



**GILLINGHAM STRATEGIC SITE ALLOCATION,  
NORTH DOREST**

**TRANSPORT ASSESSMENT  
VOLUME 5: APPENDICES N-Y**

**Client: South Gillingham Consortium**



**i-Transport**

**TRANSPORT ASSESSMENT**

**VOLUME 5: APPENDICES N-Y**

**GILLINGHAM STRATEGIC SITE ALLOCATION,  
NORTH DORSET**

**Client: South Gillingham Consortium**

i-Transport LLP  
Grove House  
Lutyens Close  
Chineham Court  
Basingstoke  
Hampshire  
RG24 8AG  
Tel: 01256 338640  
Fax: 01256 338644  
[www.i-transport.co.uk](http://www.i-transport.co.uk)

i-Transport Ref: BT/RH/EF/ITB4057-202 R

Date: 1 November 2017

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## QUALITY MANAGEMENT

| Report No.    | Comments | Date     | Author   | Authorised |
|---------------|----------|----------|----------|------------|
| ITB4057-202 R |          | 01/11/17 | BT/RH/EF | BT         |

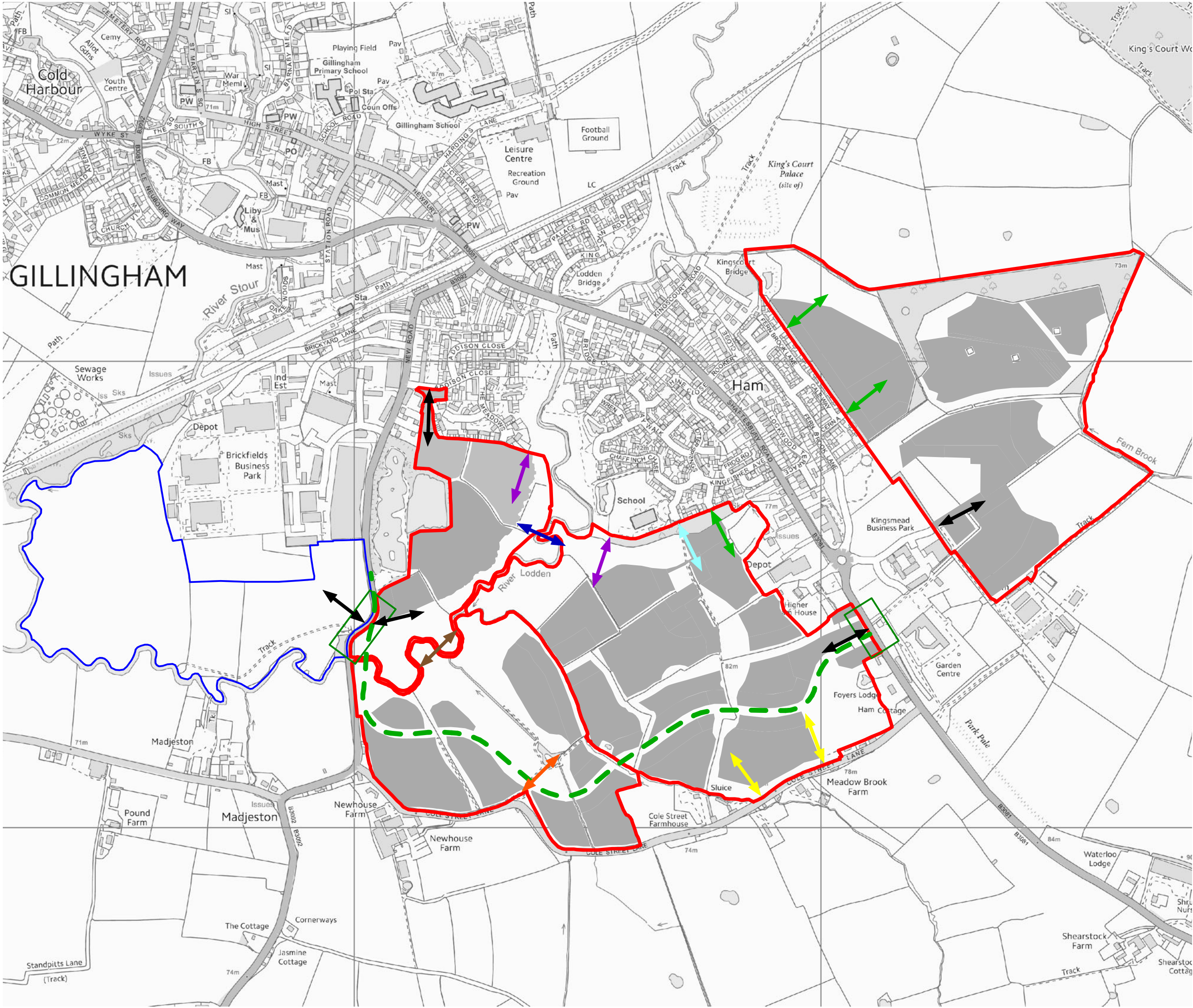
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## **APPENDICES**

