at each location.

The colours illustrated on the swept paths are:

- Grey / Black – OS / Topographical Base Mapping;
- Green – Vehicle body outline (body swept path);
- Red – Tracked pathway of the wheels (wheel swept path); and
- Purple – The over-sail tracked path of the load where it encroaches outwith the trailer (load swept path).

Where mitigation works are required, the extents of over-run and over-sail areas are illustrated on the swept path drawings.

Please note that where assessments have been undertaken using Ordnance Survey (OS) base mapping, there can be errors in this data source. Please note that PF cannot accept liability for errors on the data source, be that OS base mapping or client supplied data.

### 3.5 Weight Review

A weight review has been undertaken via the ESDAL (Electronic Service Delivery for Abnormal Loads) contacts database using the Highways Agency website [www.esdal.com](http://www.esdal.com). All of the relevant ESDAL contacts are noted in Table 3 and all have been contacted to ascertain if there are any relevant constraints that should be noted. Copies of the responses received to date are detailed in Appendix C.

**Table 3 - ESDAL Contacts**

Organisation	Email Address
Renfrewshire Council	<a href="mailto:ei@renfrewshire.gov.uk">ei@renfrewshire.gov.uk</a>
Dumfries and Galloway Council	<a href="mailto:esdal@dumgal.gov.uk">esdal@dumgal.gov.uk</a>
Amey (South West Scotland)	<a href="mailto:SWAbeloads@amey.co.uk">SWAbeloads@amey.co.uk</a>
Police Scotland	<a href="mailto:OSDAbnormalLoadsScotland@scotland.pnn.police.uk">OSDAbnormalLoadsScotland@scotland.pnn.police.uk</a>
Cumbria Constabulary	<a href="mailto:AbnormalLoads@cumbria.pnn.police.uk">AbnormalLoads@cumbria.pnn.police.uk</a>
Network Rail	<a href="mailto:AbLoadsESDAL@networkrail.co.uk">AbLoadsESDAL@networkrail.co.uk</a>

Organisation	Email Address
Transport Scotland	<a href="mailto:AbnormalLoads@transport.gov.scot">AbnormalLoads@transport.gov.scot</a>
Scotland Transerv	<a href="mailto:abnormalloadrouting@scotlandtranserv.co.uk">abnormalloadrouting@scotlandtranserv.co.uk</a>
M8 DBFO	<a href="mailto:m8dbfo.abloads@amey.co.uk">m8dbfo.abloads@amey.co.uk</a>
Autolink M6 ROM	<a href="mailto:abnormal.loads@m6dbfo.co.uk">abnormal.loads@m6dbfo.co.uk</a>
National Highways North West Region	<a href="mailto:nwabnormalloadsenquiries@nationalhighways.co.uk">nwabnormalloadsenquiries@nationalhighways.co.uk</a>
Connect Roads Balfour Beatty	<a href="mailto:CNDRAbnormalLoads@Balfourbeatty.com">CNDRAbnormalLoads@Balfourbeatty.com</a>
Bear (South East Scotland)	<a href="mailto:seabnormalload@bearscotland.co.uk">seabnormalload@bearscotland.co.uk</a>

### 3.6 Land Ownership

The limits of road adoption can vary depending upon the location of the site and the history of the road agencies involved. The adopted area is generally defined as land contained within a defined boundary where the road agency holds the maintenance rights for the land. In urban areas, this usually defined as the area from the edge of the footway across the road to the opposing footway back edge.

In rural areas the area of adoption can be open to greater interpretation as defined boundaries may not be readily visible. The general rule is that the area of adoption is between established fence / hedges lines or a maximum 2m from the road edge. This can vary between areas and location.

### 3.7 Alternative A7 Access Option

Discussions with TS have been held to ascertain if a direct AIL only access (inbound only) onto the A7 can be provided. Discussions are at an early stage at present and, should this proposal proceed, the new arrangement would be included in a revised Route Survey Report that would be provided to both TS and DGC once the candidate turbine has been confirmed, post planning determination. The requirement for the updated Route Survey Report is a reasonably standard planning condition and the applicant would welcome a suitable condition on this matter.

### 3.8 Summary Issues

It is strongly suggested that following a review of the RSR, the applicant should undertake the following prior to the delivery of the first abnormal loads, to ensure load and road user safety:

- That any necessary topographical surveys are undertaken and the swept path results completed;
- A review of axle loading on structures along the entire access route with the various road agencies is undertaken immediately prior to the loads being transported in case of last minute changes to structures;
- A review of clear heights with utility providers and the transport agencies along the route to ensure that there is sufficient space to allow for loads plus sufficient flashover protection (to electrical installations);
- That any verge vegetation and tree canopies which may foul loads is trimmed prior to loads moving;
- That a review of potential roadworks and or closures is undertaken once the delivery schedule is established in draft form;
- That a test run is completed to confirm the route and review any vertical clearance issues; and
- That a condition survey is undertaken to ascertain the extents of road defects prior to loads commencing to protect the developer from spurious damage claims.

## 4 Summary

### 4.1 Summary of Access Review

PF has been commissioned by the applicant to prepare a RSR to examine the issues associated with the transport of AIL turbine components to the site.

The report is presented for consideration to the applicant. Various road modifications, structural reviews and interventions are required to successfully access the site. If these are undertaken, access to the consented wind farm site is considered feasible.

### 4.2 Further Actions

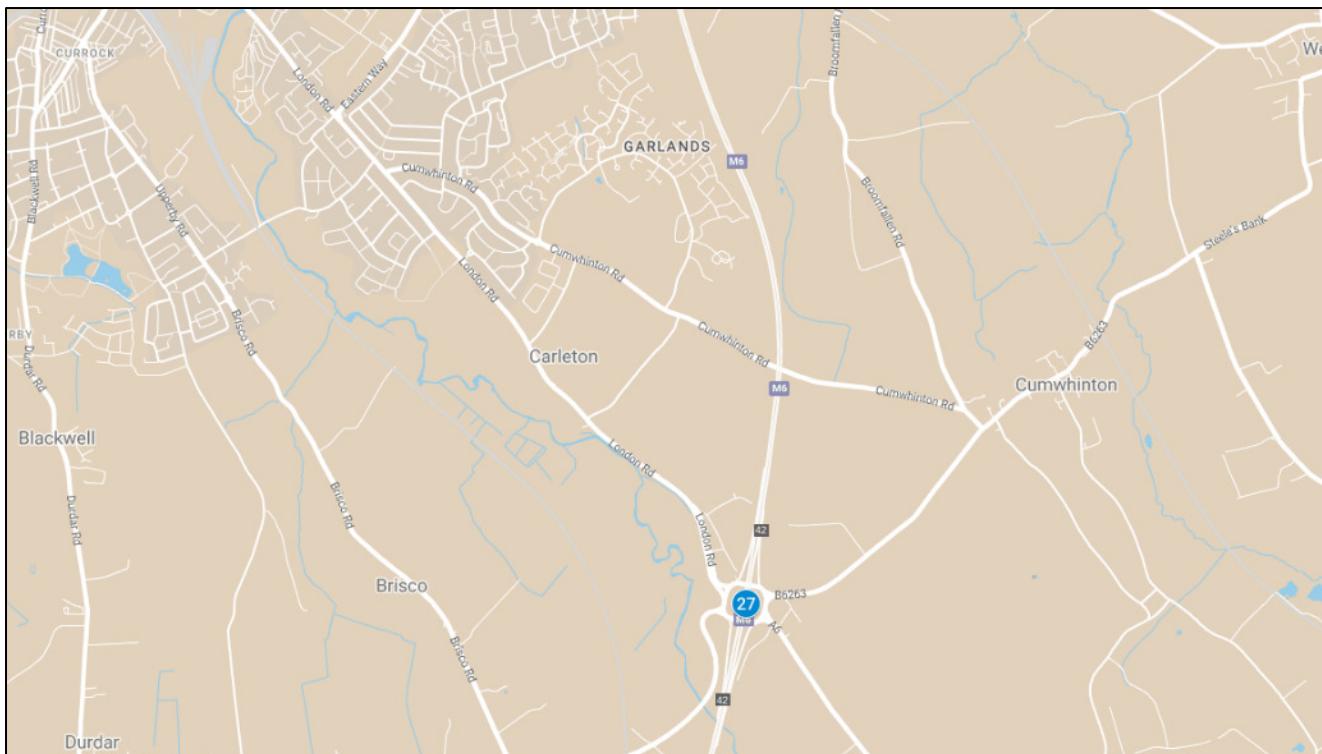
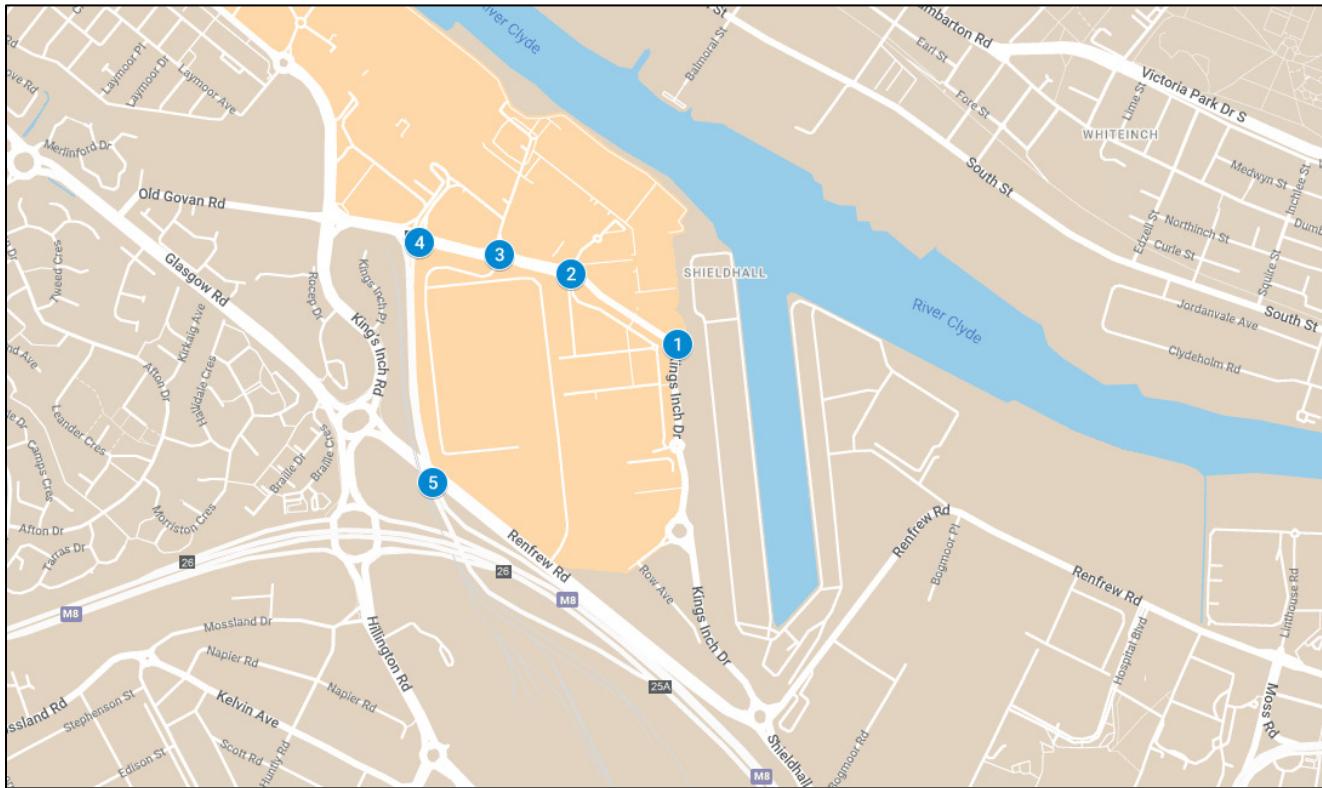
The following actions are recommended to pursue the transport and access issues further:

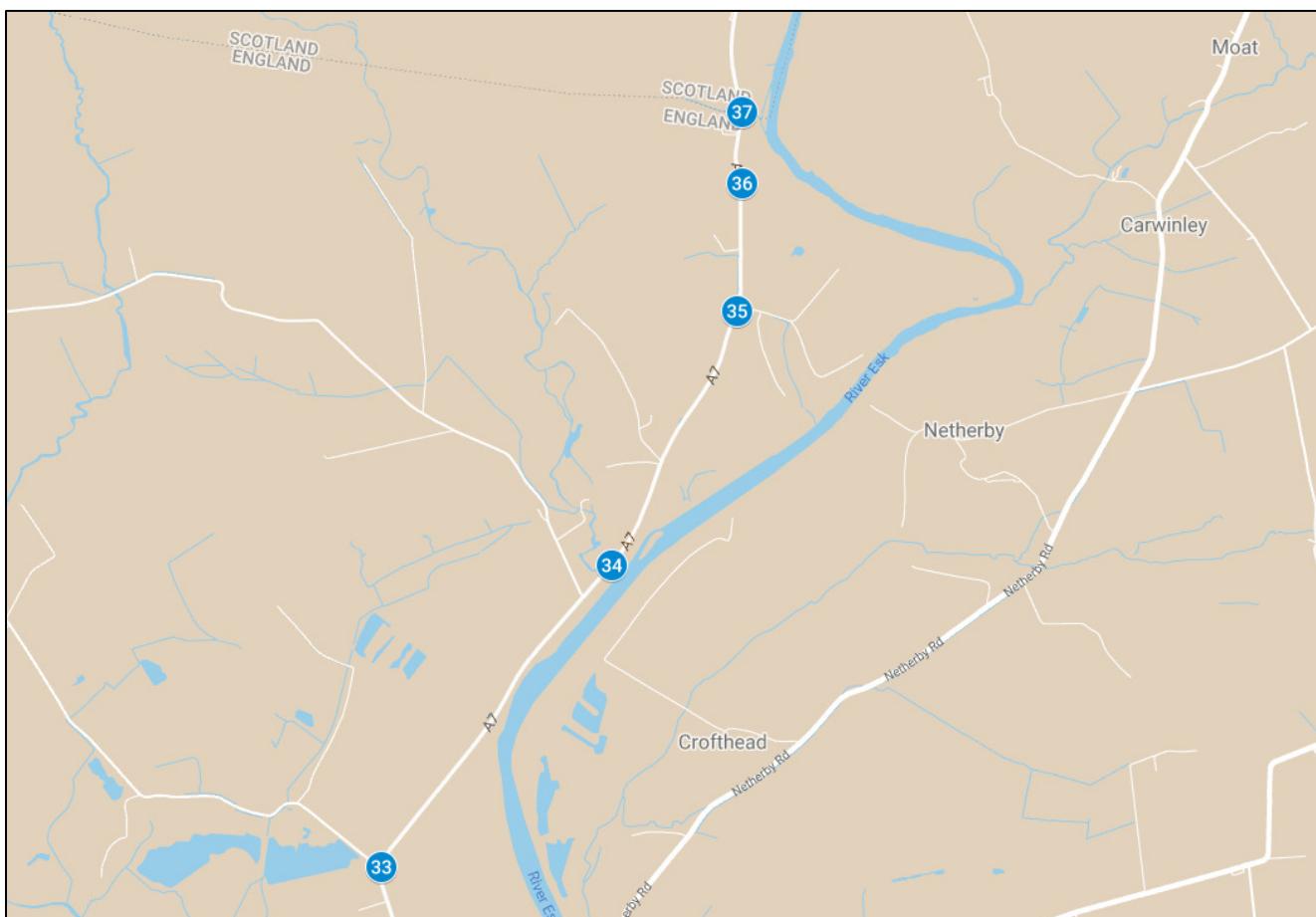
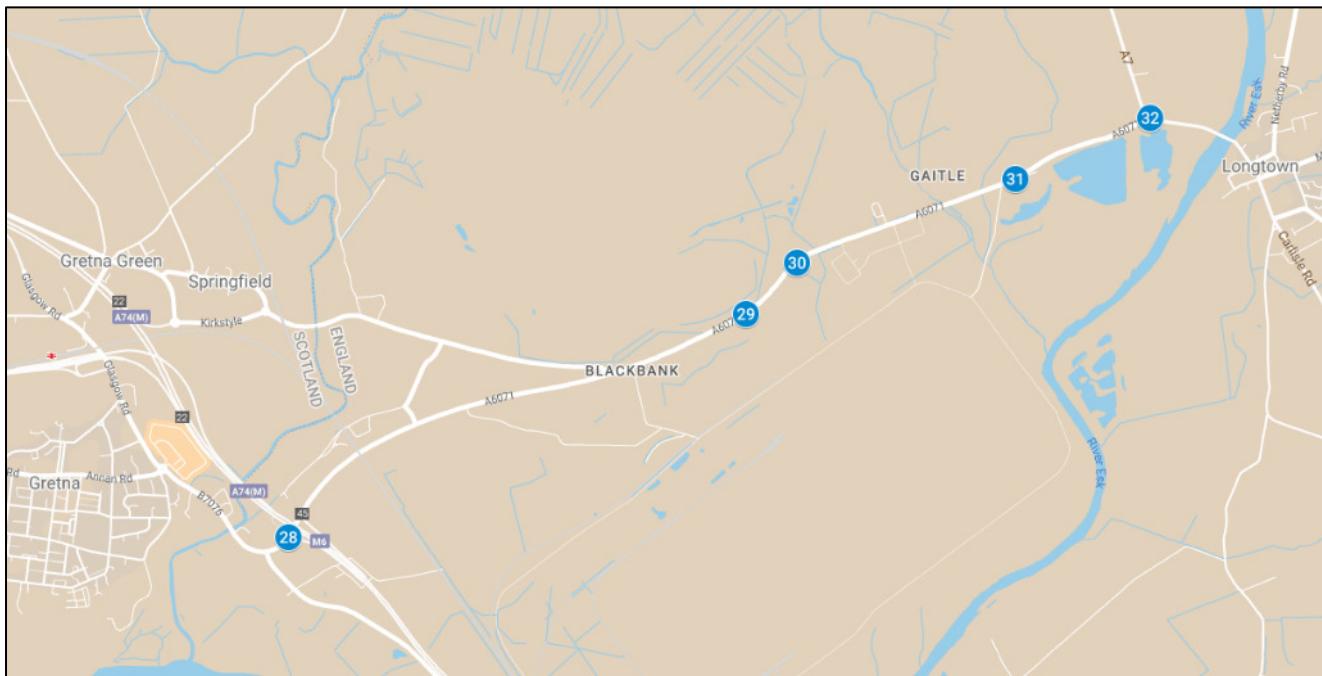
- Prepare detailed mitigation design proposals to help inform the land option / consultee discussions;
- Obtain the necessary land options;
- Undertake discussion with the affected utility providers and roads agencies;
- Obtain the necessary statutory licences to enable the mitigation measures; and
- Develop a detailed operational Transport Management Plan to assist in transporting the proposed loads.

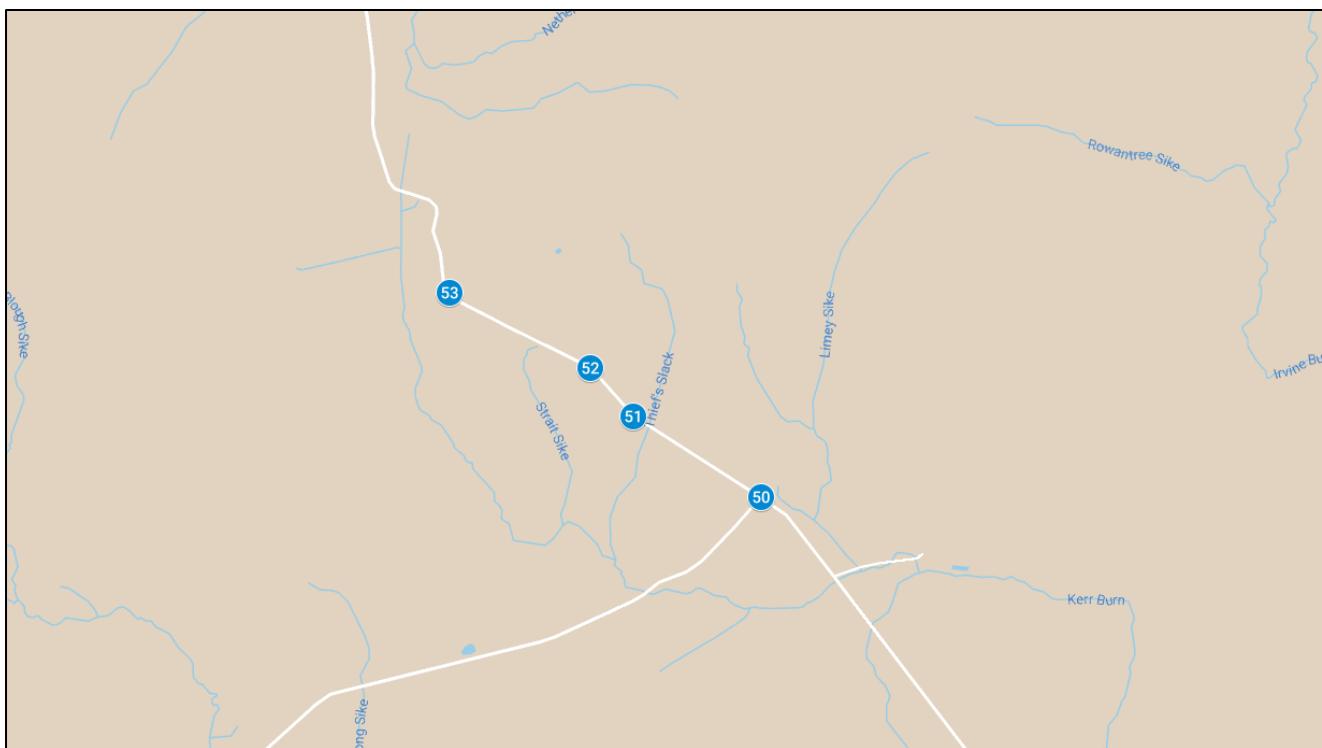
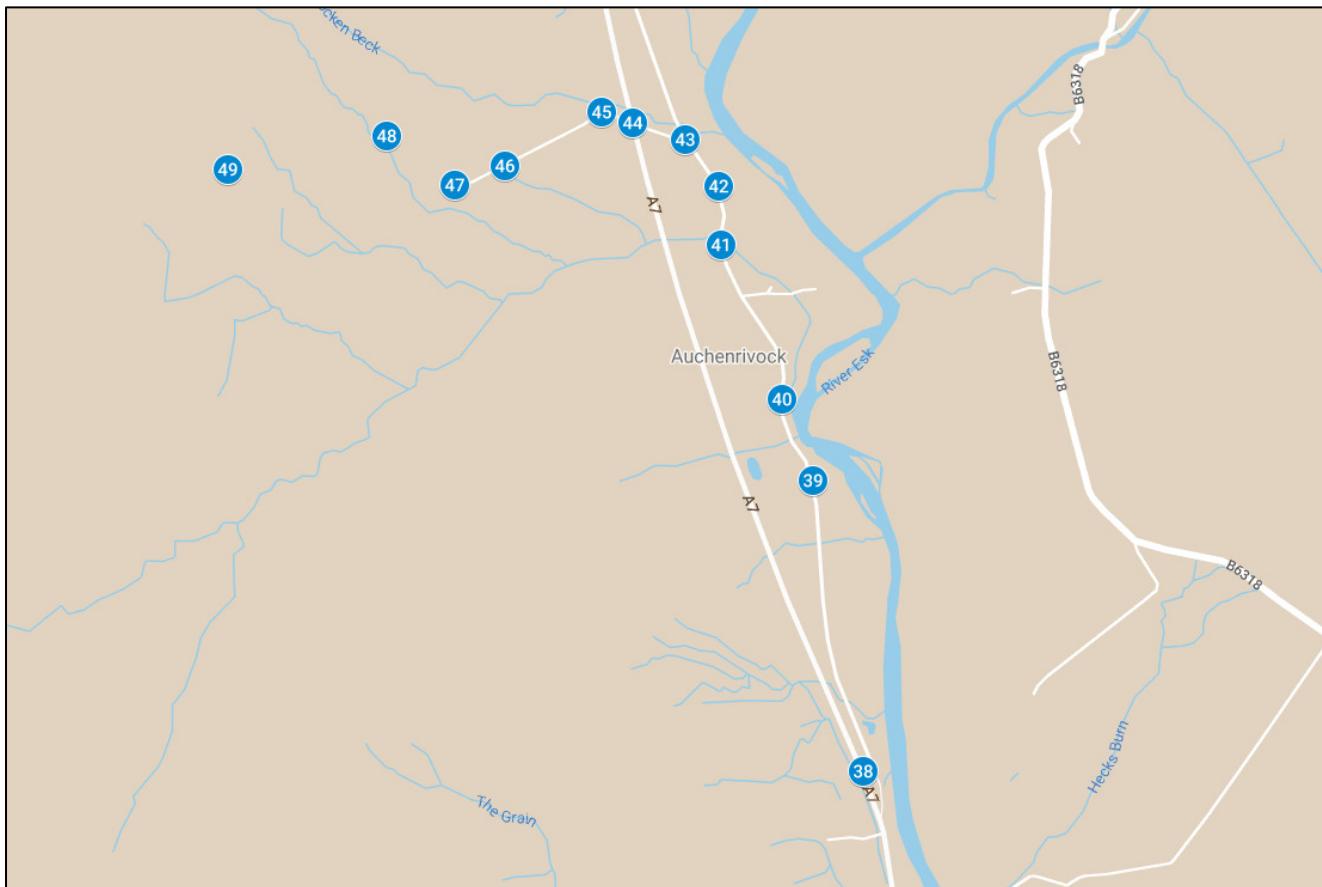
## Appendix A Points of Interest

An electronic version of the POI plans can be found here:

<https://www.google.com/maps/d/edit?mid=1hu9bfAQbtYTFhOnpLATJJ3g44eGtoVA&usp=sharing>

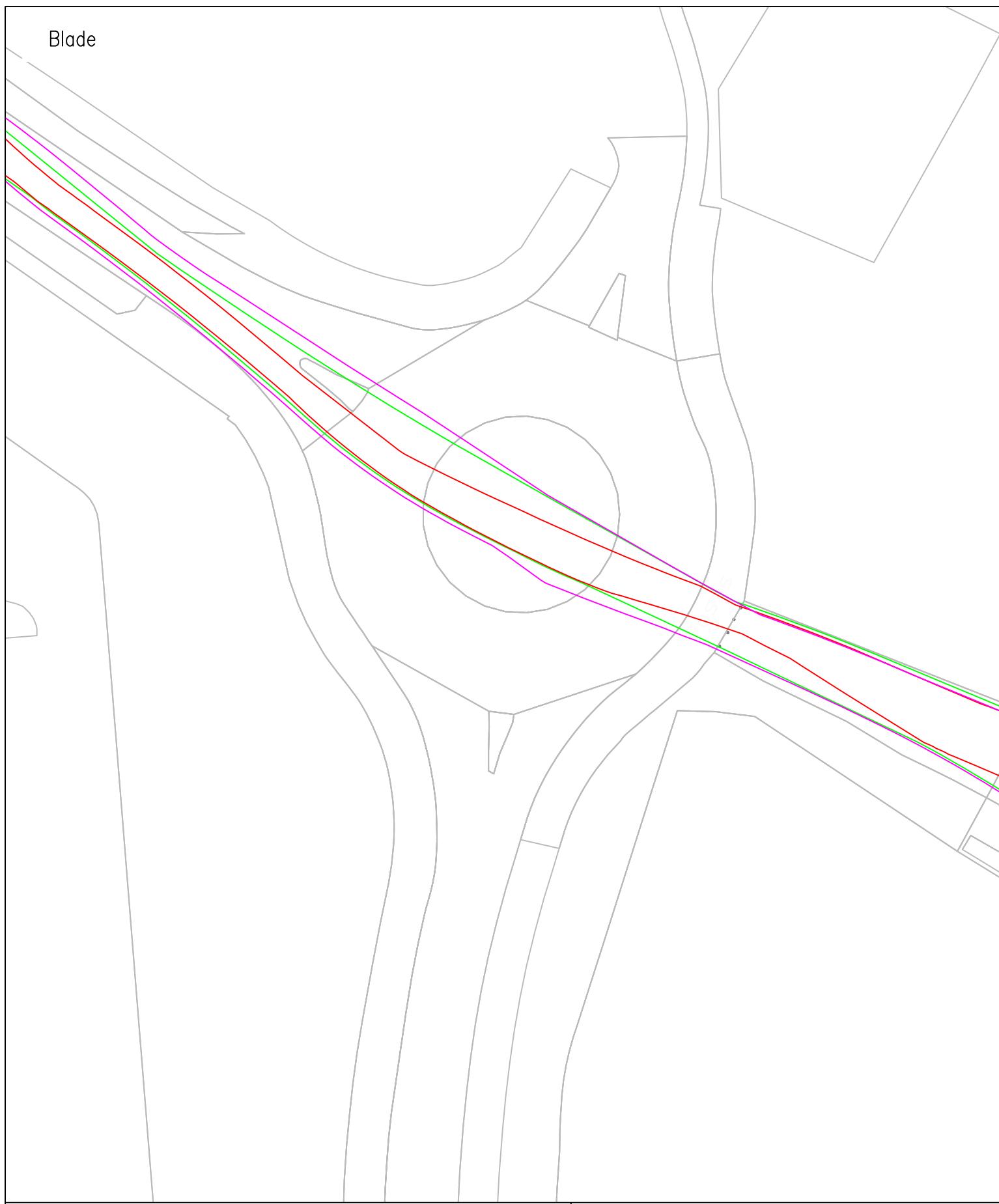




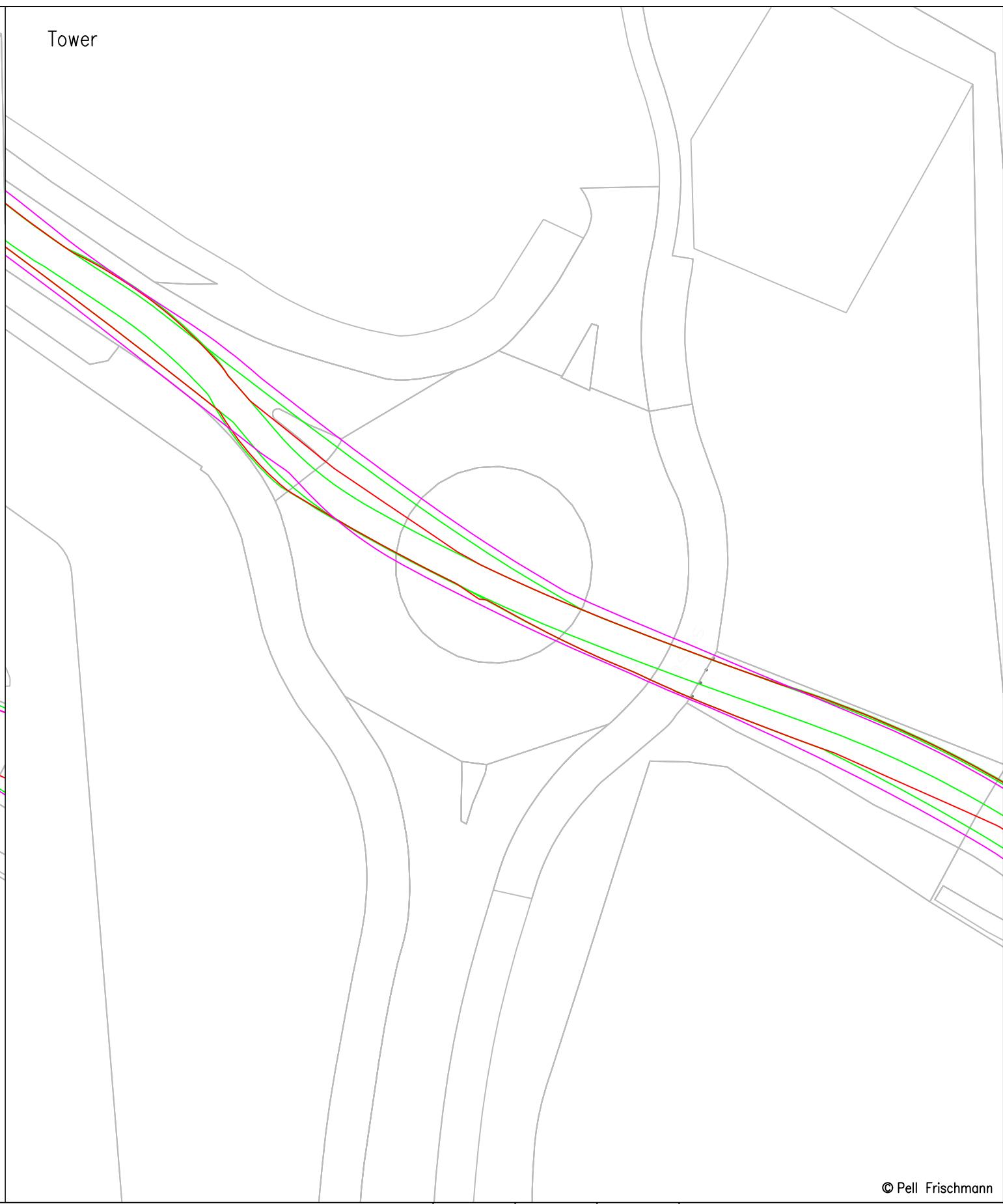


## Appendix B Swept Path Assessments

Blade

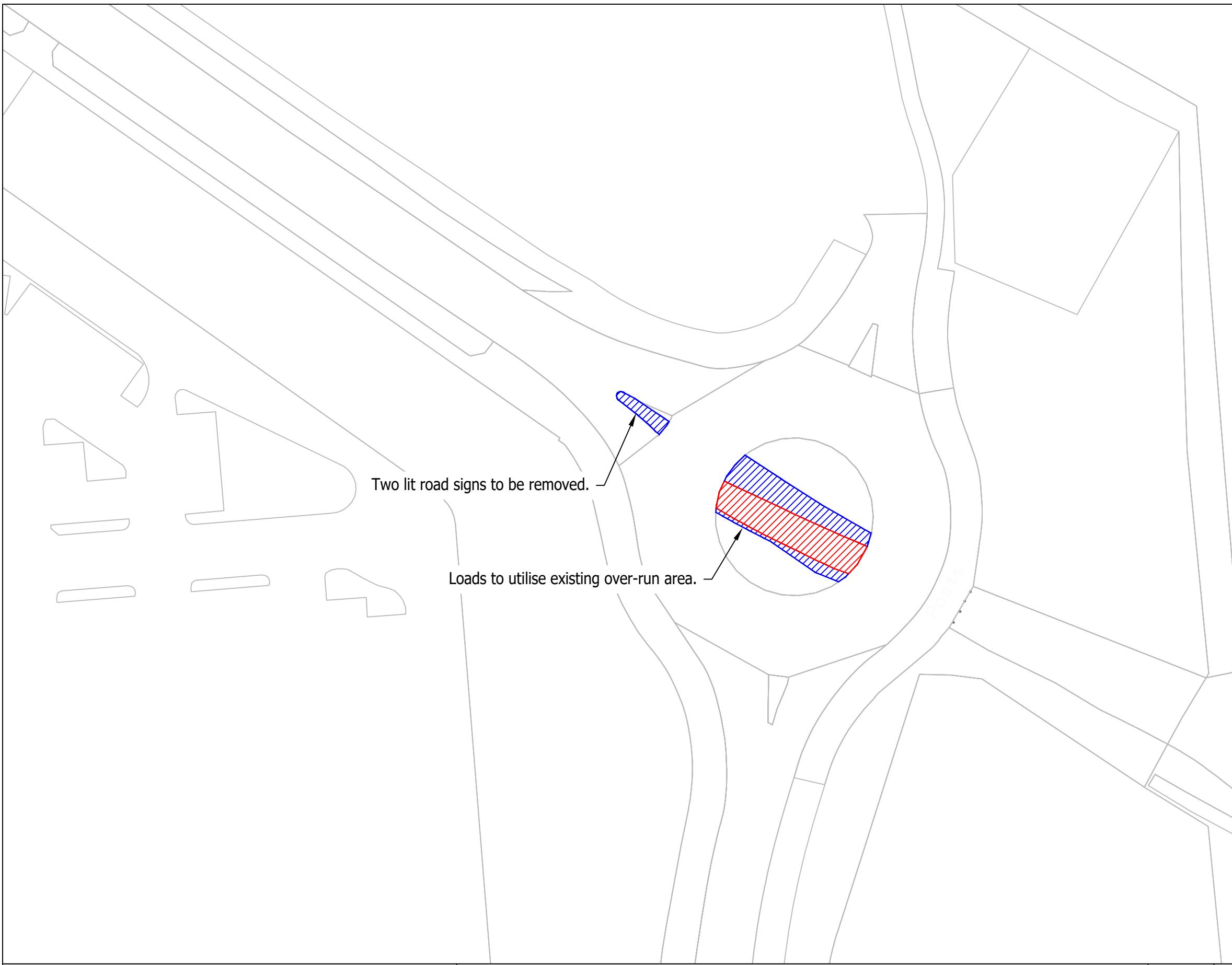


Tower



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				Designed	SK	08/10/2022		
				Checked	GB	15/10/2022	Drawing Status	Draft
Client RES		Drawing Title Vestas V150 Swept Path Assessment		Point of Interest 1				
Key Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail		Drawing No. SK01		Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		Revision XXX		
SPA Location Port Exit – Kings Inch Drive Roundabout 1								



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			Drawn	SK	15/10/2022	1:500 @ A3
		Drawing Title  Vestas V150 Swept Path Assessment	Designed	SK	08/10/2022	File No_22108 Solwaybank SPA planning.dwg
			Checked	GB	15/10/2022	Drawing Status Draft
Client  RES		Drawing No.  SK01A	Point of Interest	1		
Key  Wheel SPA   Body SPA   Load SPA   Indicative   Over-run   Over-sail			Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.	Revision  XXX		
Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Over-sail	
SPA Location  Kings Inch Drive Roundabout 1						

Blade

KINGS INCH DRIVE

7.6m

Tower

KINGS INCH DRIVE

7.6m

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Project

Bloch Wind Farm

Name

Date

Scale

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Drawn

SK

15/10/2022

File No\_22108 Solwaybank SPA planning.dwg

Designed

SK

08/10/2022

Checked

GB

15/10/2022

Drawing Status Draft

Client

RES

Drawing Title

Vestas V150 Swept Path Assessment

Point of Interest

2

Key

Wheel SPA

Body SPA

Load SPA

Indicative

Over-run

Over-sail

SPA Location

Kings Inch Drive Roundabout 2

Drawing No.

SK02

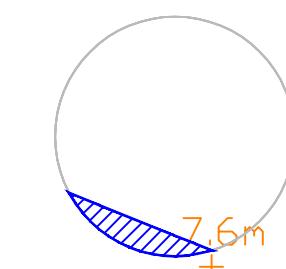
Notes:

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2. This is not a construction drawing and is intended for illustration purposes only.

Revision

XXX

KINGS INCH DRIVE



7.6m

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### Project

Bloch Wind Farm

### Name

SK

### Date

15/10/2022

### Scale

Custom @ A3

### Drawn

SK

### Designed

SK

### Checked

GB

### Notes:

File No\_22108 Solwaybank SPA planning.dwg

### Drawing Status

Draft

### Point of Interest

2

### Drawing No.

SK02A

### Revision

XXX

### Client

RES

### Drawing Title

Vestas V150 Swept Path Assessment

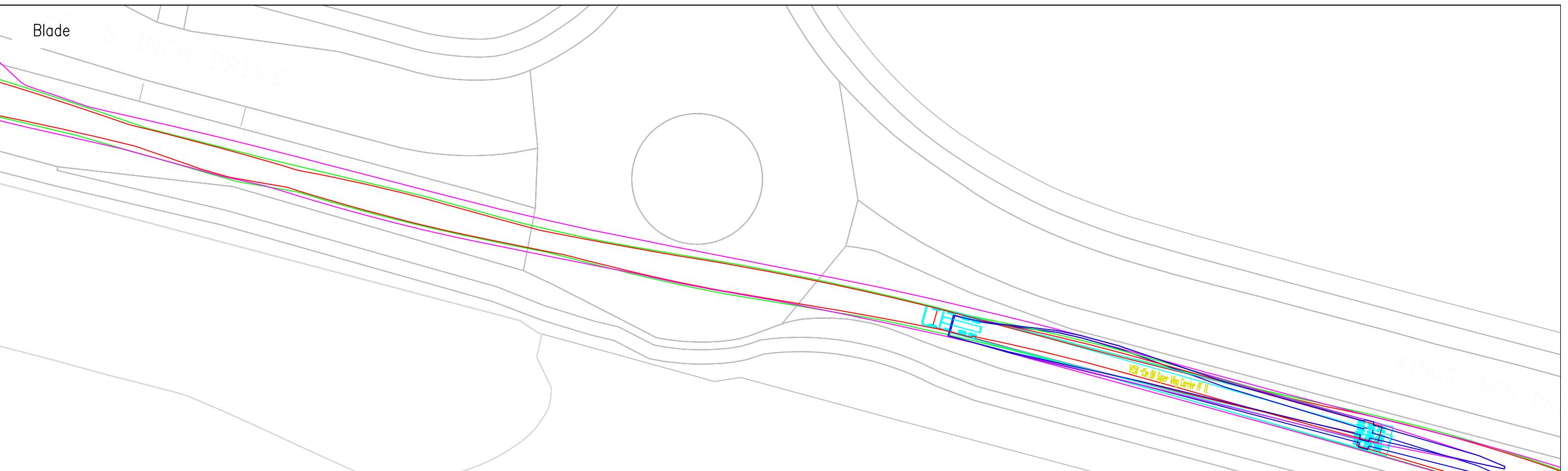
### Key

Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Over-sail

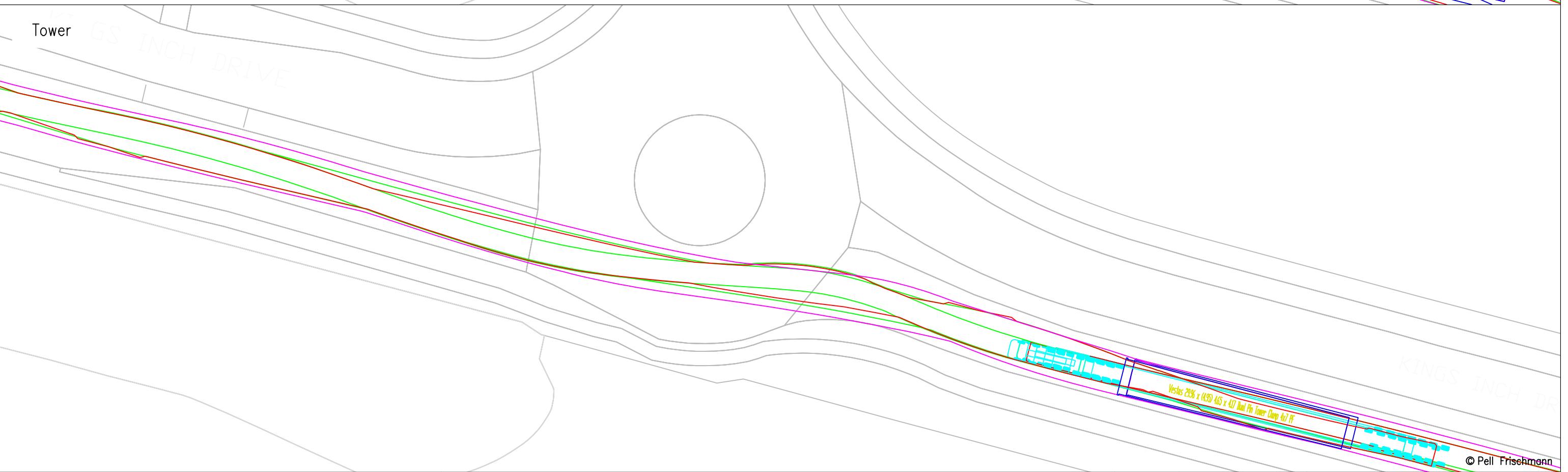
### SPA Location

Kings Inch Drive Roundabout 2

Blade



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Project

Bloch Wind Farm

Drawing Title

Vestas V150 Swept Path Assessment

Client

RES

SPA Location

Kings Inch Drive Roundabout 3

NO MITIGATION REQUIRED

Key

— Wheel SPA — Body SPA — Load SPA — Indicative — Over-run — Over-sail

Drawn

Designed

Checked

Point of Interest

Drawing No.