|                   |                                                                                      |
|-------------------|--------------------------------------------------------------------------------------|
| <b>APPENDIX N</b> | <b>MOVEMENT AND ACCESS PARAMETER PLAN</b>                                            |
| <b>APPENDIX O</b> | <b>STAGE 1 ROAD SAFETY AUDITS – SITE ACCESS ARRANGEMENTS</b>                         |
| <b>APPENDIX P</b> | <b>VEHICLE SWEPT PATH ANALYSIS – SITE ACCESS ARRANGEMENTS</b>                        |
| <b>APPENDIX Q</b> | <b>NATIONAL TRAVEL SURVEY EXTRACT</b>                                                |
| <b>APPENDIX R</b> | <b>NON-MOTORISED USER AUDIT</b>                                                      |
| <b>APPENDIX S</b> | <b>DEVELOPMENT PROPOSAL – TRICS DATA</b>                                             |
| <b>APPENDIX T</b> | <b>DEVELOPMENT PROPOSAL – TRAFFIC GENERATION</b>                                     |
| <b>APPENDIX U</b> | <b>DEVELOPMENT PROPOSAL – TRAFFIC DISTRIBUTION</b>                                   |
| <b>APPENDIX V</b> | <b>GILLINGHAM S-PARAMICS TRAFFIC MODEL – DEVELOPMENT<br/>IMPACT TESTING REPORT</b>   |
| <b>APPENDIX W</b> | <b>STAGE 1 ROAD SAFETY AUDITS – OFF-SITE HIGHWAY<br/>IMPROVEMENTS</b>                |
| <b>APPENDIX X</b> | <b>IVY CROSS ROUNDABOUT – POTENTIAL IMPROVEMENT SCHEME</b>                           |
| <b>APPENDIX Y</b> | <b>JUNCTIONS 9 OUTPUTS – IVY CROSS ROUNDABOUT – POTENTIAL<br/>IMPROVEMENT SCHEME</b> |

## **APPENDIX N**

## **Movement And Access Parameter Plan**



- Key
- Site Boundary
  - Additional employment land
  - Proposed site access (all Modes)
  - Proposed site access - all modes (serving limited number of dwellings only)
  - Principal street corridor (Subject to centre line deviation limits +/- 20m)
  - Proposed pedestrian / cycle only access
  - Indicative area for new junction
  - Indicative location of low-key upgrade to existing public pedestrian bridge over River Lodden
  - Proposed pedestrian / cycle link to Cole Street lane via existing public right of way
  - Indicative pedestrian / cycle access to Cole Street Lane
  - Indicative location for potential pedestrian / cycle access to footpath along Lodden Valley
  - Potential new pedestrian / cycle bridge over the River Lodden

Notes/Revisions

**South Gillingham**  
South Gillingham Consortium

**Access**

|                        |                                |
|------------------------|--------------------------------|
| 220703/URB/ACC/SSA/001 | Revision:                      |
|                        | Date issued:<br>Jan 2017       |
| 1:5000@A3              | Drawn by: IP<br>Checked by: RB |

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**Terence O'Rourke**  
Planning | Design | Environment