Name

Date

Scale

SK

08/10/2022

GB

15/10/2022

1:500 @ A3

15/10/2022

08/10/2022

15/10/2022

1:500 @ A3

File No

22108 Solwaybank SPA planning.dwg

Draft

Drawing Status

Draft

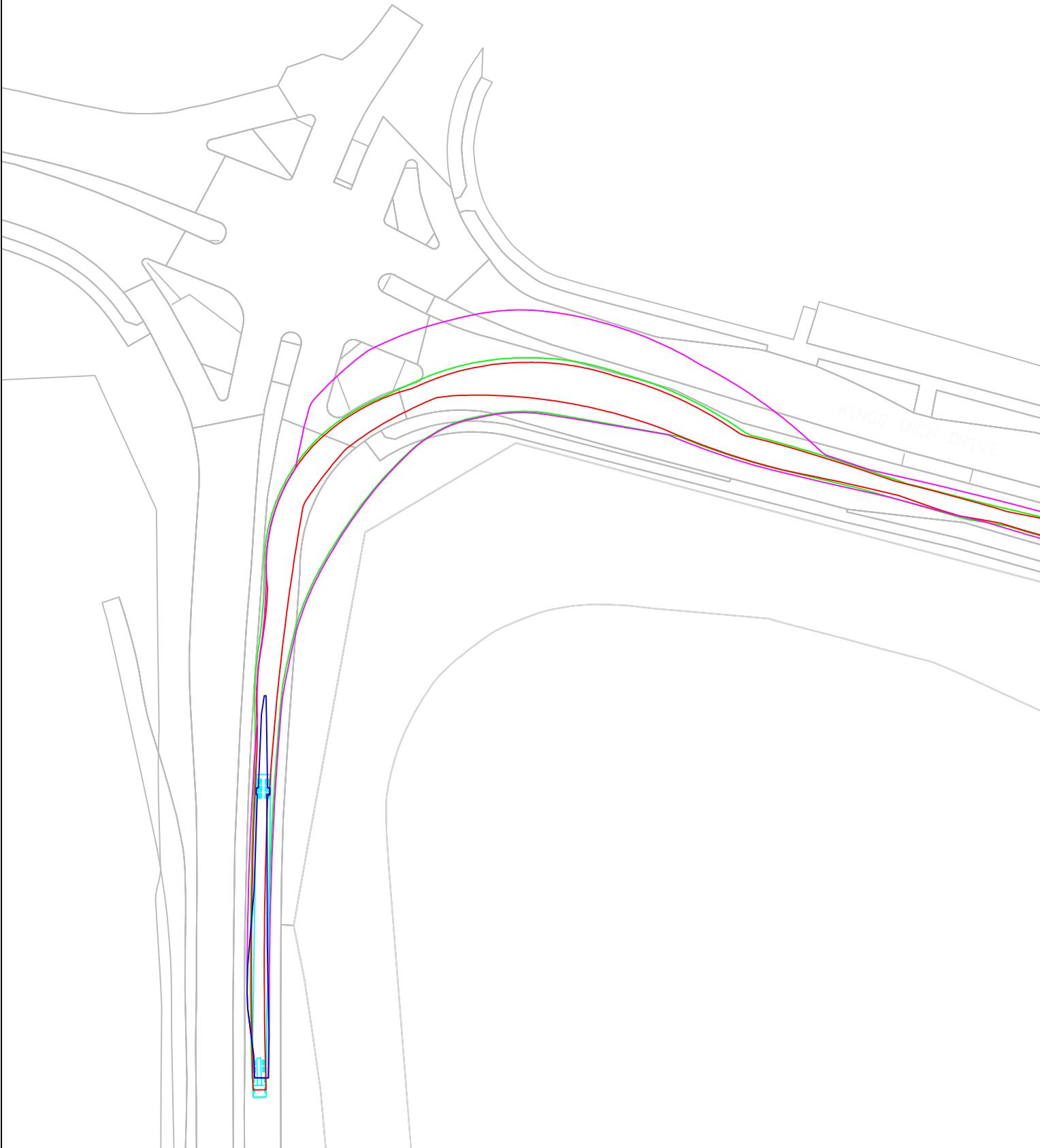
Notes:

1. All mitigation is subject to confirmation through a test run.  
2. This is not a construction drawing and is intended for illustration purposes only.

Revision

XXX

Blade

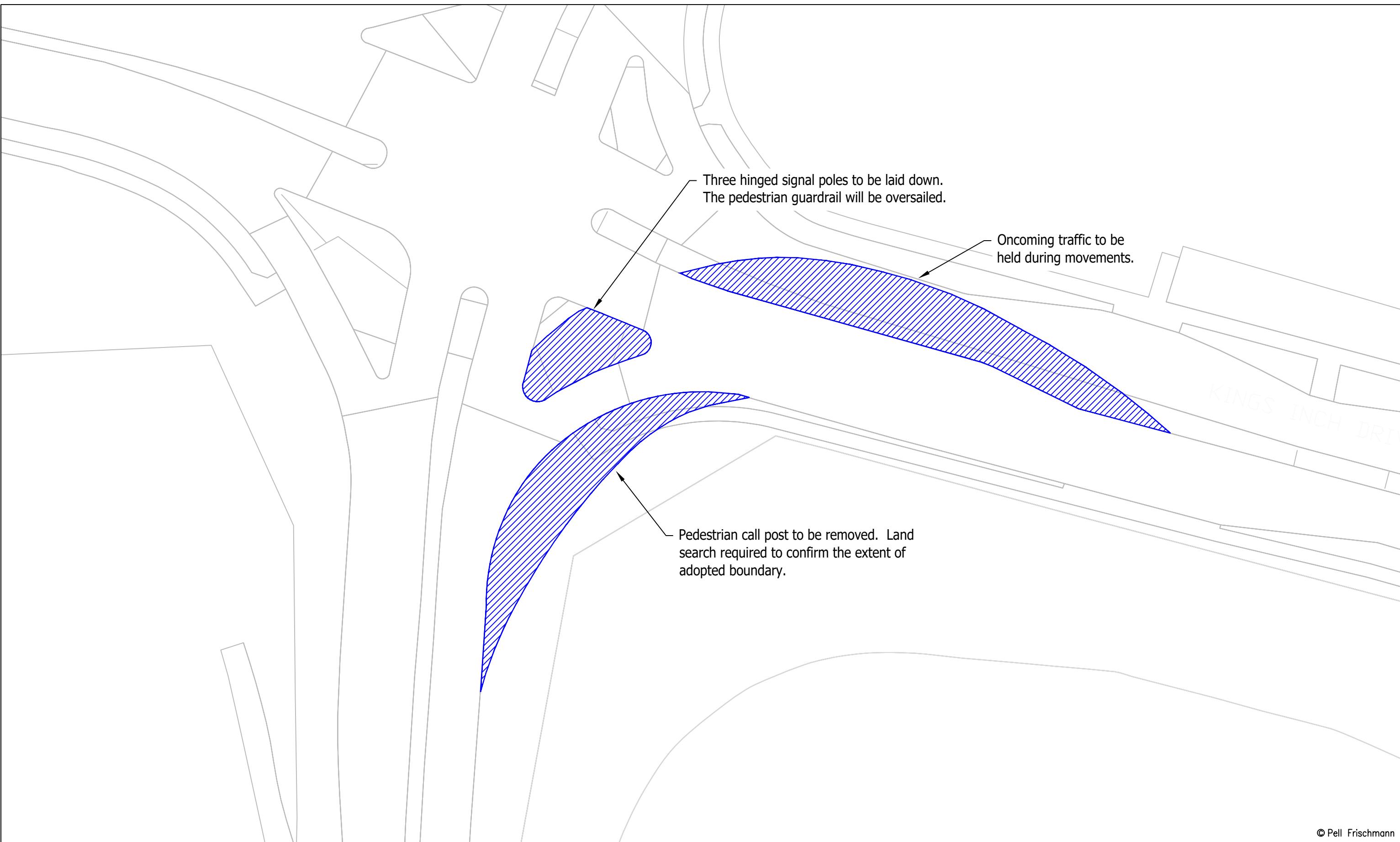


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					Designed	SK	08/10/2022
					Checked	GB	15/10/2022
Client RES		Drawing Title Vestas V150 Swept Path Assessment		Point of Interest	4	Drawing Status	Draft
Key Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail		SPA Location Kings Inch Drive / Mayo Avenue Junction		Drawing No.	Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		Revision
				SK04			XXX



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Client  RES		Drawing Title  Vestas V150 Swept Path Assessment	Point of Interest  4		File No 22108 Solwaybank SPA planning.dwg	Drawing Status Draft
Key — Wheel SPA	— Body SPA	— Load SPA	— Indicative	— Over-run	— Over-sail	Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.
Key — Wheel SPA	— Body SPA	— Load SPA	— Indicative	— Over-run	— Over-sail	Revision XXX
SPA Location Kings Inch Drive / Mayo Avenue Junction	Drawing No. SK04A					

Blade

Tower

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## Project

Bloch Wind Farm

Name

Date

Scale

1:1000 @ A3

Drawn

SK

15/10/2022

File No\_22108 Solwaybank SPA planning.dwg

Designed

SK

08/10/2022

Checked

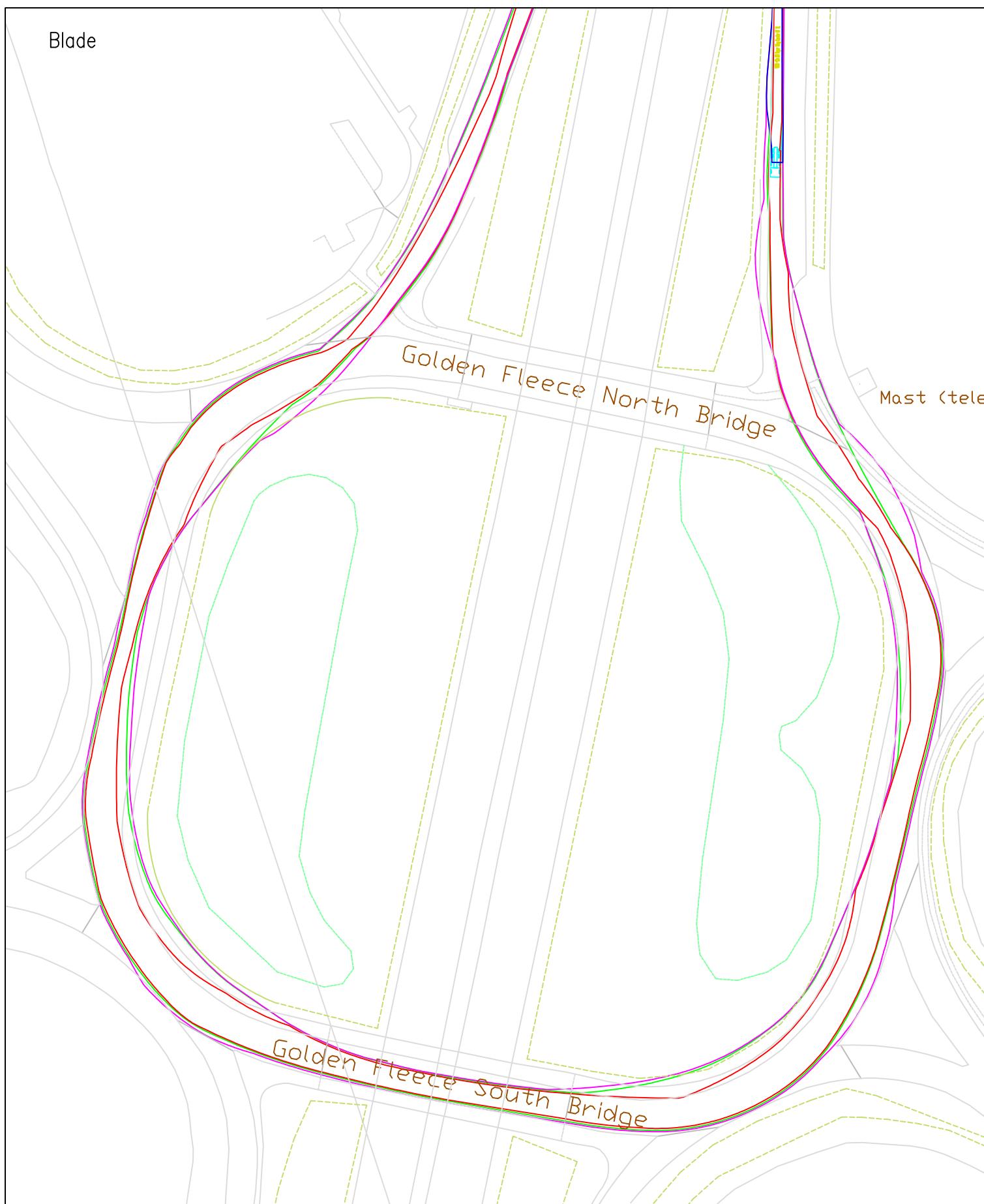
GB

15/10/2022

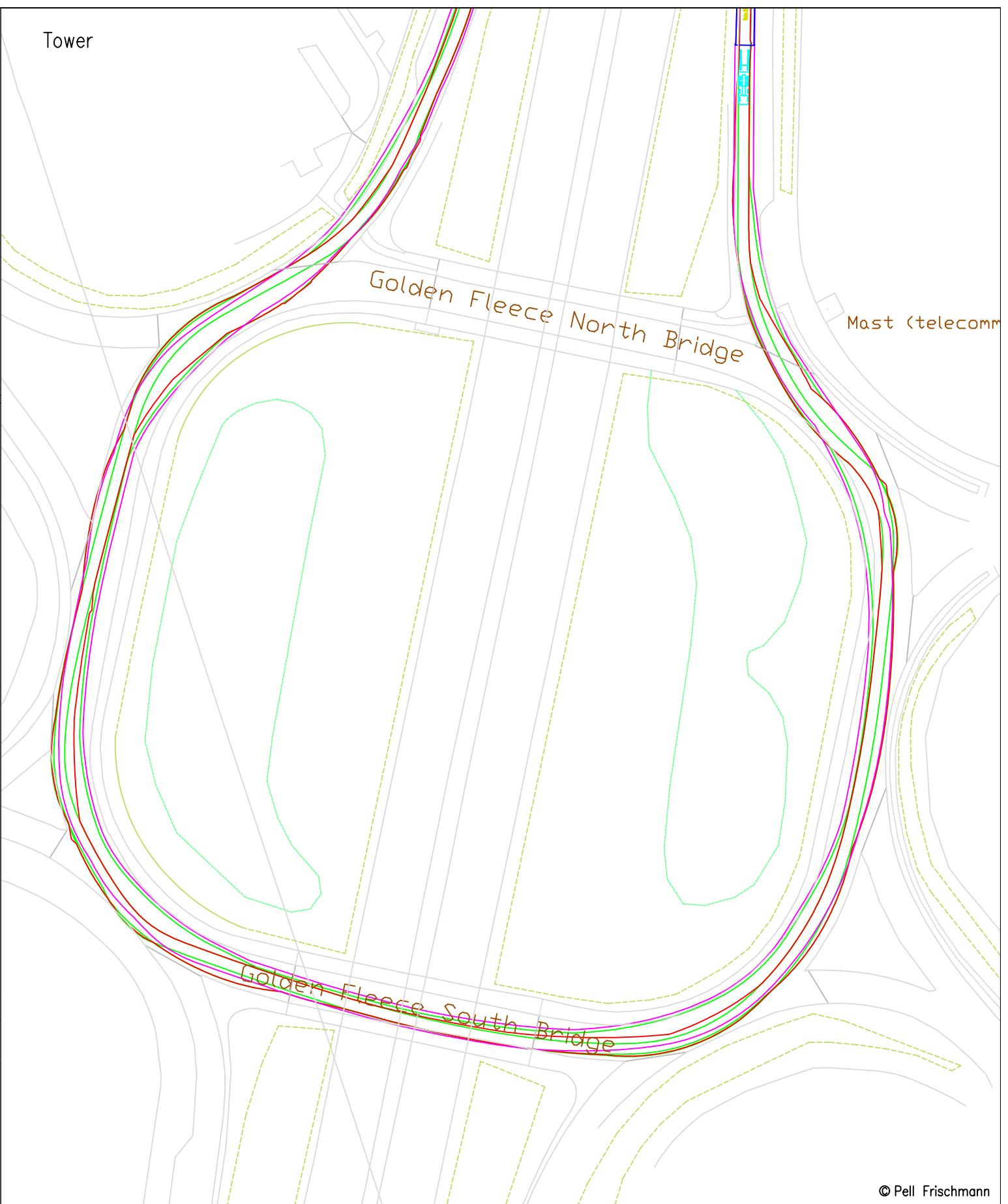
Drawing Status Draft

Client		RES		Drawing Title	Vestas V150 Swept Path Assessment	Point of Interest		5	Notes:	Revision
Key	—	—	—			Drawing No.				
Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Over-sail	SK05	1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		XXX	
				SPA Location	Merge onto the M8		NO MITIGATION REQUIRED			

Blade



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## Project

Bloch Wind Farm

Client

RES

Drawing Title

Vestas V150 Swept Path Assessment

Key

Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Over-sail
-----------	----------	----------	------------	----------	-----------

		Name	Date	Scale
		Drawn	SK	15/10/2022
		Designed	SK	08/10/2022
		Checked	GB	15/10/2022
Point of Interest		27		Drawing Status
Drawing No.		SK23		Draft
Notes:		1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		Revision
				XXX

SPA Location M6 – Golden Fleece Roundabout

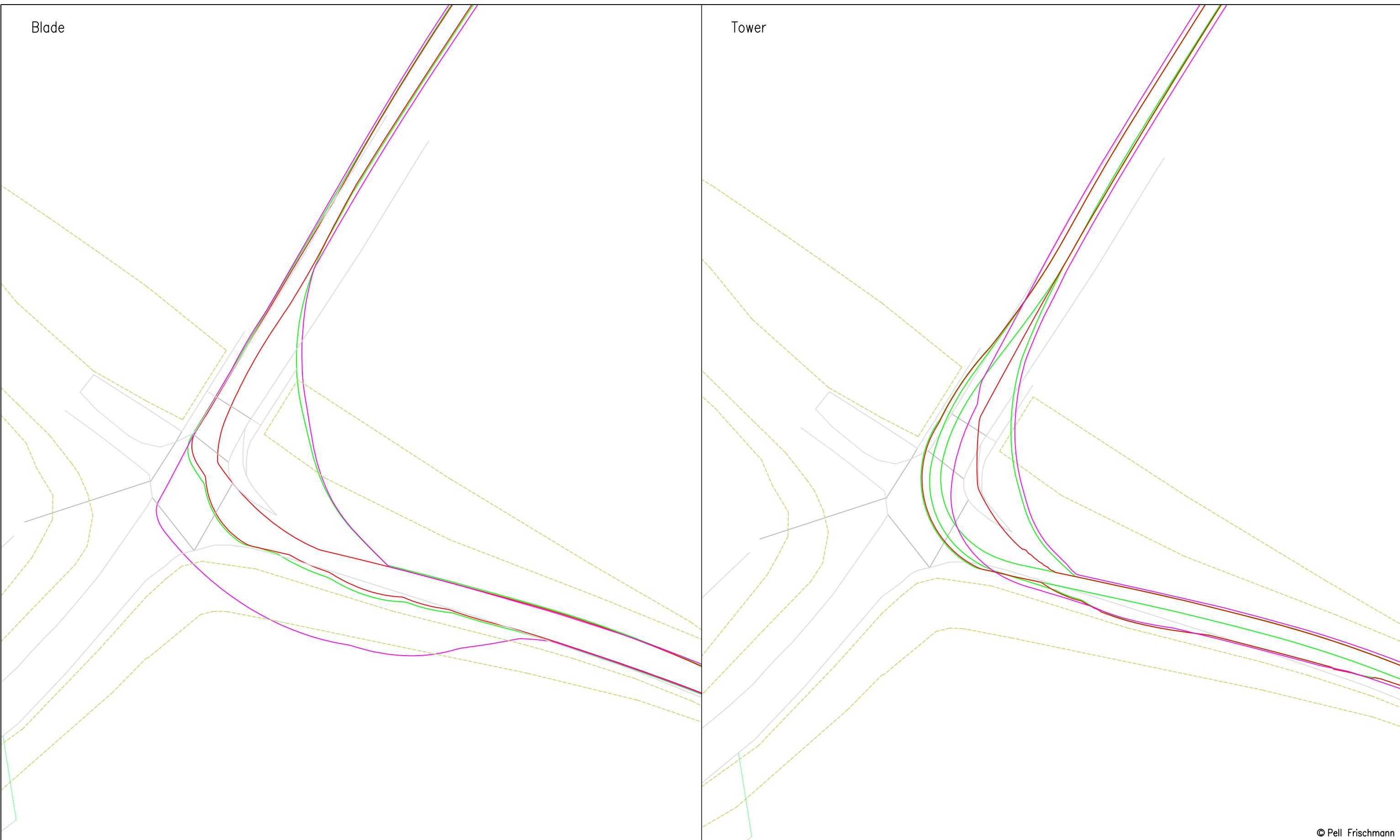


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			Drawn	Name	Date	
Client	RES	Drawing Title	Bloch Wind Farm	SK	15/10/2022	File No 22108 Solwaybank SPA planning.dwg
Key	—	—	Vestas V150 Swept Path Assessment	Designed	08/10/2022	Drawing Status Draft
Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Checked	15/10/2022
SPA Location	M6 – Golden Fleece Roundabout			Point of Interest	27	Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.
Over-sail				Drawing No.	SK23A	Revision XXX

Blade

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Bloch Wind Farm

## Client

RES

## Key

Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Over-sail

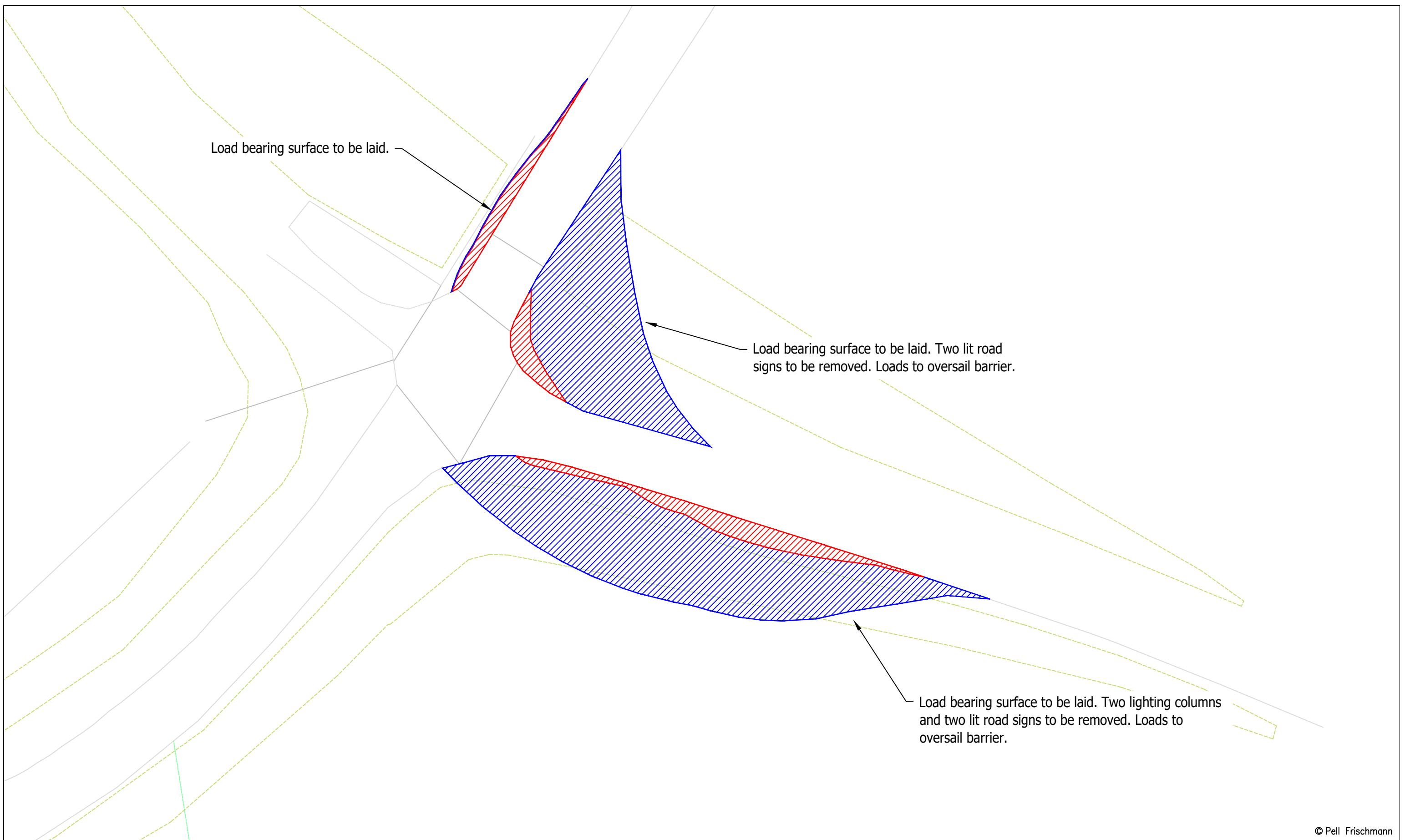
## Drawing Title

Vestas V150 Swept Path Assessment

## SPA Location

M6 Junction 45 – NB Off-slip

	Name	Date	Scale
Drawn	SK	15/10/2022	1:750 @ A3
Designed	SK	08/10/2022	File No. 22108 Solwaybank SPA planning.dwg
Checked	GB	15/10/2022	Drawing Status
		28	Draft
Drawing No.	Notes:		Revision
SK24	1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		XXX

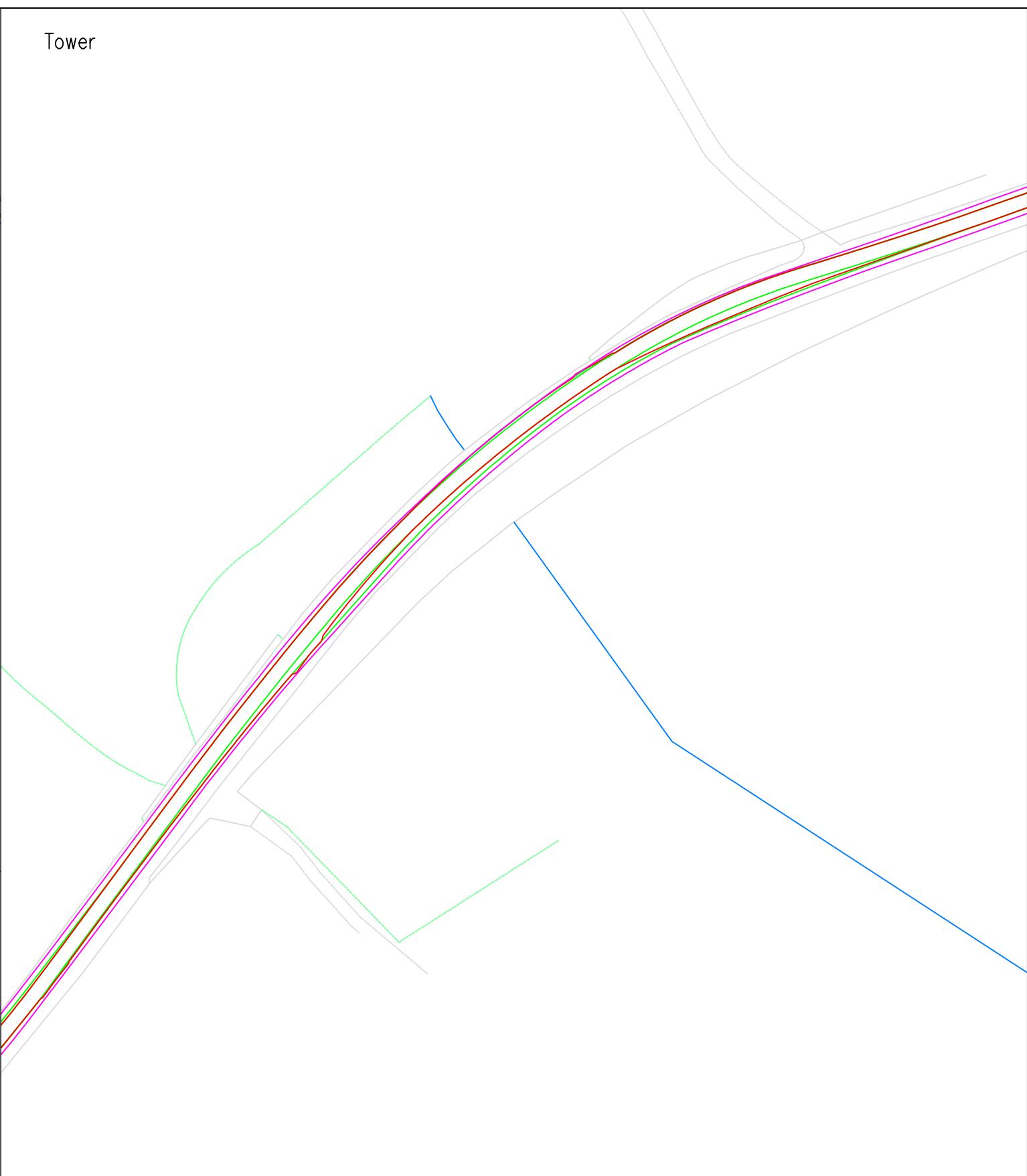
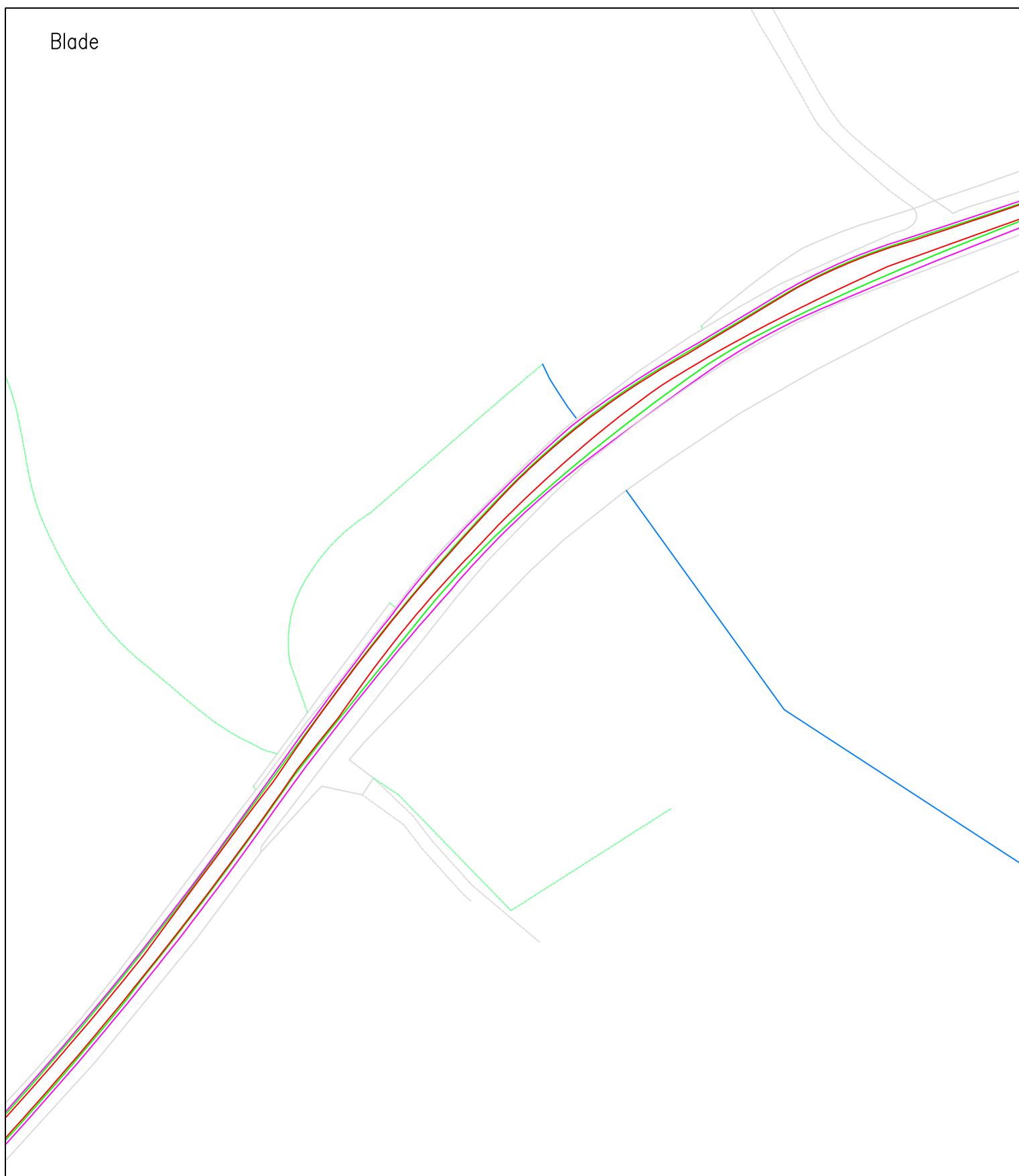


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			Drawn	SK	15/10/2022	1:500 @ A3
		Drawing Title  Vestas V150 Swept Path Assessment	Designed	SK	08/10/2022	File No_22108 Solwaybank SPA planning.dwg
			Checked	GB	15/10/2022	Drawing Status Draft
Client  RES		Drawing No.  SK24A	Point of Interest	28		
Key  Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail			Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.			Revision  XXX
SPA Location  M6 Junction 45 – NB Off-slip						

Blade

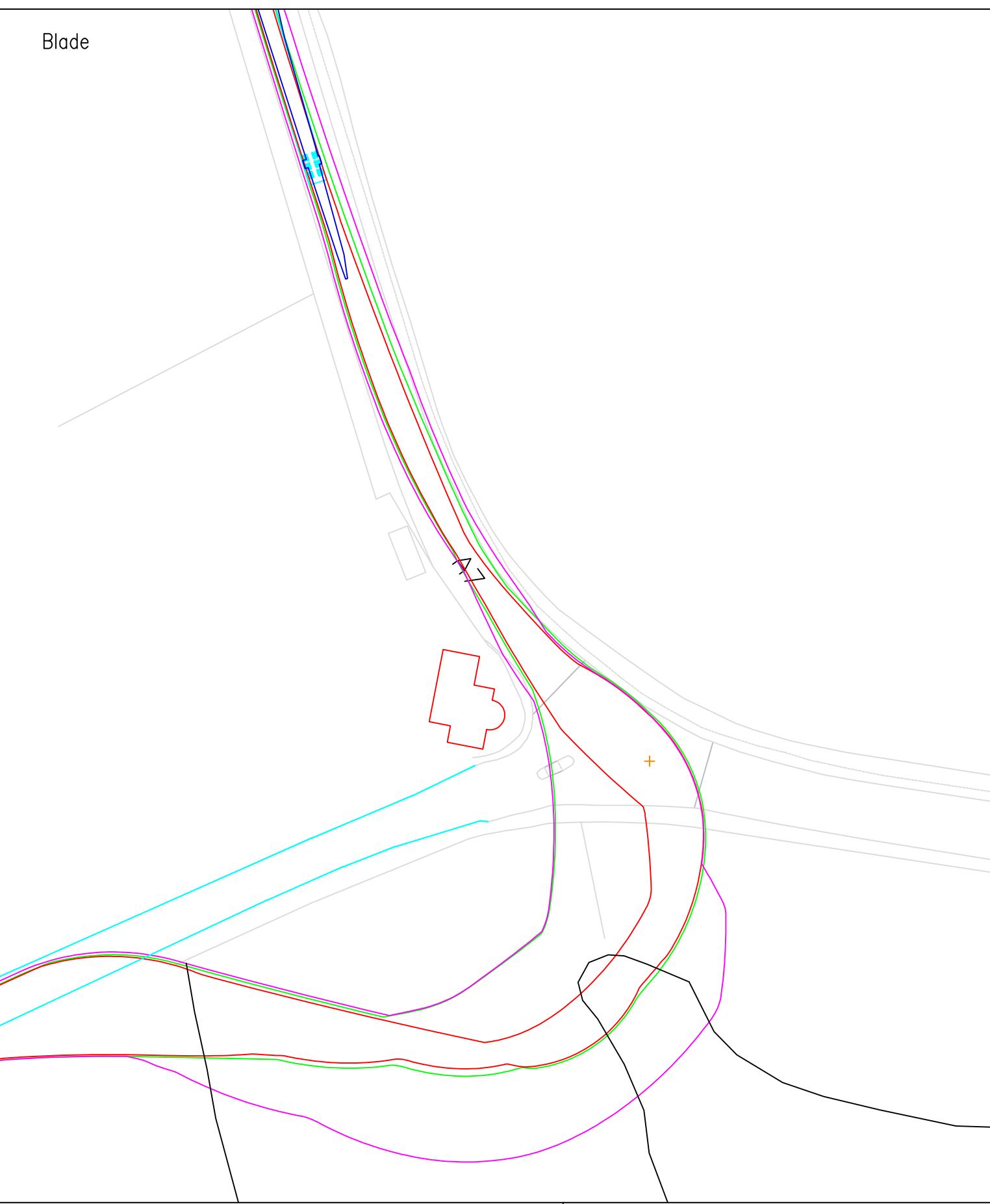
Tower



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				SK	15/10/2022	1:1000 @ A3	
				Designed	SK	08/10/2022	File No
				Checked	GB	15/10/2022	22108 Solwaybank SPA planning.dwg
				Point of Interest		Draft	Drawing Status
Client RES		Drawing Title Vestas V150 Swept Path Assessment		29 & 30	Drawing No.		Revision
Key Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail		SPA Location A6071 – Caldron Ditch		SK25	Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		XXX

Blade



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					Drawn	SK	15/10/2022
					Designed	SK	08/10/2022
					Checked	GB	15/10/2022
Client RES		Drawing Title Vestas V150 Swept Path Assessment		Point of Interest	32		Drawing Status Draft
Key Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail		SPA Location A6071/A7 Junction		Drawing No. SK26	Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		Revision XXX



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				SK	15/10/2022	1:750 @ A3
		File No_22108 Solwaybank SPA planning.dwg				
		Designed		SK	08/10/2022	
		Checked		GB	15/10/2022	Drawing Status
		Point of Interest		32	Draft	
Client	RES	Drawing Title	Drawing No.		Notes:	
		Vestas V150 Swept Path Assessment	SK26A		1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.	
Key	Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Over-sail
SPA Location	A6071/A7 Junction					Revision
						XXX

Blade

Tower

GP

GP

Dickstree Cottage

Dickstree Cottage

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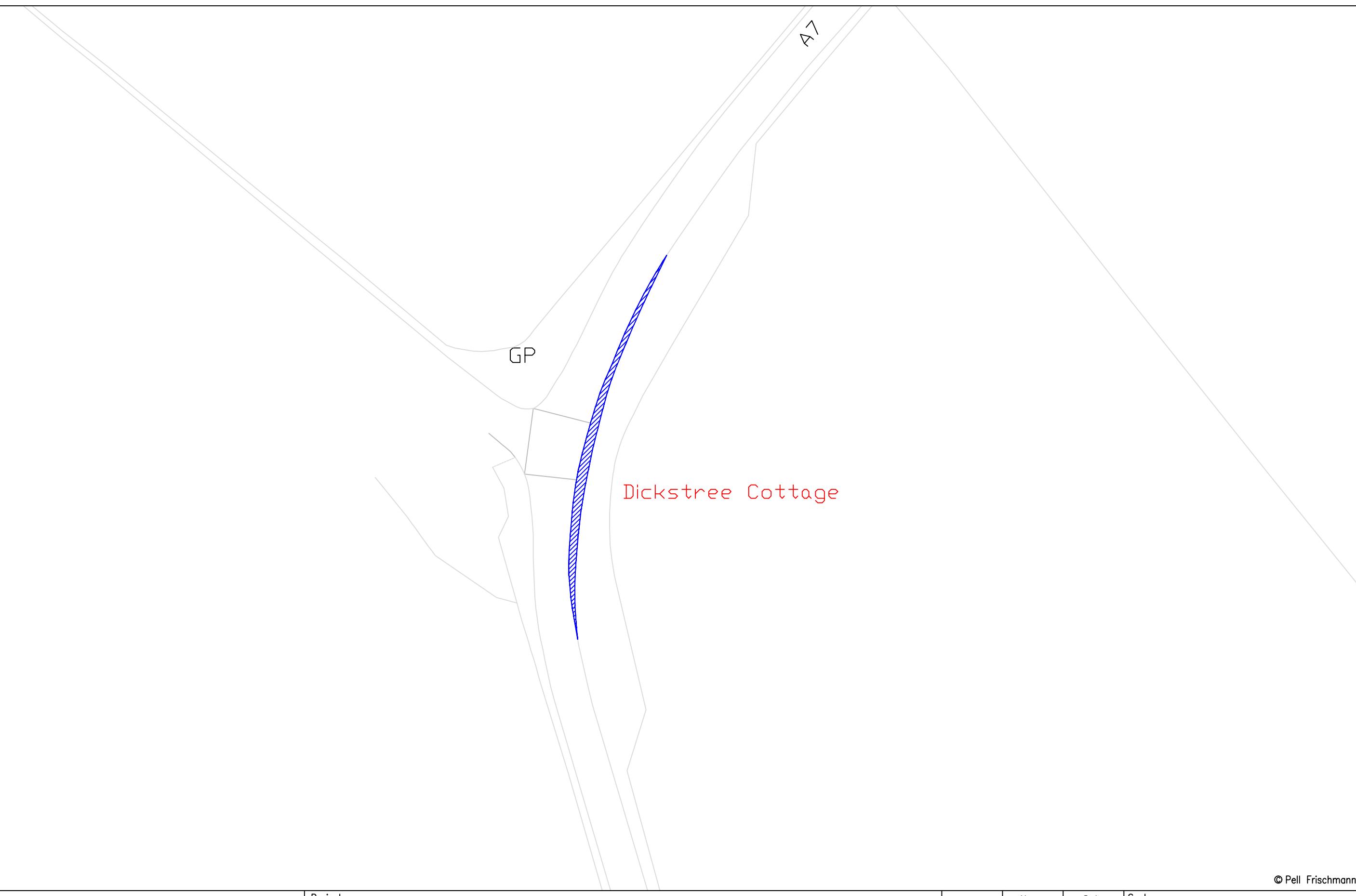
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Project

Bloch Wind Farm

	Name	Date	Scale
	Drawn	SK	15/10/2022
	Designed	SK	08/10/2022
	Checked	GB	15/10/2022
	Point of Interest	33	Drawing Status
	Drawing No.	Notes:	
	SK27	1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.	
			Revision
			XXX

Client		Drawing Title		SPA Location	A7 – Dickstree Cottage	
RES		Vestas V150 Swept Path Assessment				
Key	Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Over-sail



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Client  RES		Drawing Title  Vestas V150 Swept Path Assessment	Designed	SK	08/10/2022	Drawing Status	
			Checked	GB	15/10/2022	Draft	
Key  — Wheel SPA    — Body SPA    — Load SPA    Indicative  Over-run  Over-sail		SPA Location  A7 – Dickstree Cottage	Point of Interest  33		Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		
			Drawing No.	SK27A			
			Revision	XXX			

Blade

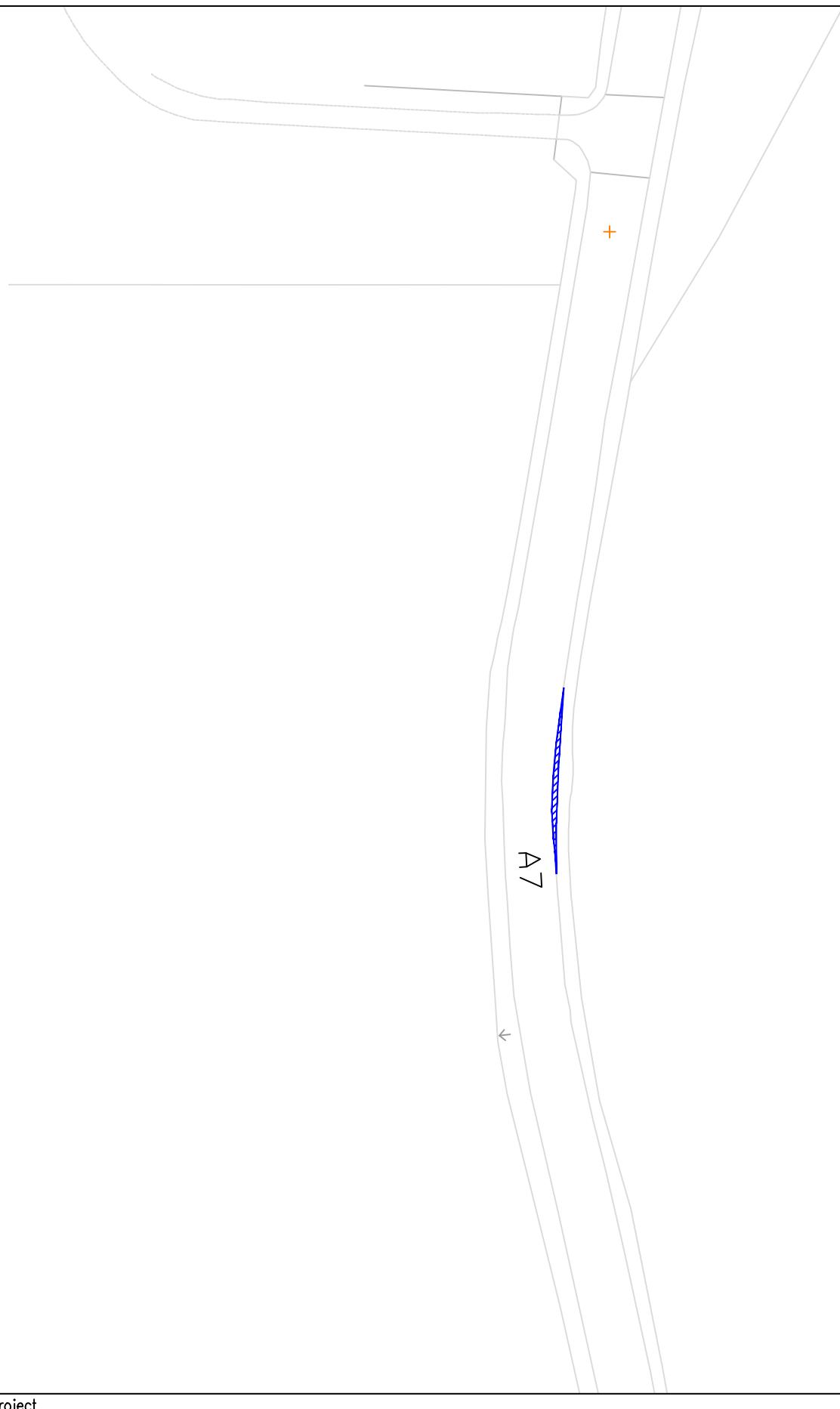


Tower



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			Designed	SK	08/10/2022	
			Checked	GB	15/10/2022	
Client	RES	Point of Interest	36 & 37	Drawing Status	Draft	
Key	<span style="color:red">—</span> Wheel SPA <span style="color:green">—</span> Body SPA <span style="color:magenta">—</span> Load SPA <span style="color:cyan">—</span> Indicative <span style="background-color:red; color:white; display:inline-block; width:15px; height:10px;"> </span> Over-run <span style="background-color:blue; color:white; display:inline-block; width:15px; height:10px;"> </span> Over-sail	Drawing Title	Vestas V150 Swept Path Assessment	Notes:		
SPA Location	A7 – Scotland/England Border	Drawing No.	SK28	1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		
Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Revision XXX	

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## Project

Bloch Wind Farm

## Name

SK

Date

1:750 @ A3

Drawn

15/10/2022

File No 22108 Solwaybank SPA planning.dwg

Designed

08/10/2022

Checked

GB

15/10/2022

Drawing Status Draft

Client

RES

## Drawing Title

Vestas V150 Swept Path Assessment

## Point of Interest

36 &amp; 37

Key

—	—	—	—	—	—	—
Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Over-sail	

## SPA Location

A7 – Scotland/England Border

Drawing No.