London  
3 Whitcomb Street London WC2H 7HA  
Bournemouth  
Everdene House Deansleigh Road Bournemouth BH7 7DU  
020 3664 6755 enquiries@torltd.co.uk www.torltd.co.uk

## **APPENDIX O**

### **Stage 1 Road Safety Audits – Site Access Arrangements**

**GILLINGHAM**  
**STRATEGIC SITE ALLOCATION**  
**NORTH DORSET**

**PROPOSED ACCESS ARRANGEMENTS**

**STAGE 1 ROAD SAFETY AUDIT**

**JULY 2017**

# GM TRAFFIC CONSULTANTS

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| Revision Status      | Prepared by:<br>(Name) | Checked by:<br>(Name) | Approved by:<br>(Signature)                                                        | Date Approved: |
|----------------------|------------------------|-----------------------|------------------------------------------------------------------------------------|----------------|
| A                    | Mark Barrett           | Ian Medd              |  | 4 July 2017    |
| Designer's Response  |                        |                       |                                                                                    |                |
| Authority's Response |                        |                       |                                                                                    |                |
| Audit Response       |                        |                       |                                                                                    |                |

**Client:**  
**I Transport**

**Engineer:**  
**GM**  
**Traffic Consultants Ltd**  
33 Riverside Gardens  
Romsey  
SO51 8HN

Date: 4 July 2017

**TABLE OF CONTENTS**

|     |                                             |   |
|-----|---------------------------------------------|---|
| 1.0 | INTRODUCTION .....                          | 3 |
| 2.0 | ITEMS CONSIDERED .....                      | 5 |
| 3.0 | MATTERS ARISING FROM THIS STAGE 1 RSA ..... | 6 |
| 4.0 | AUDITOR STATEMENT .....                     | 8 |

|                   |                                  |
|-------------------|----------------------------------|
| <b>APPENDIX A</b> | Location Plans                   |
| <b>APPENDIX B</b> | Designers Response               |
| <b>APPENDIX C</b> | Local Highway Authority Response |

## **1.0 INTRODUCTION**

### **1.1 General**

- 1.1.1 This report results from a Stage 1 Road Safety Audit (RSA) carried out on the highway works associated with the Gillingham Strategic Site Allocation (SSA) in North Dorset.
- 1.1.2 The proposed sustainable mixed-use development will expand the built-up area of the town to the south and east and will comprise about 1,800 homes, a local centre, and primary school provision.
- 1.1.3 The RSA 1 focuses on the access arrangements to the development.
- 1.1.4 The RSA was carried out at the request of i-Transport.
- 1.1.5 GM Traffic Consultants Ltd carried out the Audit between 27<sup>th</sup> June and 4<sup>th</sup> July 2017. The Auditors were:  
  
Mark Barrett Highways England Cert. of Comp  
Ian Medd MCIHT FSoRSA
- 1.1.6 The Audit Team are independent of the project design team and have also carried out a Stage 1 RSA relating to the off-site works relating to this project. They have had no other involvement with the design.
- 1.1.7 The report has been prepared in accordance with the Design Manual for Roads and Bridges (DMRB) Highways Directive (HD) 19/15.
- 1.1.8 Whilst reference is made to certain design standards, where safety may be compromised by a reduction in standard, this report is not intended to provide a design check. The Auditors have only reported on matters that might have an adverse effect on road safety in the context of the chosen design. No attempt has been made to comment on the justification of the scheme or the appropriateness of the design. Consequently, the Auditors accept no responsibility for the design or construction of the scheme.
- 1.1.9 The Audit consisted of a desktop study and a site visit, which was carried out on Wednesday 28<sup>th</sup> June 2017 between 10:30 and 13:00. Traffic flows were light to moderate and weather cloudy with intermittent showers.
- 1.1.10 The recommendations in this report are aimed at addressing the road safety problems; however there may be other alternative acceptable ways to overcome a specific problem, when other practical issues are considered. The recommendations contained herein do not absolve the Designer of his/her responsibilities.
- 1.1.11 The Auditors would be pleased to discuss the acceptability of alternative solutions to problems identified during the Audit, and would encourage the Designer to consult them on this matter.
- 1.1.12 The LHA response to the RSA should be formally recorded and reported to the Designer and the RSA Team so that a record of the Audit process is contained in

the *As Built* design pack to be provided and retained by the LHA on final completion.