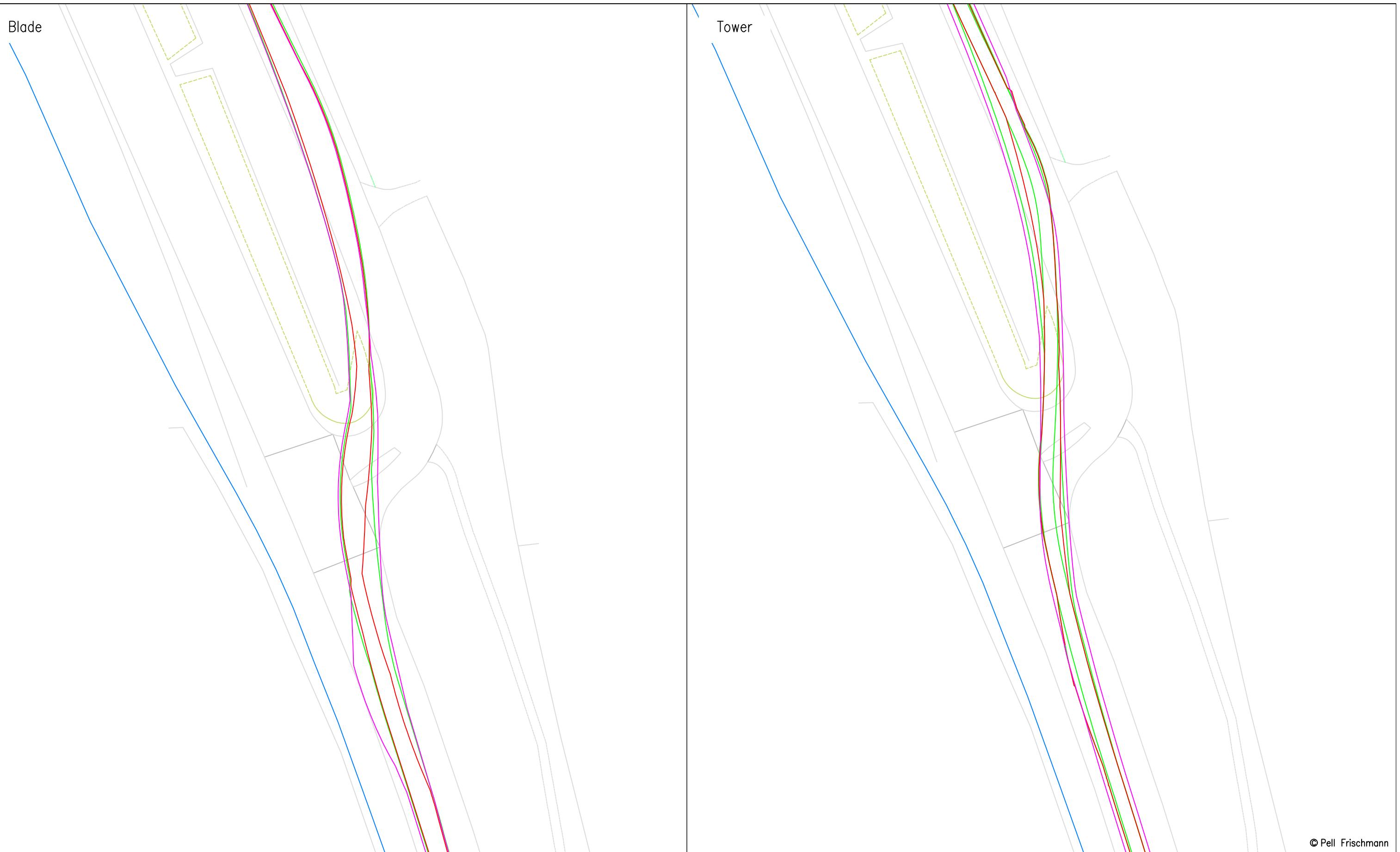
SK28A

Notes:

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Revision

XXX



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			Checked	GB	15/10/2022	Drawing Status Draft
Client  RES		Drawing No.  SK29	Point of Interest  38		Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.	
Key  Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail					Revision  XXX	
SPA Location  A7/Auchenrivock Road Junction						



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Client  RES		Drawing No.	Point of Interest	38		
Key  Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail			SK29A	Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		
		SPA Location  A7/Auchenrivock Road Junction			Revision  XXX	

Blade

Tower

60.6m

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Project

Bloch Wind Farm

Name	Date	Scale
SK	15/10/2022	1:750 @ A3

File No
22108 Solwaybank SPA planning.dwg

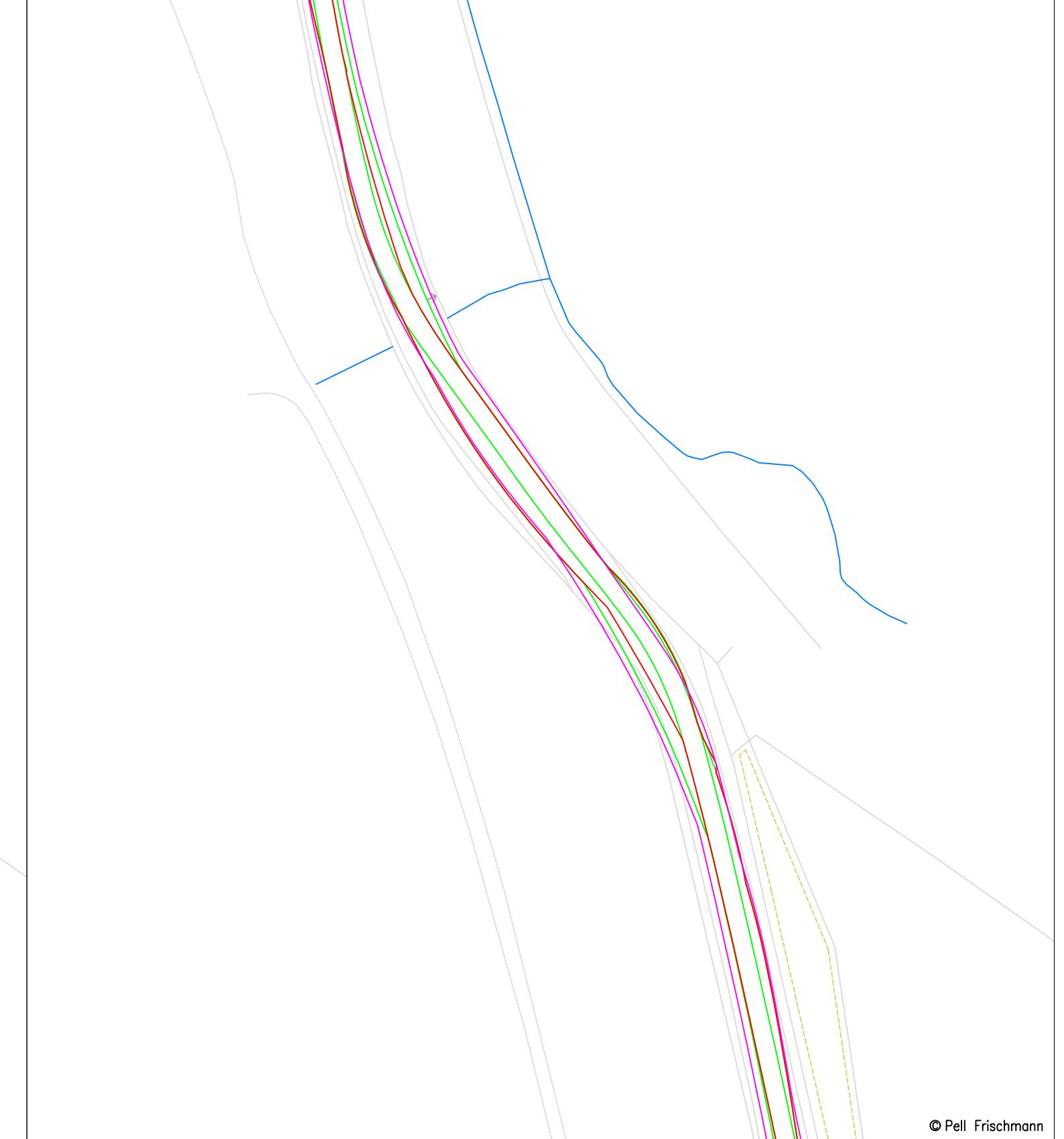
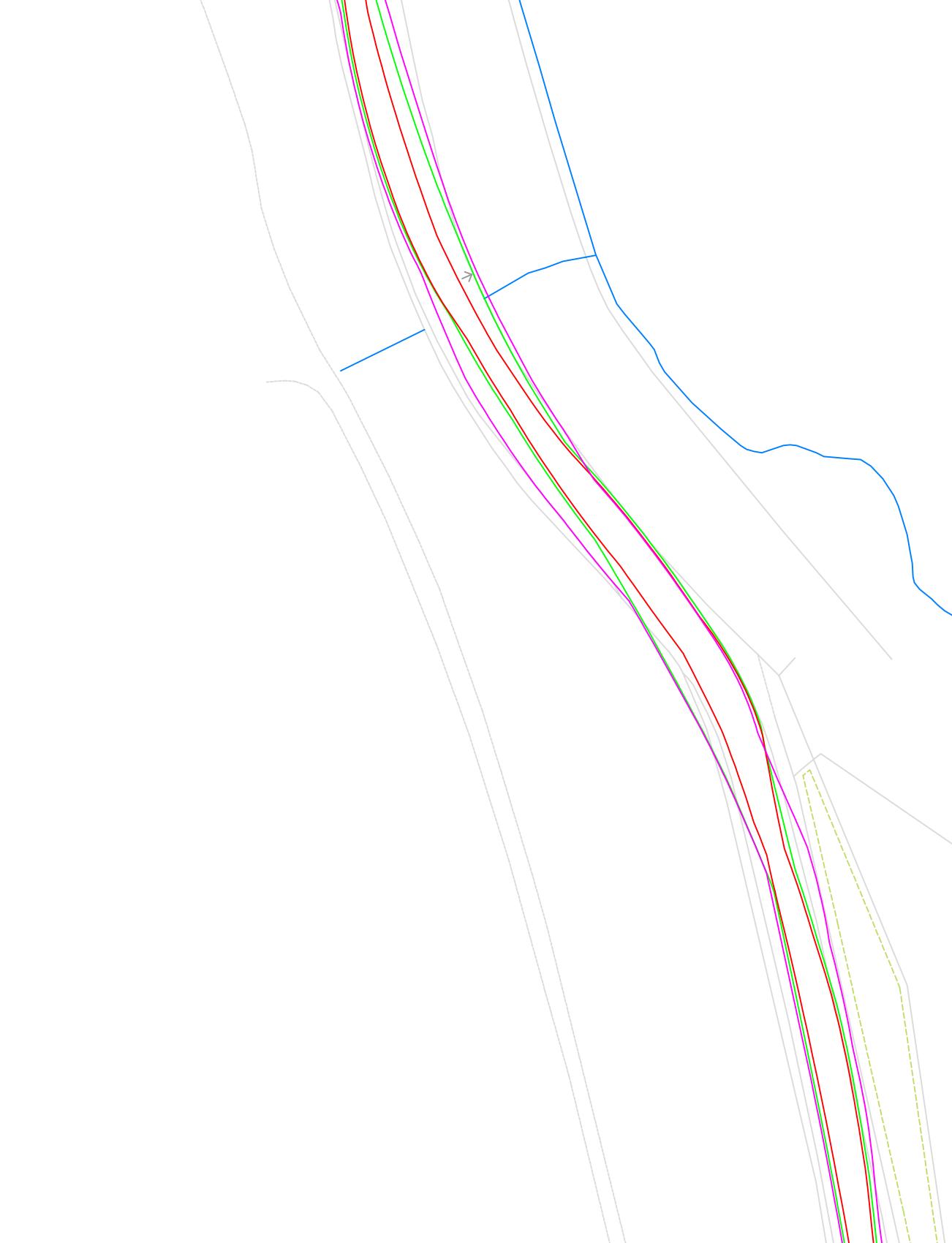
Drawing Status	Draft
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Notes:
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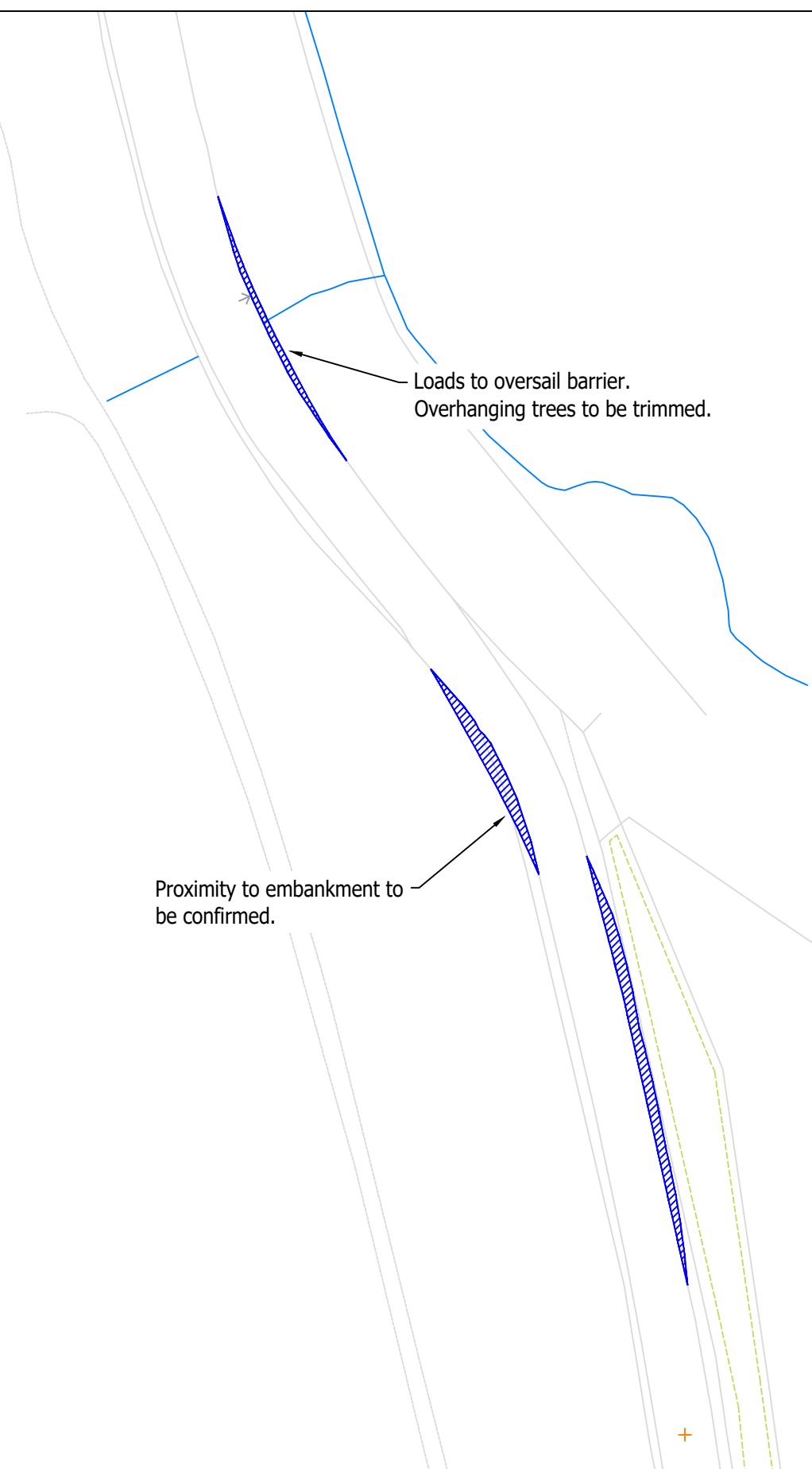
1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.
---

Revision

XXX



Client RES		Drawing Title  Vestas V150 Swept Path Assessment	Point of Interest  39	Drawing No.  SK30	Notes:  1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.	Revision  XXX
Key	Wheel SPA            Body SPA            Load SPA            Indicative            Over-run            Over-sail	SPA Location  Auchenriock Road – West of River Esk				



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			Drawn	SK	15/10/2022	1:750 @ A3		
		Drawing Title  Vestas V150 Swept Path Assessment	Designed	SK	08/10/2022	File No_22108 Solwaybank SPA planning.dwg		
			Checked	GB	15/10/2022	Drawing Status Draft		
Client  RES		Drawing No.	Point of Interest	39				
Key  — Wheel SPA    — Body SPA    — Load SPA    - Indicative    — Over-run    — Over-sail			SK30A	Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.				
SPA Location  Auchenriock Road – West of River Esk				Revision  XXX				

Blade

Tower

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## Project

Bloch Wind Farm

Name

Date

Scale

1:750 @ A3

Drawn

SK

15/10/2022

File No\_22108 Solwaybank SPA planning.dwg

Designed

SK

08/10/2022

Checked

GB

15/10/2022

Drawing Status Draft

Point of Interest

40

Drawing No.

SK31

Notes:

1. All mitigation is subject to confirmation through a test run.

2. This is not a construction drawing and is intended for illustration purposes only.

Revision

XXX

Client

RES

## Drawing Title

Vestas V150 Swept Path Assessment

Key

Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Over-sail

## SPA Location

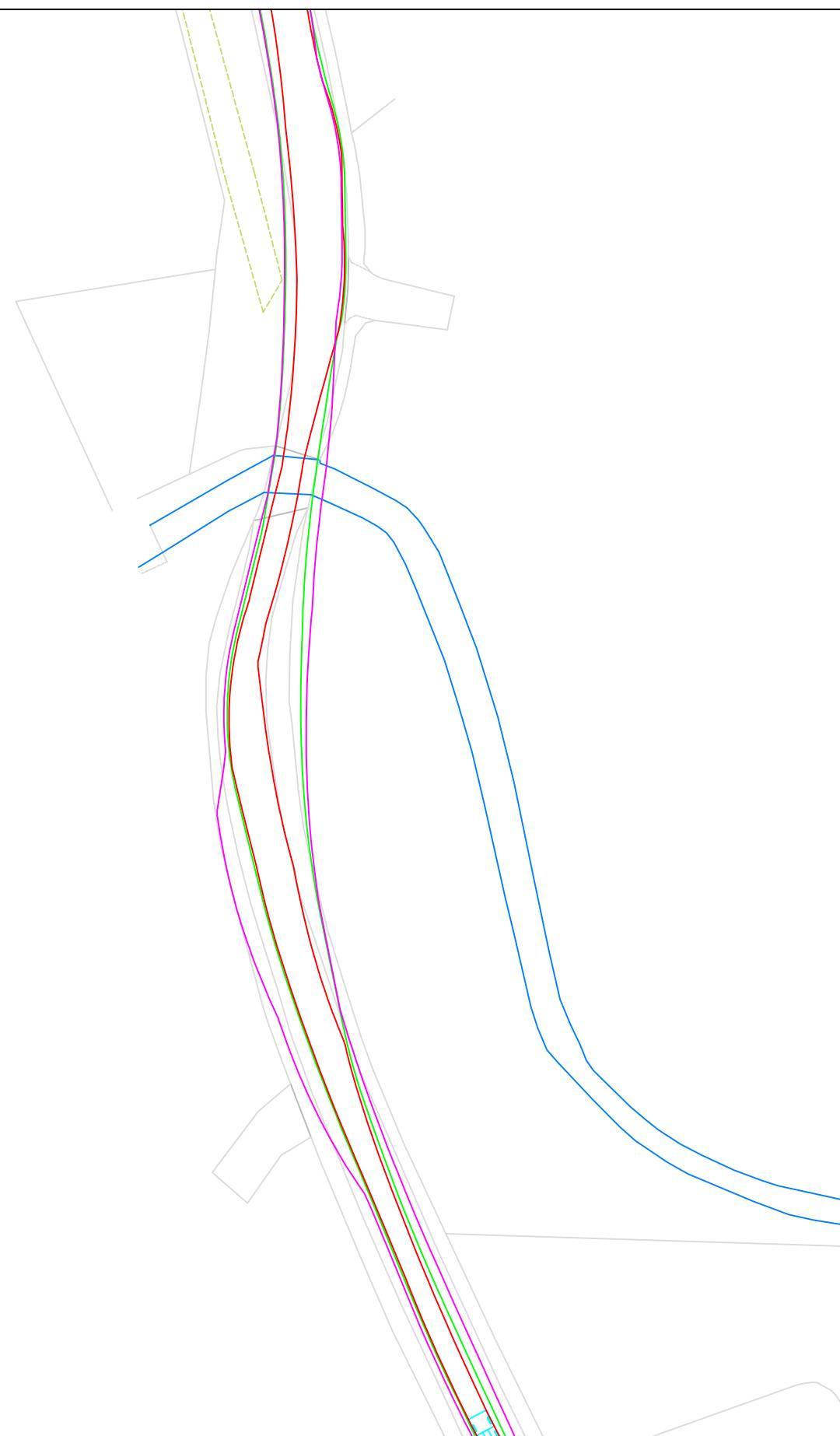
Auchenriock Road – South of Irvine Burn

Proximity to embankment to  
be confirmed.

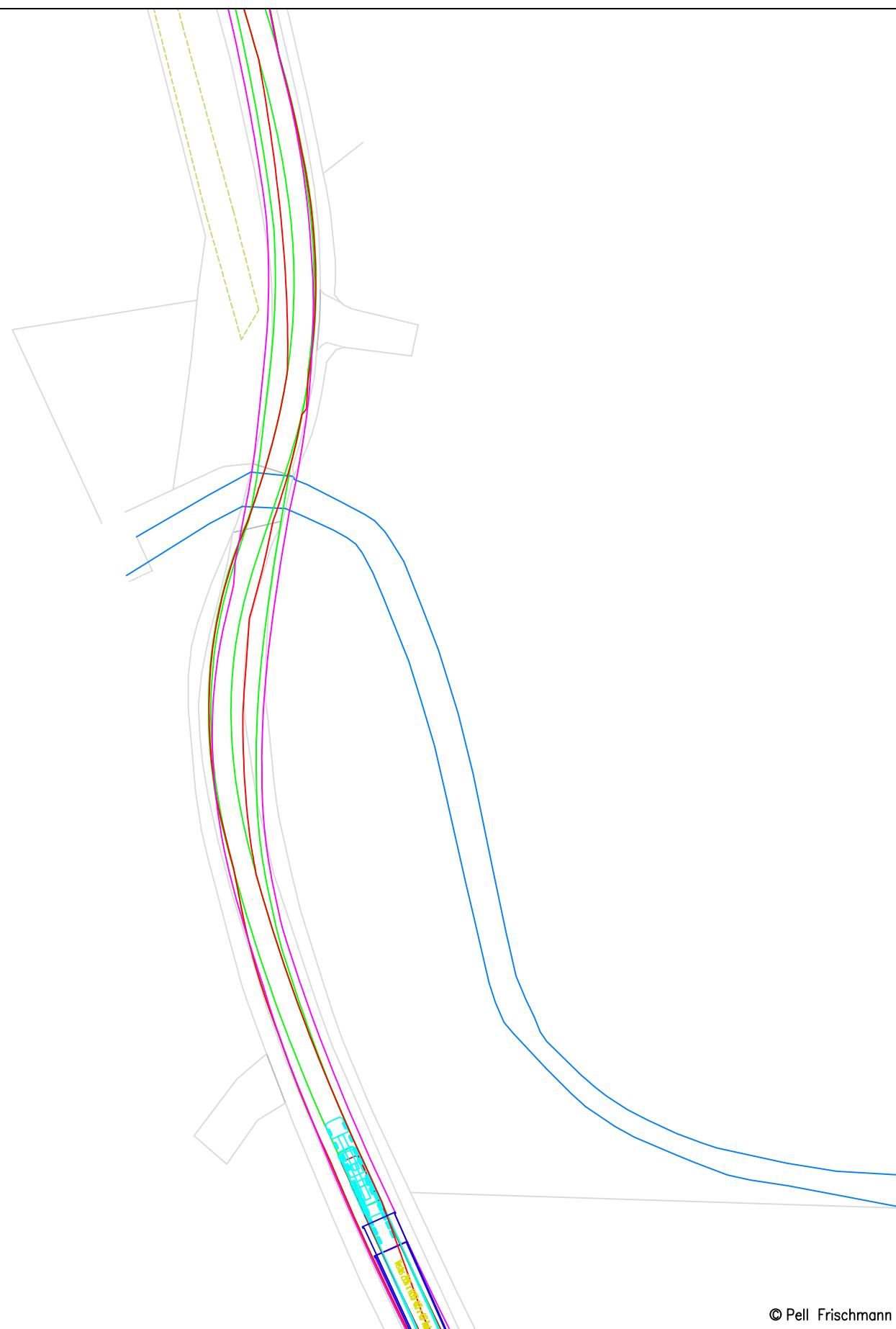
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				Designed		File No 022108 Solwaybank SPA planning.dwg			
				Checked	GB	15/10/2022	Drawing Status Draft		
Client	RES	Drawing Title	Point of Interest	40					
Key	Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Over-sail	Drawing No. SK31A	Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.	Revision XXX
		SPA Location	Auchenriock Road – South of Irvine Burn						

Blade

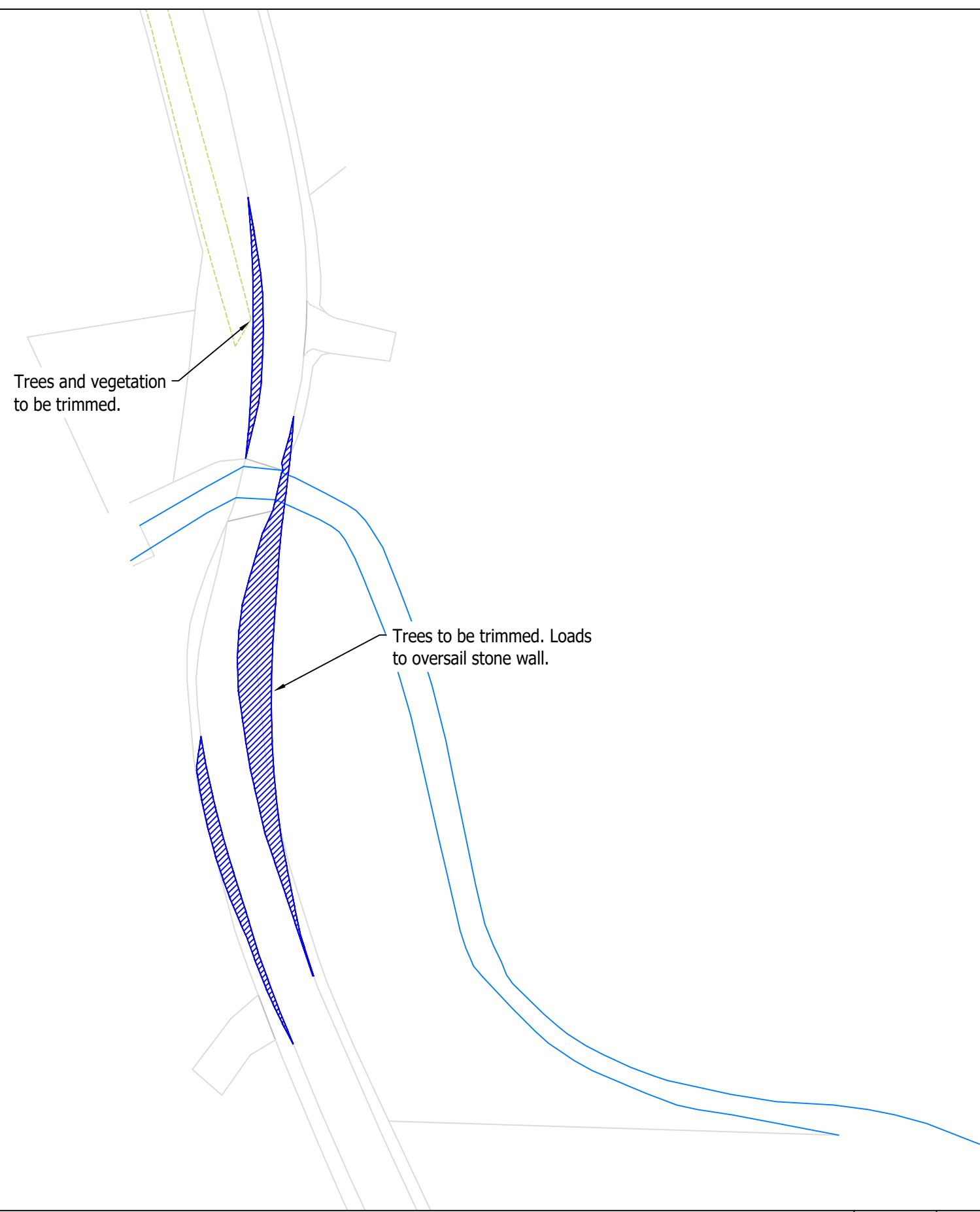


Tower



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					Drawn	SK	15/10/2022
					Designed	SK	08/10/2022
					Checked	GB	15/10/2022
				Point of Interest	41	Drawing Status	Draft
Client  RES		Drawing Title  Vestas V150 Swept Path Assessment		Drawing No.	Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		Revision
Key  Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail		SPA Location  Auchenriock Road – North of Irvine Burn		SK32			XXX



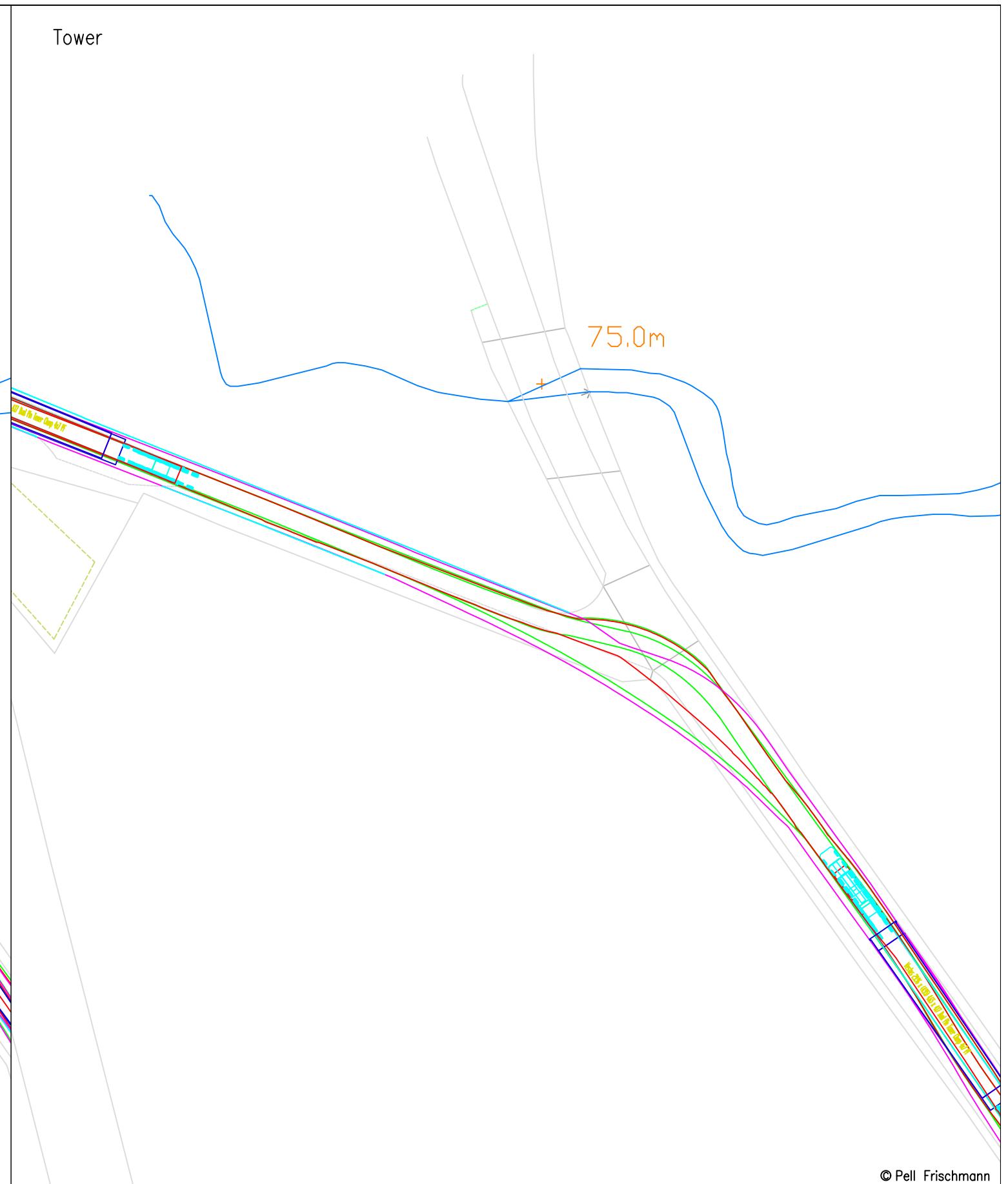
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			Drawn	SK	15/10/2022	1:750 @ A3		
		Drawing Title  Vestas V150 Swept Path Assessment	Designed	SK	08/10/2022	File No_22108 Solwaybank SPA planning.dwg		
			Checked	GB	15/10/2022	Drawing Status Draft		
Client  RES		Drawing No.	Point of Interest	41				
Key  Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail			SK32A	Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.				
SPA Location  Auchenrirock Road – North of Irvine Burn		Revision	XXX					

Blade



Tower



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				SK	15/10/2022	1:750 @ A3
		File No. 22108 Solwaybank SPA planning.dwg		Designed	SK	08/10/2022
		Checked		GB	15/10/2022	Drawing Status
		43		Drawing No.	Draft	
Client	RES	Drawing Title	Vestas V150 Swept Path Assessment	Notes:		
Key	— (red)	— (green)	— (magenta)	— (cyan)	1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.	Revision
Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	SK33	XXX
SPA Location		Auchenriock Road – South of Docken Beck				

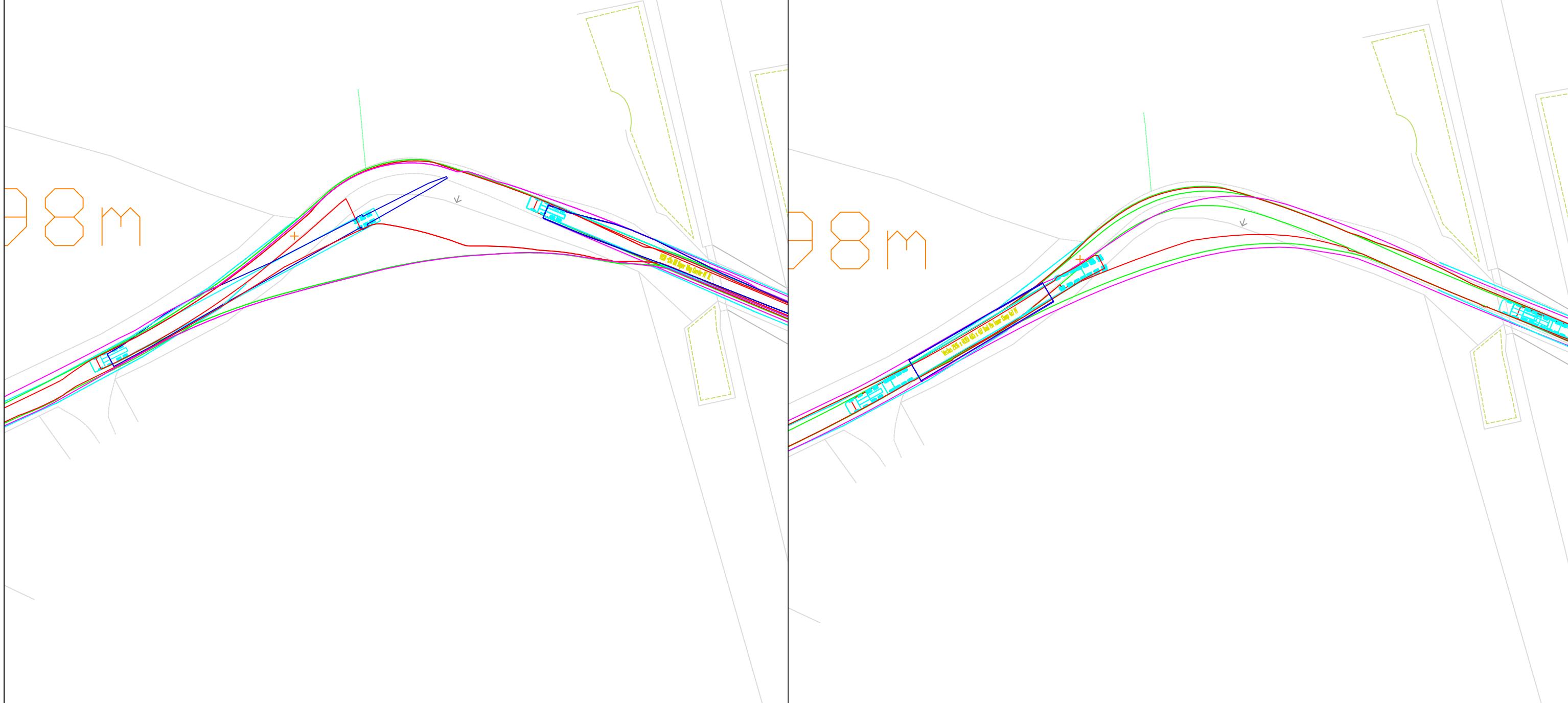


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			Drawn	SK	15/10/2022	1:750 @ A3
		Drawing Title  Vestas V150 Swept Path Assessment	Designed	SK	08/10/2022	File No_22108 Solwaybank SPA planning.dwg
			Checked	GB	15/10/2022	Drawing Status Draft
Client  RES		Drawing No.  SK33A	Point of Interest	43		
Key  Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail			Notes:	1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		
Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Over-sail	Revision XXX
SPA Location  Auchenriock Road – South of Docken Beck						

Blade

Tower



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				SK	15/10/2022		1:750 @ A3
				Designed	SK	08/10/2022	File No_22108 Solwaybank SPA planning.dwg
				Checked	GB	15/10/2022	Drawing Status
				Point of Interest		45	Draft
Client RES		Drawing Title Vestas V150 Swept Path Assessment		Drawing No.	Notes:		Revision
Key Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail		SPA Location U251A Road		SK34	1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		1



Load bearing surface to be laid. Section of fencing and one utility column to be removed. Vegetation to be trimmed.

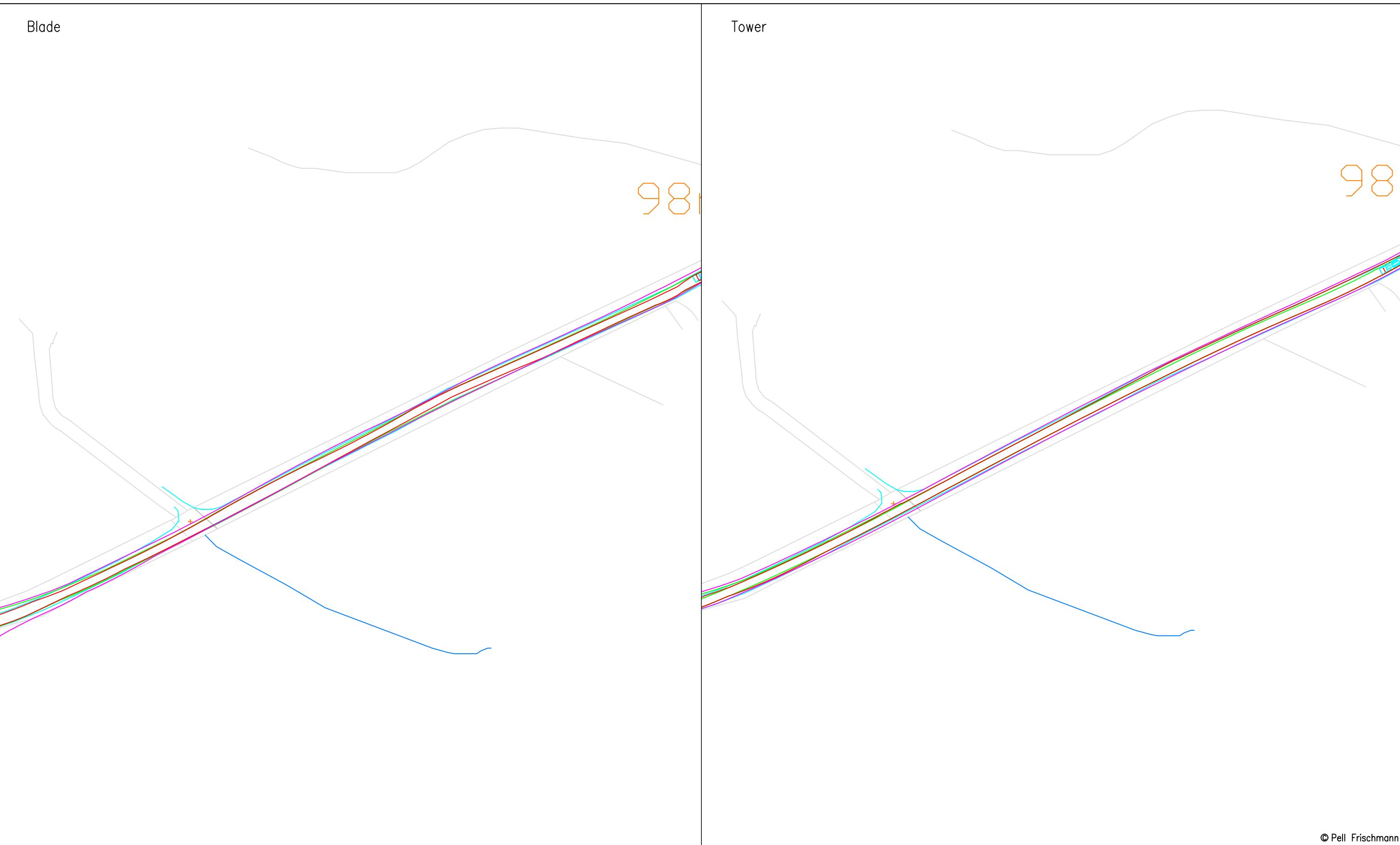
Proximity to utility posts to be confirmed during test run.

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			Drawn	SK	15/10/2022	1:500 @ A3	
		Drawing Title  Vestas V150 Swept Path Assessment	Designed	SK	08/10/2022	File No_22108 Solwaybank SPA planning.dwg	
			Checked	GB	15/10/2022	Drawing Status Draft	
Client  RES		Drawing No.  SK34A	Point of Interest	45			
Key  — Wheel SPA    — Body SPA    — Load SPA    - - - Indicative  Over-run  Over-sail			Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		Revision	1	
SPA Location  U251A Road							

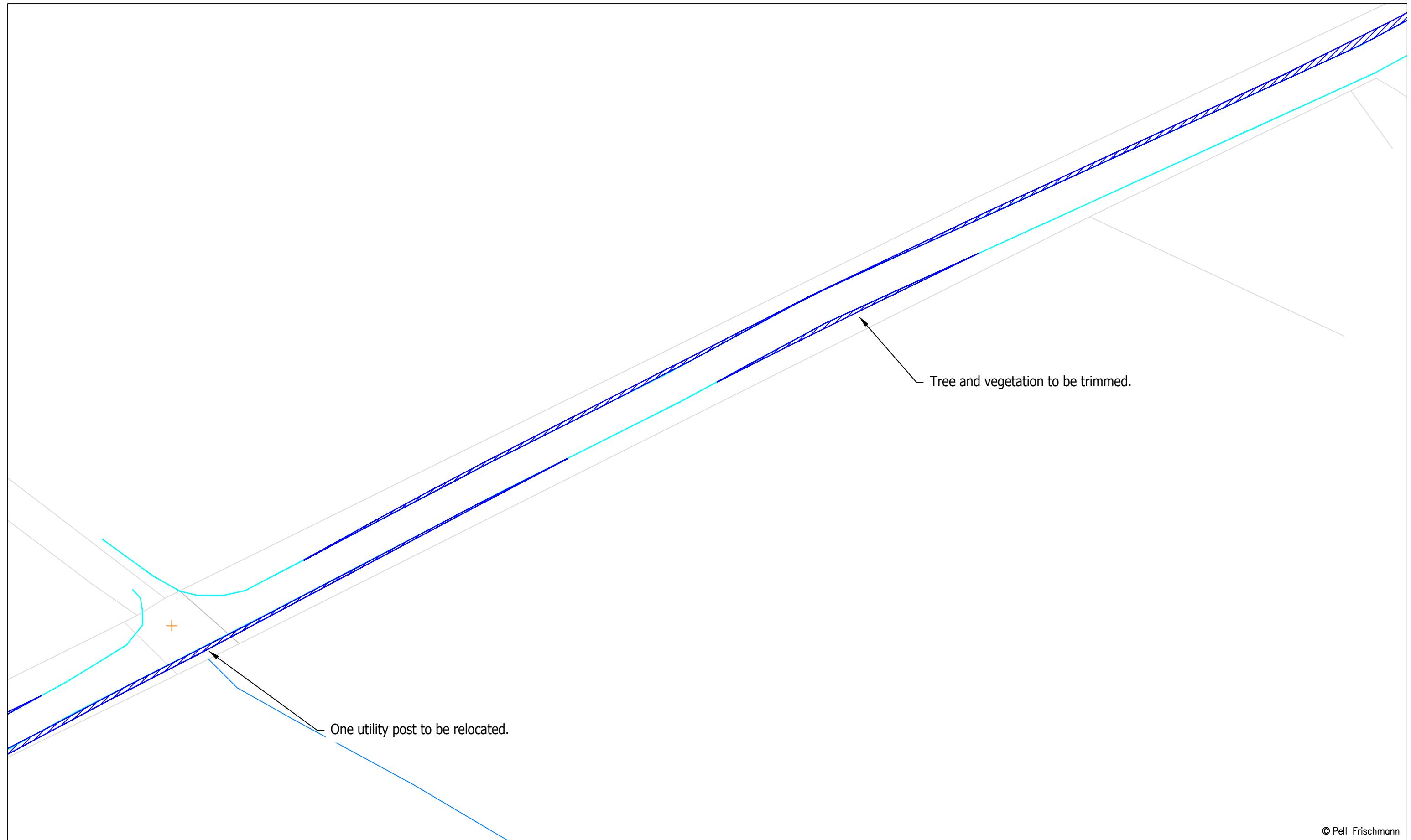
Blade

Tower



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			Drawn	SK	15/10/2022	1:1250 @ A3			
		Drawing Title  Vestas V150 Swept Path Assessment	Designed	SK	08/10/2022	File No_22108 Solwaybank SPA planning.dwg			
			Checked	GB	15/10/2022	Drawing Status Draft			
Client  RES		Drawing No.	Point of Interest	46					
Key  Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail			SK35	Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.			Revision XXX		
SPA Location  U251A Road									



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Client RES		Drawing Title  Vestas V150 Swept Path Assessment	Point of Interest 46		File No. 22108 Solwaybank SPA planning.dwg	Drawing Status Draft
Key — Wheel SPA	— Body SPA	— Load SPA	Indicative Over-run Over-sail	Drawing No. SK35A	Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.	Revision XXX
SPA Location U251A Road						

Blade

Tower

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Project

Bloch Wind Farm

Name

Date

Scale

1:750 @ A3

Drawn

SK

15/10/2022

File No.