## 2.0 ITEMS CONSIDERED

2.1 The Road Safety Audit was undertaken on the scheme detailed in the following documentation.

| Drawing No.          | Rev | Title                                                                                                     |
|----------------------|-----|-----------------------------------------------------------------------------------------------------------|
| MG/BT/ITB4057-116 TN | -   | Road Safety Brief                                                                                         |
| ITB4057-GA-1000      | A   | Proposed Site Access Arrangements Key Plan                                                                |
| ITB4057-GA-070       | F   | Principal Street: Proposed Alignment                                                                      |
| ITB4057-GA-073       | B   | Signalised Junction on The B3081 Shaftesbury Road to The South of The Existing Park Farm Roundabout       |
| ITB4057-GA-076       | -   | Extension of The Eastern Arm of The Existing Park Farm Roundabout                                         |
| ITB4057-GA-077       | -   | Extension of Woodpecker Meadow                                                                            |
| ITB4057-GA-079       | -   | Eastern End of Cerne Avenue / Cale Way Junction                                                           |
| ITB4057-GA-080       | -   | Eastern End of Trent Square / Fern Brook Lane Junction                                                    |
| ITB4057-GA-082       | A   | New Access from The B3092 New Road to South of Lodden Lakes                                               |
| ITB4057-GA-083       | A   | Proposed Roundabout on B3092 New Road to Serve Extended Brickfields Business Park and Lodden Lakes Parcel |

2.2 The Audit Team has not been informed of any Departures from Standard.

### **3.0 MATTERS ARISING FROM THIS STAGE 1 RSA**

#### **3.1 ITB4057-GA-073 – Signalised Junction on B3081 Shaftesbury Road to the south of the existing Park Farm Roundabout**

##### **3.1.1 PROBLEM**

LOCATION: B3081 northbound approach

SUMMARY: Misleading alignment on approach to the signals

The proposed alignment for vehicles travelling north on the B3081 creates a sudden deviation and chicane effect which may lead to loss of control type collisions particularly when traffic is approaching a green signal in free flow conditions

##### **RECOMMENDATION**

Provide a smooth alignment for this approach to the traffic signals.

##### **3.1.2 PROBLEM**

LOCATION: B3081 southbound approach at bus stop

SUMMARY: Stationary buses force traffic into oncoming vehicles

The location of the bus stop on the inside of the bend on the approach to the traffic signals restricts forward visibility for drivers attempting to pass a stationary bus, increasing the risk of collision with oncoming vehicles. Forward visibility to a stationary bus and any resultant queues may be restricted by the carriageway alignment increasing the risk of tail-end shunts.

##### **RECOMMENDATION**

Relocate the bus stop to a point where vehicles may pass without encroaching into the opposing carriageway and have adequate forward visibility to a stationary bus.

#### **3.2 ITB4057-GA-076 – Extension of the eastern arm of the existing Park Farm Roundabout**

3.2.1 No issues have been raised.

#### **3.3 ITB4057-GA-077 – Extension of Woodpecker Meadow**

3.3.1 No issues have been raised.

#### **3.4 ITB4057-GA-079 – Eastern End of Cerne Avenue / Cale Way junction**

3.4.1 No issues have been raised.

#### **3.5 ITB4057-GA-080 – Eastern end of Trent Square / Fern Brook**

3.5.1 No issues have been raised.

**3.6 ITB4057-GA-082–New access from the B3092 New Road to south of Lodden Lakes**

3.6.1 No issues have been raised.

**3.7 ITB4057-GA-083 – Proposed Roundabout on B3092 New Road to serve extended Brickfields Business Park and Lodden Lakes Parcel**

**3.7.1 PROBLEM**

LOCATION: Shared footway/cycleway

SUMMARY: No hazard paving

The absence of hazard paving to highlight the footway status to pedestrians and cyclists may result in cyclists continuing to ride on the footway which is not designated as shared. This may lead to collisions between cyclists and pedestrians.