22108 Solwaybank SPA planning.dwg

Designed

SK

08/10/2022

Checked

GB

15/10/2022

Drawing Status

Draft



Drawing Title

Vestas V150 Swept Path Assessment

Point of Interest

47

Drawing No.

Notes:

1. All mitigation is subject to confirmation through a test run.
2. This is not a construction drawing and is intended for illustration purposes only.

Revision

XXX

Client	RES	SPA Location	Old Irvine – Kerr Track Bend 1
<b>Pell Frischmann</b>			
Project			
Bloch Wind Farm			
Drawing Title			
Vestas V150 Swept Path Assessment			
SPA Location			
Old Irvine – Kerr Track Bend 1			

Load bearing surface to be laid. All street furniture, gates and fencing to be removed. Vegetation to be trimmed.

All street furniture, trees and vegetation should be removed.

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Project

Bloch Wind Farm

Name

Date

Scale  
1:500 @ A3

Drawn

SK

15/10/2022

File No  
22108 Solwaybank SPA planning.dwg

Designed

SK

08/10/2022

Checked

GB

15/10/2022

Drawing Status  
Draft

Client

RES

Drawing Title

Vestas V150 Swept Path Assessment

Point of Interest

47

Key

— Wheel SPA   — Body SPA   — Load SPA   — Indicative   — Over-run   — Over-sail

SPA Location

Old Irvine – Kerr Track Bend 1

Drawing No.

SK36A

Notes:

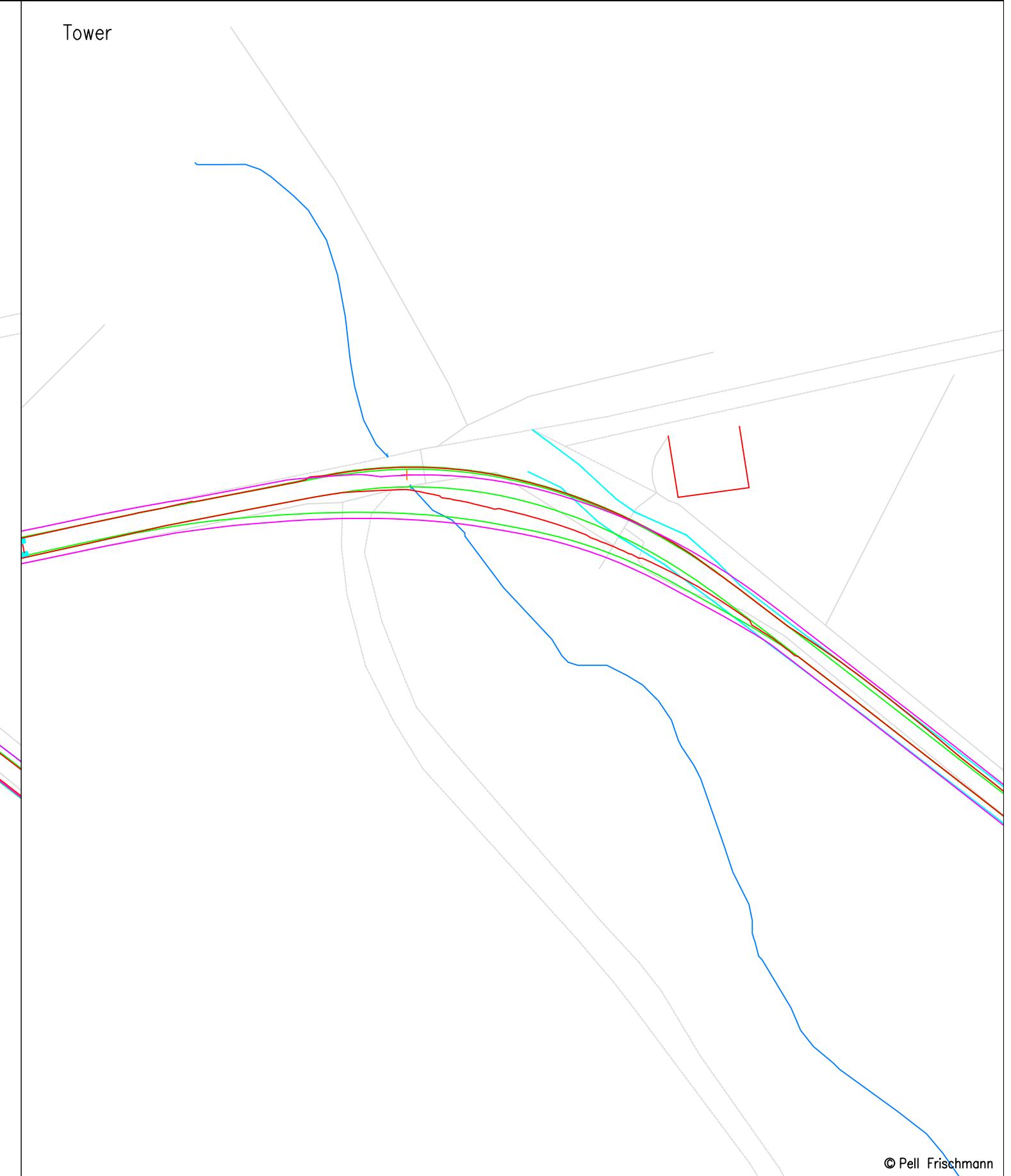
1. All mitigation is subject to confirmation through a test run.
2. This is not a construction drawing and is intended for illustration purposes only.

Revision  
XXX

Blade



Tower



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## Project

Bloch Wind Farm

## Client

RES

## Drawing Title

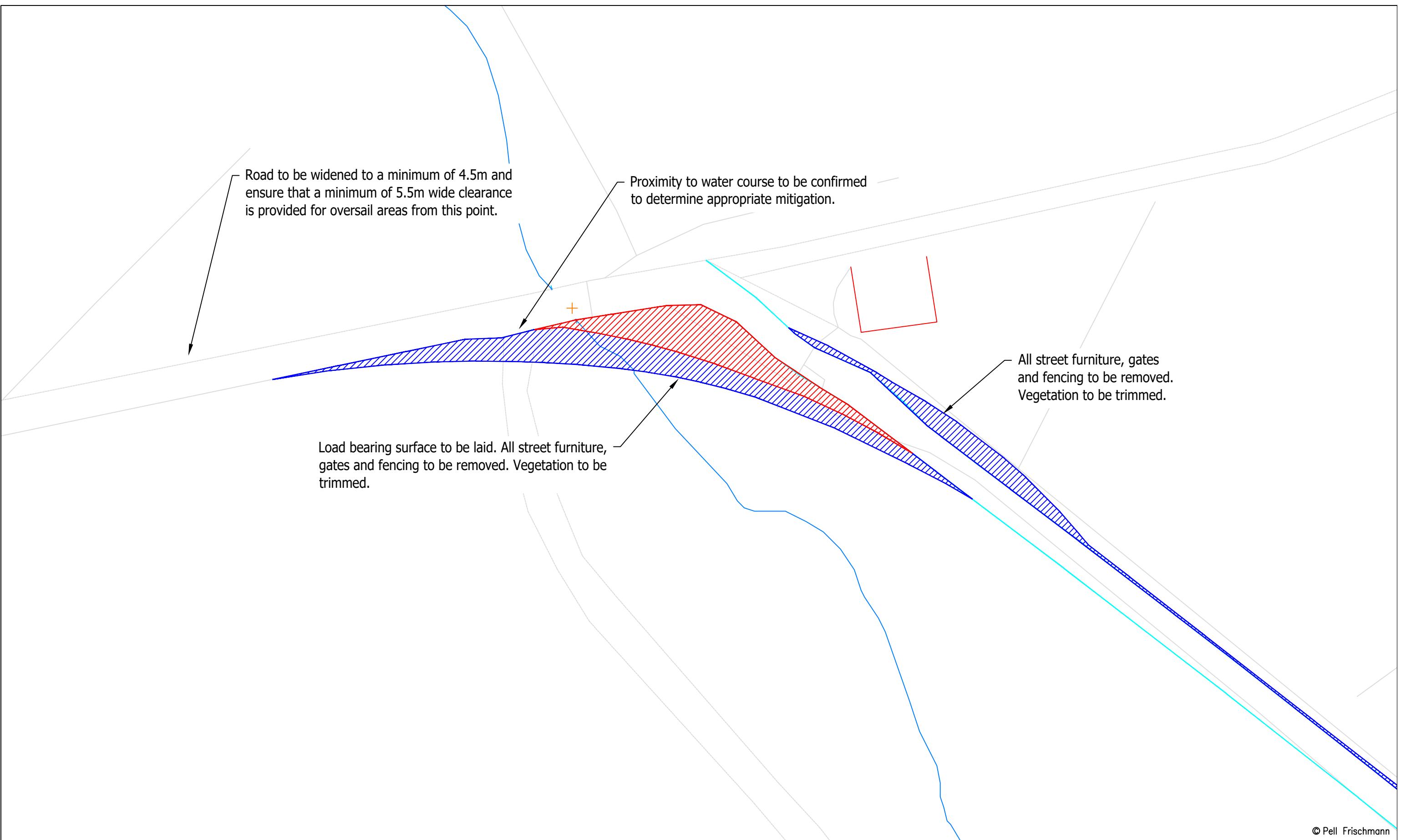
Vestas V150 Swept Path Assessment

## Key

Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Over-sail

		Name	Date	Scale
Drawn	SK	15/10/2022	1:750 @ A3	
Designed	SK	08/10/2022	File No.	22108 Solwaybank SPA planning.dwg
Checked	GB	15/10/2022	Drawing Status	Draft
		Point of Interest	48	
Drawing No.	Notes:		1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.	
SK37				
			Revision	
			XXX	

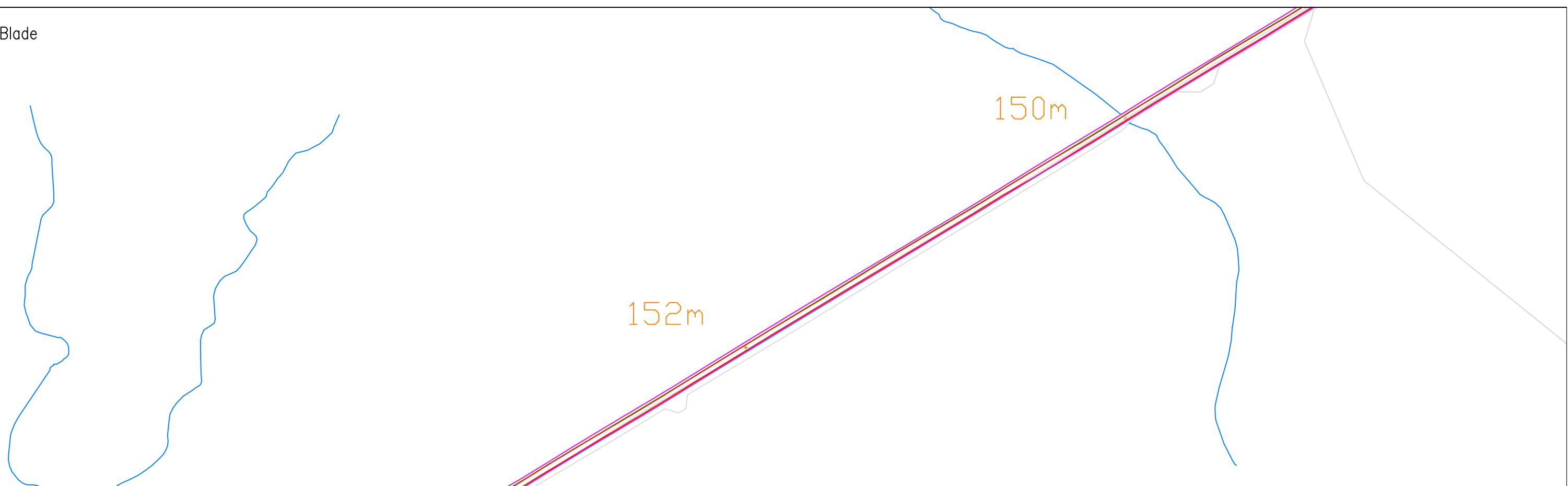
SPA Location  
Old Irvine – Kerr Track Bend 2



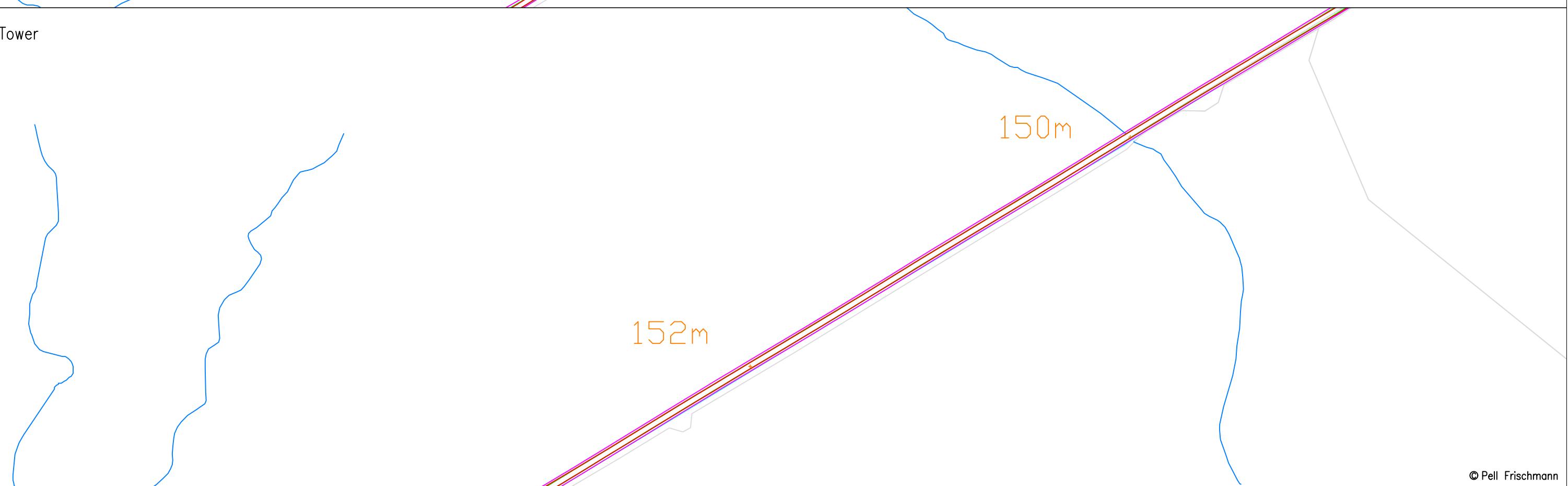
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			Drawn	SK	15/10/2022	1:500 @ A3
Client  RES		Drawing Title  Vestas V150 Swept Path Assessment	Designed	SK	08/10/2022	File No_22108 Solwaybank SPA planning.dwg
			Checked	GB	15/10/2022	Drawing Status Draft
Key  Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail		SPA Location  Old Irvine – Kerr Track Bend 2	Point of Interest	48		
			Drawing No.  SK37A	Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		Revision  XXX

Blade



Tower



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Project

Bloch Wind Farm

Drawing Title

Vestas V150 Swept Path Assessment

Client

RES

Key

Wheel SPA Body SPA Load SPA Indicative Over-run Over-sail

SPA Location

Old Irvine – Kerr Track

Name

Date

Scale  
1:2000 @ A3

Drawn

SK

15/10/2022

File No  
22108 Solwaybank SPA planning.dwg

Designed

SK

08/10/2022

Drawing Status  
Draft

Checked

GB

15/10/2022

Point of Interest

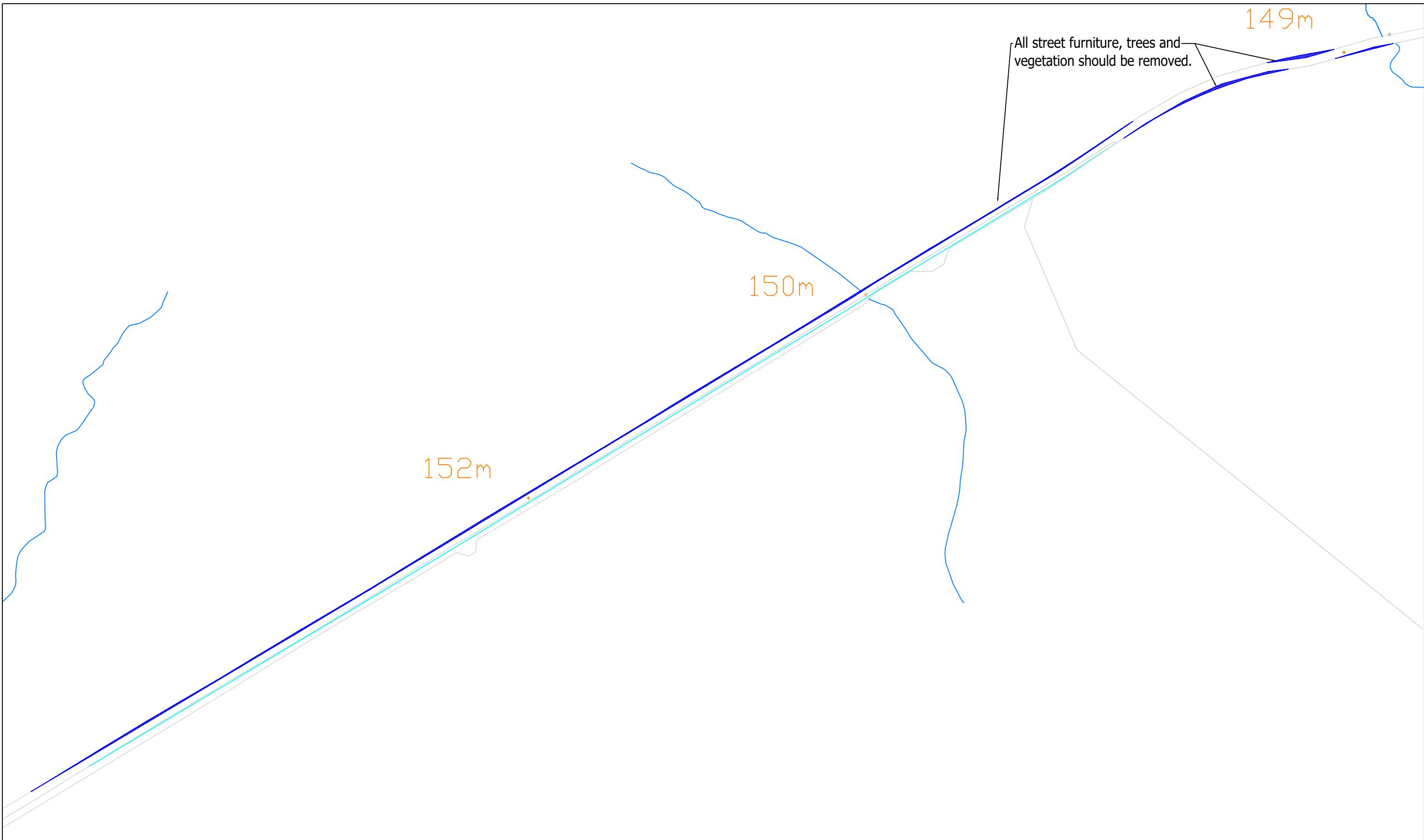
49

Drawing No.

SK38

Notes:  
1. All mitigation is subject to confirmation through a test run.  
2. This is not a construction drawing and is intended for illustration purposes only.

Revision  
XXX



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			Drawn	SK	15/10/2022	1:2000 @ A3
		Drawing Title  Vestas V150 Swept Path Assessment	Designed	SK	08/10/2022	File No_22108 Solwaybank SPA planning.dwg
			Checked	GB	15/10/2022	Drawing Status Draft
Client  RES		Drawing No.  SK38A	Point of Interest	49		
Key  Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail			Notes:	1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		
Wheel SPA	Body SPA	Load SPA	Indicative	Over-run	Over-sail	Revision XXX
SPA Location  Old Irvine – Kerr Track						

Blade

Tower

154m

1

1

GP

154m

GP

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Project

Bloch Wind Farm

Name

Date

Scale

1:750 @ A3

Drawn

SK

File No.

22108 Solwaybank SPA planning.dwg

Designed

SK

Drawing Status

Draft

Checked

GB

Notes:

1. All mitigation is subject to confirmation through a test run.

2. This is not a construction drawing and is intended for illustration purposes only.

Revision

XXX

Client

RES

Drawing Title

Vestas V150 Swept Path Assessment

Drawing No.

SK39

Key

Wheel SPA Body SPA Load SPA Indicative Over-run Over-sail

SPA Location

Old Irvine – Kerr Track / C70A Road Junction

1

Road to be widened to a minimum of 4.5m and ensure that a minimum of 5.5m wide clearance is provided for oversail areas from this point.

Load bearing surface to be laid. Section of fencing and one utility column to be removed. Vegetation to be trimmed.

154 m

G P

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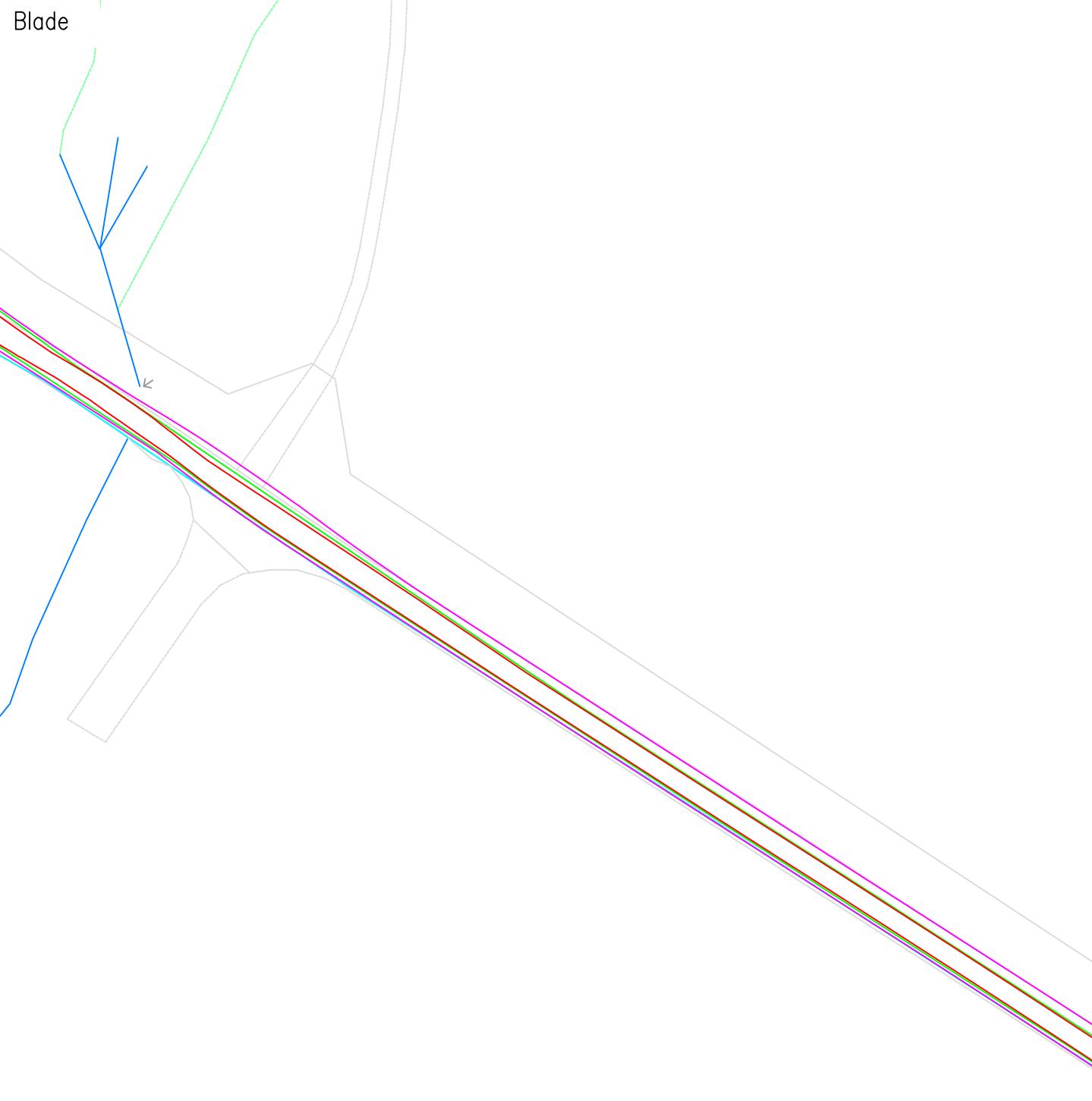
Email: pfeedinburgh@pellfrischmann.com

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### Project

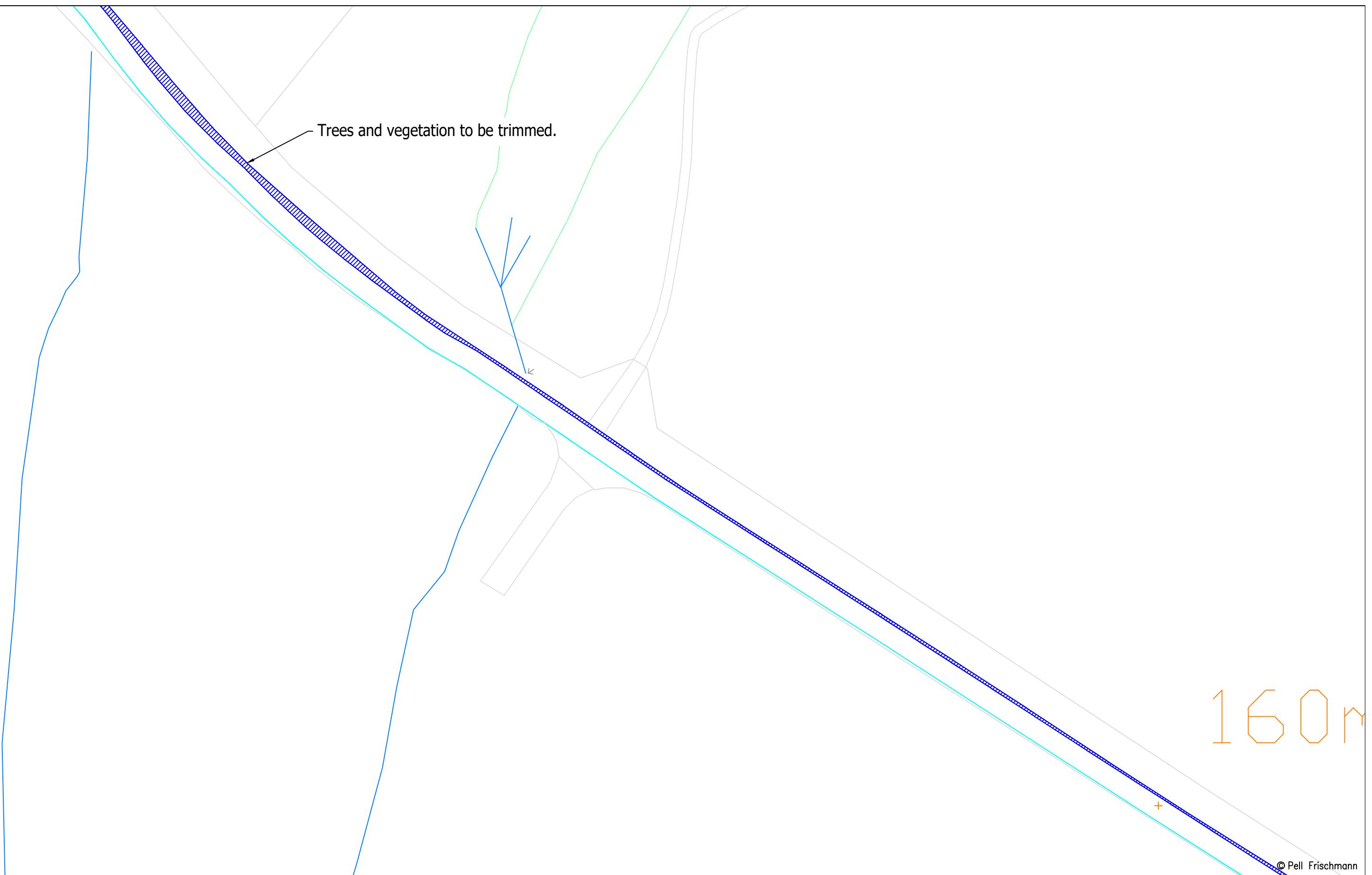
Bloch Wind Farm

			Name	Date	Scale
		Drawn	SK	15/10/2022	1:500 @ A3
		Designed	SK	08/10/2022	File No_22108 Solwaybank SPA planning.dwg
		Checked	GB	15/10/2022	Drawing Status
Client		Point of Interest		50	Draft
RES		Drawing Title			
		Vestas V150 Swept Path Assessment			
Key		SPA Location	Drawing No.	Notes:	
Wheel SPA	Body SPA	Load SPA	SPA Location	1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.	
Indicative	Over-run	Over-sail	SK39A		
				Revision	
				XXX	



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			Drawn	SK	15/10/2022	Custom @ A3
		Drawing Title  Vestas V150 Swept Path Assessment	Designed	SK	08/10/2022	File No_22108 Solwaybank SPA planning.dwg
			Checked	GB	15/10/2022	Drawing Status Draft
Client  RES		Drawing No.  SK40	Point of Interest	51		
Key  Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail			Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.			Revision XXX
SPA Location  C70A						



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Project

Bloch Wind Farm

Drawing Title

Vestas V150 Swept Path Assessment

Client

RES

Key

— Wheel SPA   — Body SPA   — Load SPA   — Indicative   — Over-run   — Over-sail

SPA Location

C70A

Name

Date

Scale  
1:750 @ A3

Drawn

SK

File No  
22108 Solwaybank SPA planning.dwg

Designed

SK

08/10/2022

Checked

GB

15/10/2022

Point of Interest

51

Drawing Status  
Draft

Drawing No.

SK40A

Notes:  
1. All mitigation is subject to confirmation through a test run.  
2. This is not a construction drawing and is intended for illustration purposes only.

Revision  
XXX

Blade

Tower

170m

170m

C C

C C

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## Project

Bloch Wind Farm

Name	Date	Scale
SK	15/10/2022	Custom @ A3

File No 22108 Solwaybank SPA planning.dwg

Drawn	Designed	Checked	Drawing Status
SK	08/10/2022	15/10/2022	Draft

Point of Interest	52	Notes:
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Drawing No.	SK41	Revision
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1. All mitigation is subject to confirmation through a test run.	
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2. This is not a construction drawing and is intended for illustration purposes only.	
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XXX

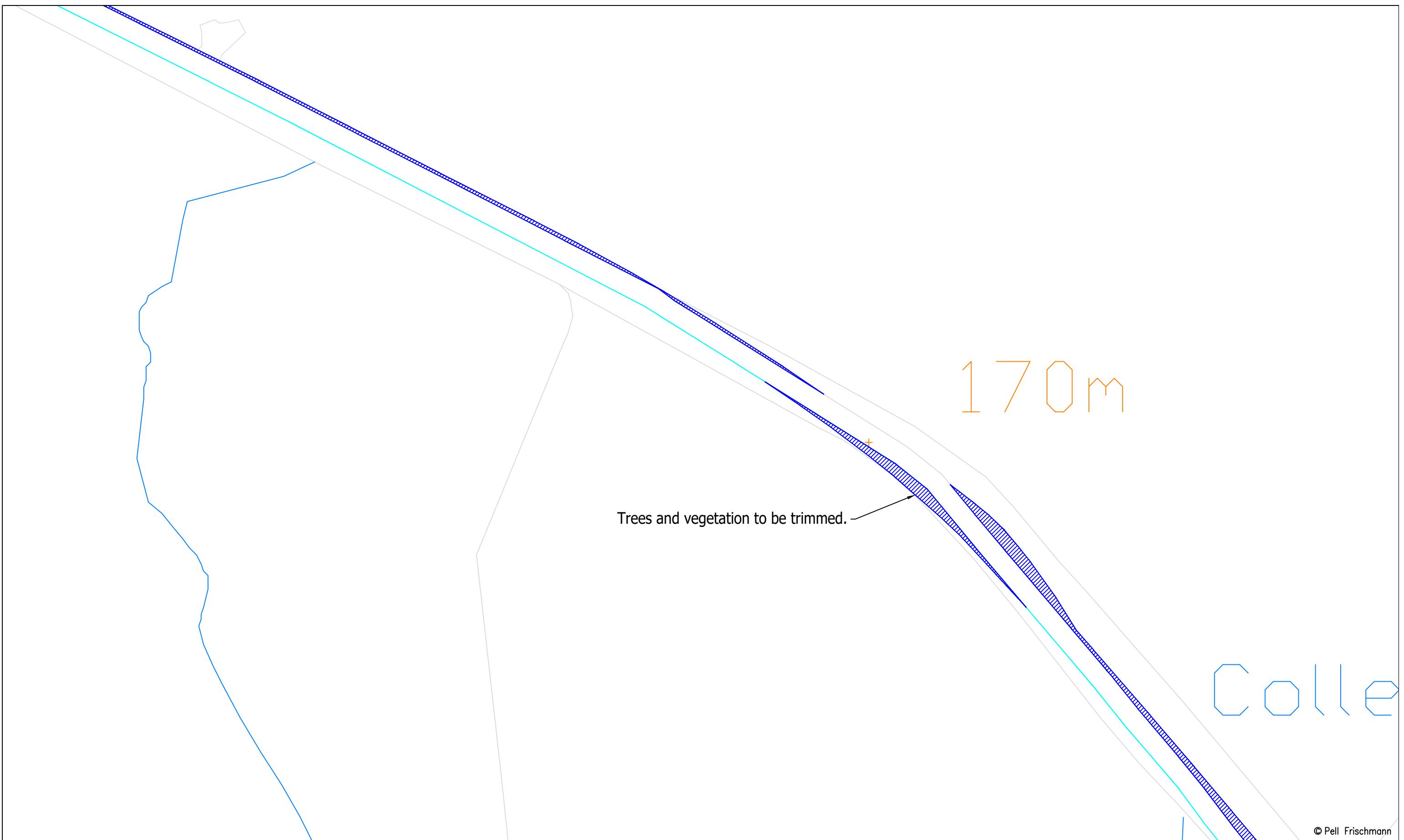
**Client** RES  
**Key** ——— Wheel SPA   ——— Body SPA   ——— Load SPA   ——— Indicative   ——— Over-run   ——— Over-sail

## Drawing Title

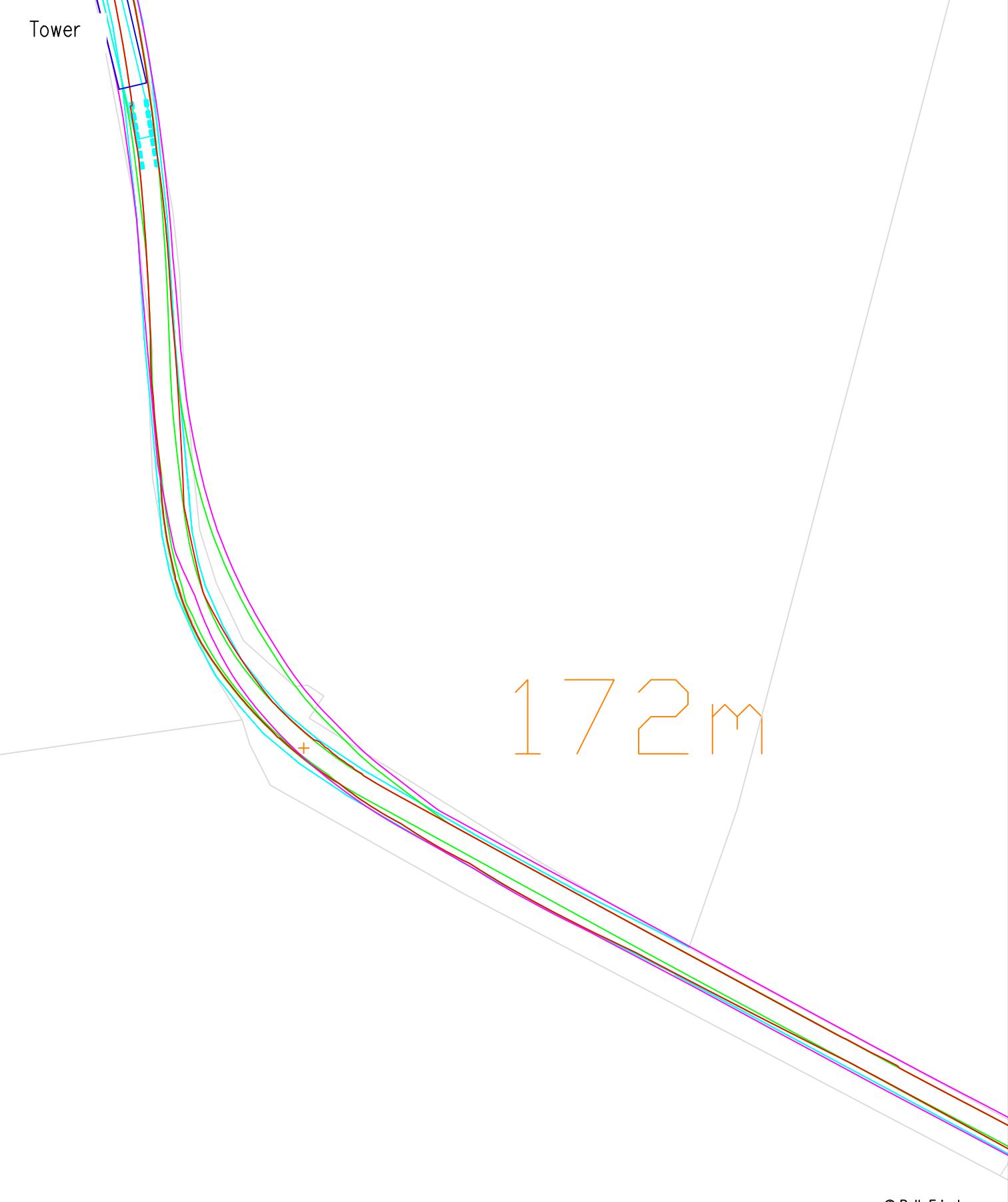
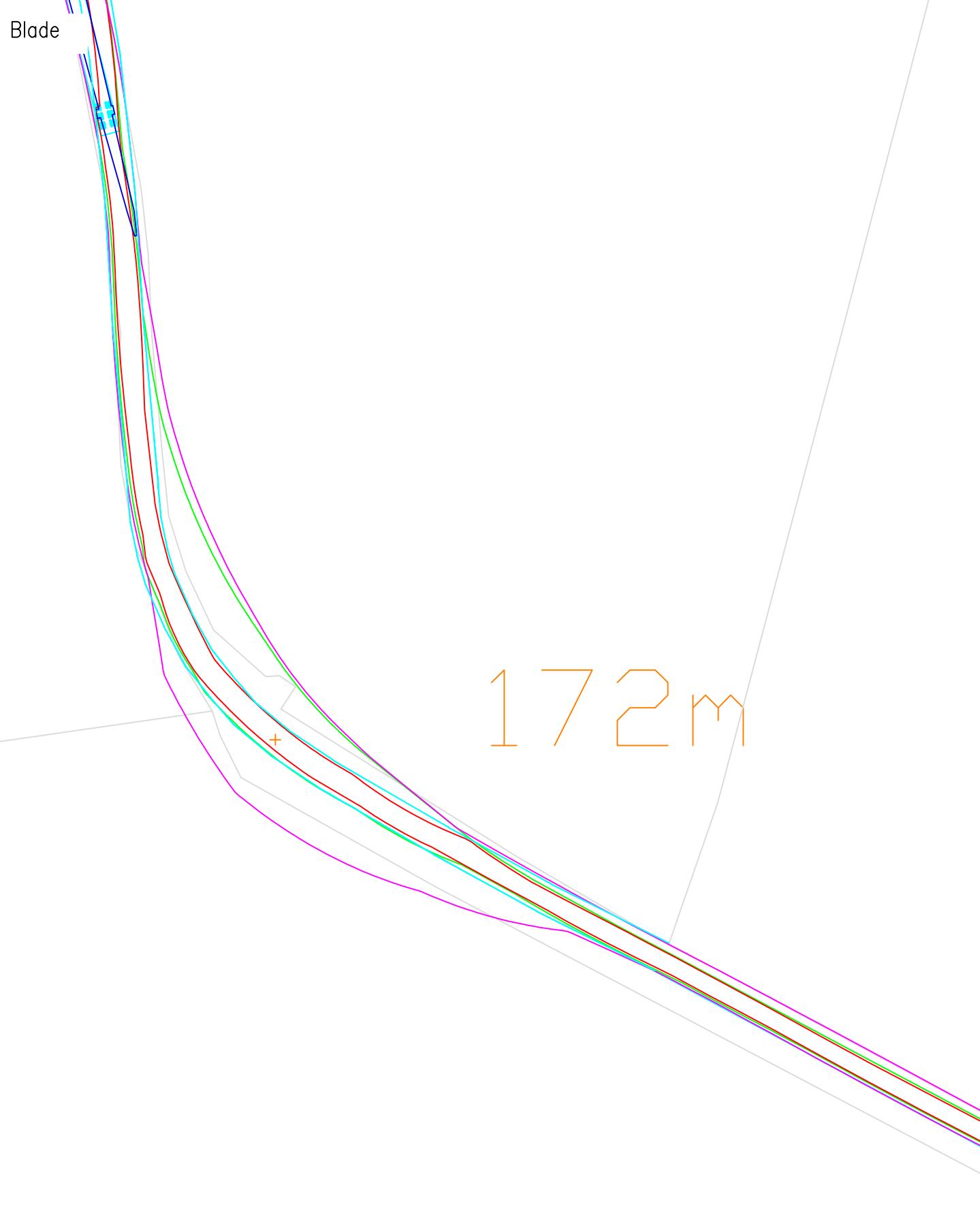
Vestas V150 Swept Path Assessment

## SPA Location

C70A Bend 2



<b>Pell Frischmann</b> 93 GEORGE STREET, EDINBURGH, EH2 3ES Tel: +44 (0)131 240 1270 Email: pfedinburgh@pellfrischmann.com www.pellfrischmann.com		Project  Bloch Wind Farm		Name	Date	Scale	
			Drawn	SK	15/10/2022	1:750 @ A3	
		Drawing Title  Vestas V150 Swept Path Assessment	Designed	SK	08/10/2022	File No_22108 Solwaybank SPA planning.dwg	
			Checked	GB	15/10/2022	Drawing Status Draft	
Client  RES		Drawing No.  SK41A	Point of Interest	52			
Key  Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail			Notes: 1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.			Revision XXX	
SPA Location  Old Irvine – Kerr Track Bend 2							



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			Drawn	SK	15/10/2022	Custom @ A3
		Drawing Title  Vestas V150 Swept Path Assessment	Designed	SK	08/10/2022	File No_22108 Solwaybank SPA planning.dwg
			Checked	GB	15/10/2022	Drawing Status Draft
Client  RES		Drawing No.  SK42	Point of Interest	53		
Key  Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail			Notes:	1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.		
SPA Location  C70A near Site Accesses						Revision  XXX

Gates and fencing to be removed.

1 1721

- One road sign and cattle grid gate to be removed. Trees and vegetation to be trimmed.

The image shows two octagons side-by-side. The left octagon is drawn with a solid brown line. The right octagon is also drawn with a brown line, but it is dashed. Both octagons have rounded corners.

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<b>Pell Frischmann</b> 93 GEORGE STREET, EDINBURGH, EH2 3ES  Tel: +44 (0)131 240 1270 Email: pfedinburgh@pellfrischmann.com www.pellfrischmann.com	Project  Bloch Wind Farm		Name	Date	Scale
		Drawn	SK	15/10/2022	1:750 @ A3
		Designed	SK	08/10/2022	File No. 22108 Solwaybank SPA planning.dwg
		Checked	GB	15/10/2022	Drawing Status
Client	RES	Drawing Title	Point of Interest	53	Draft
Key	Wheel SPA    Body SPA    Load SPA    Indicative    Over-run    Over-sail	Vestas V150 Swept Path Assessment	Drawing No.	Notes:	Revision
		SPA Location	SK42A	1. All mitigation is subject to confirmation through a test run. 2. This is not a construction drawing and is intended for illustration purposes only.	XXX
		C70A near Site Accesses			

## Appendix C ESDAL Responses