**RECOMMENDATION**

Provide hazard paving and appropriate signing to highlight the start/termination of the shared facility.

**4.0 AUDITOR STATEMENT**

4.1 I certify that this audit has been carried out in compliance with HD 19/15.

**AUDIT TEAM LEADER**

Mark Barrett

**GM Traffic Consultants Ltd**



**Signed:** .....

TEL: 07787 158 834

**AUDIT TEAM MEMBER**

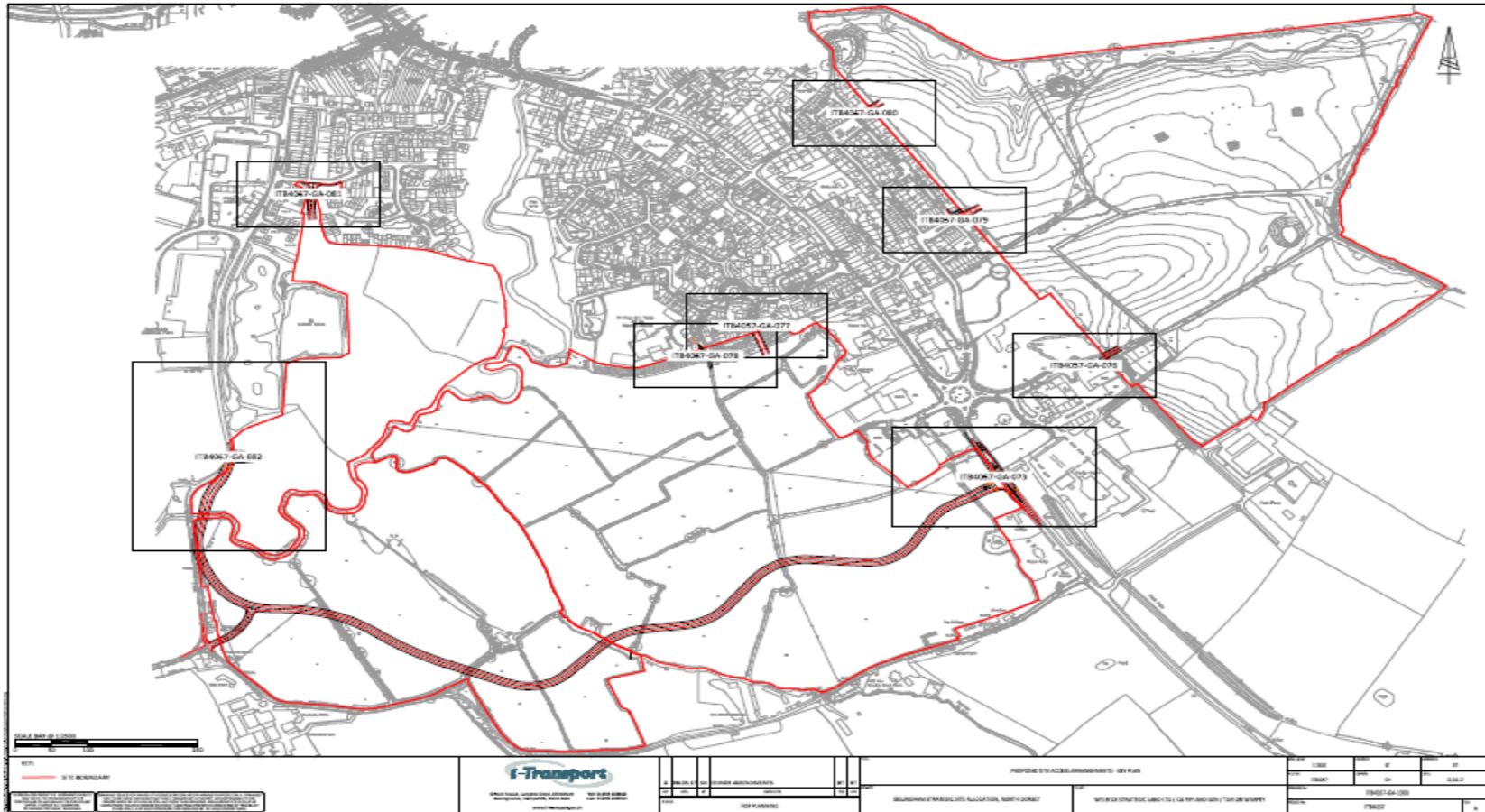
Ian Medd

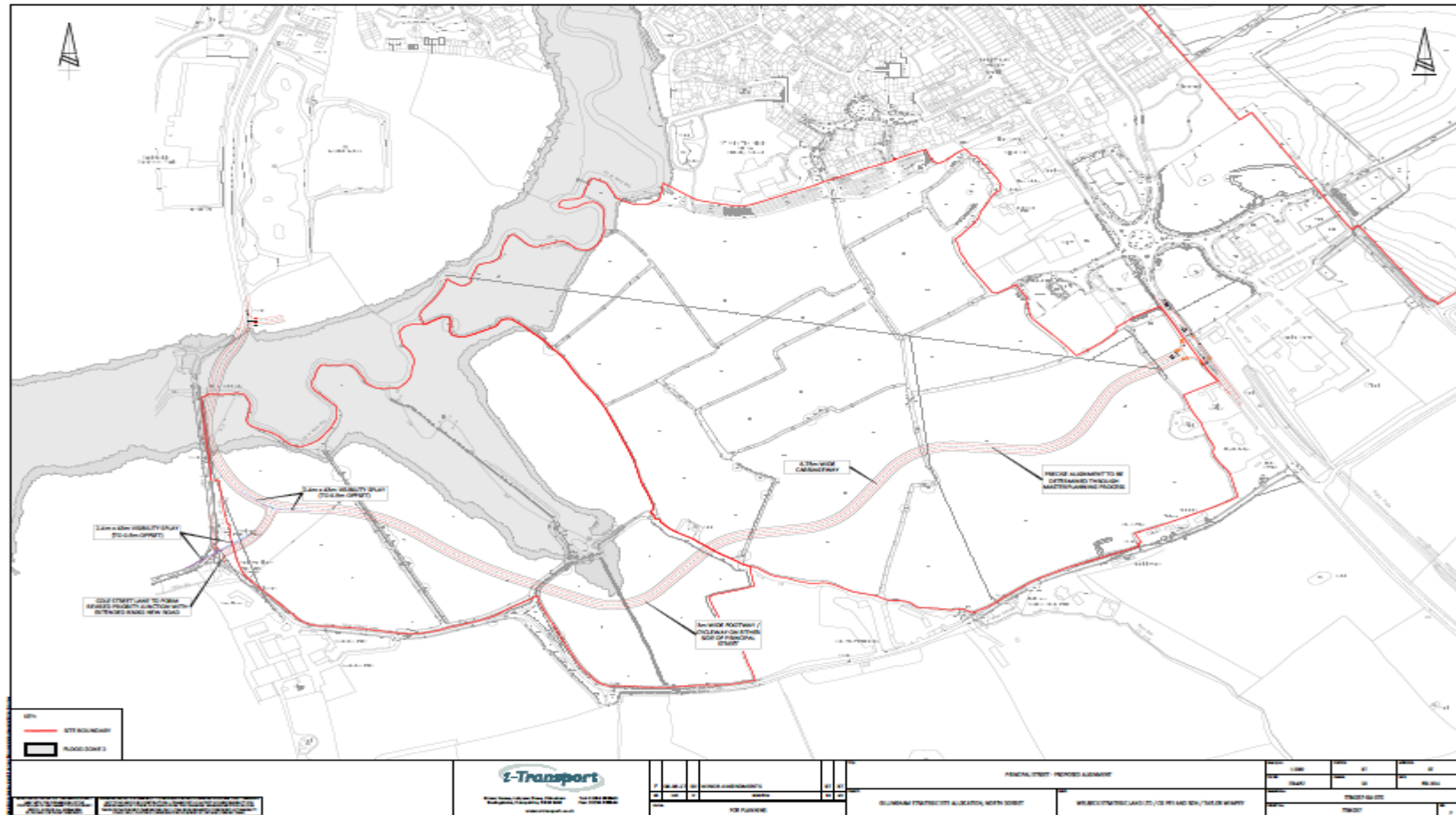


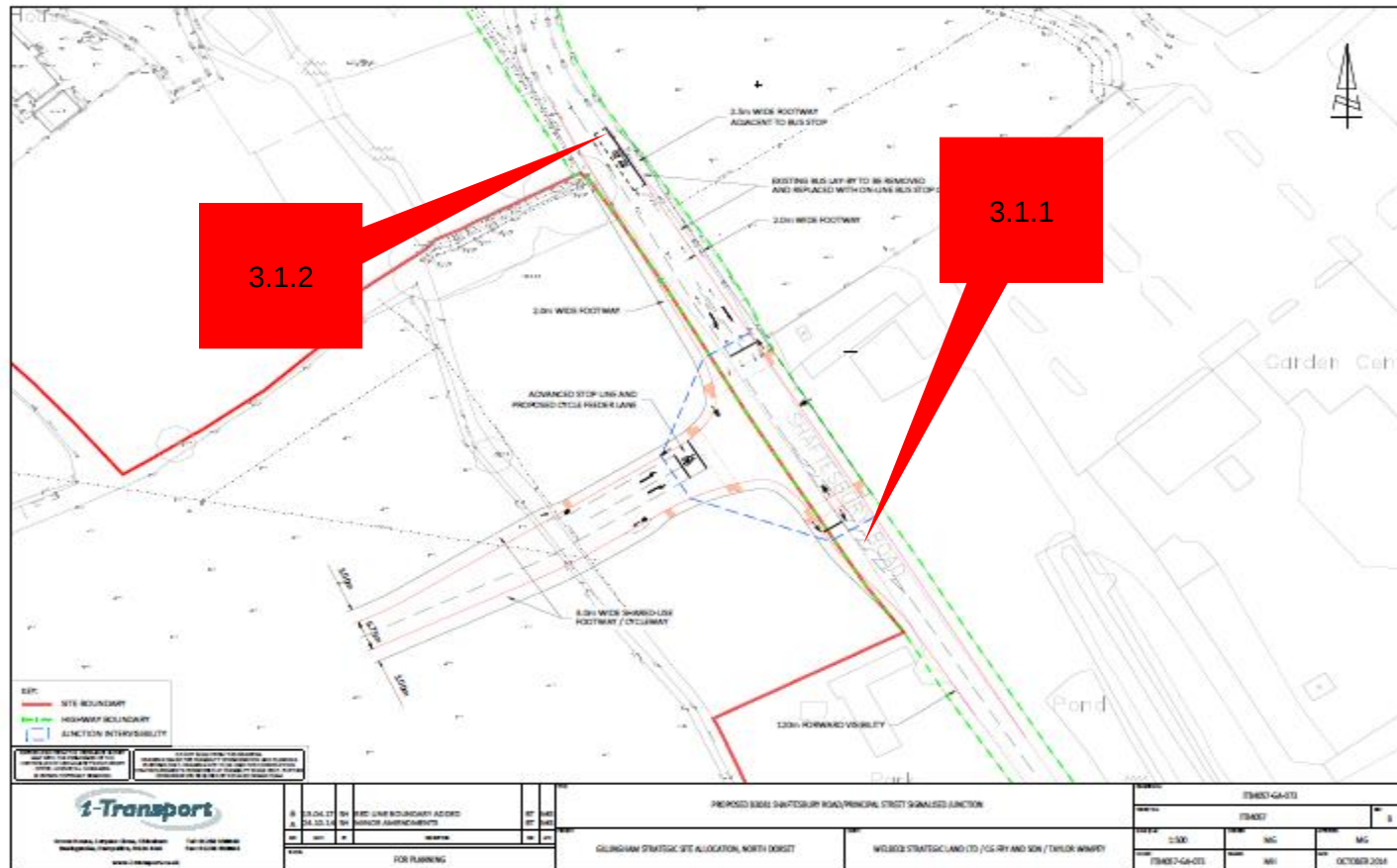
**Signed:** ...

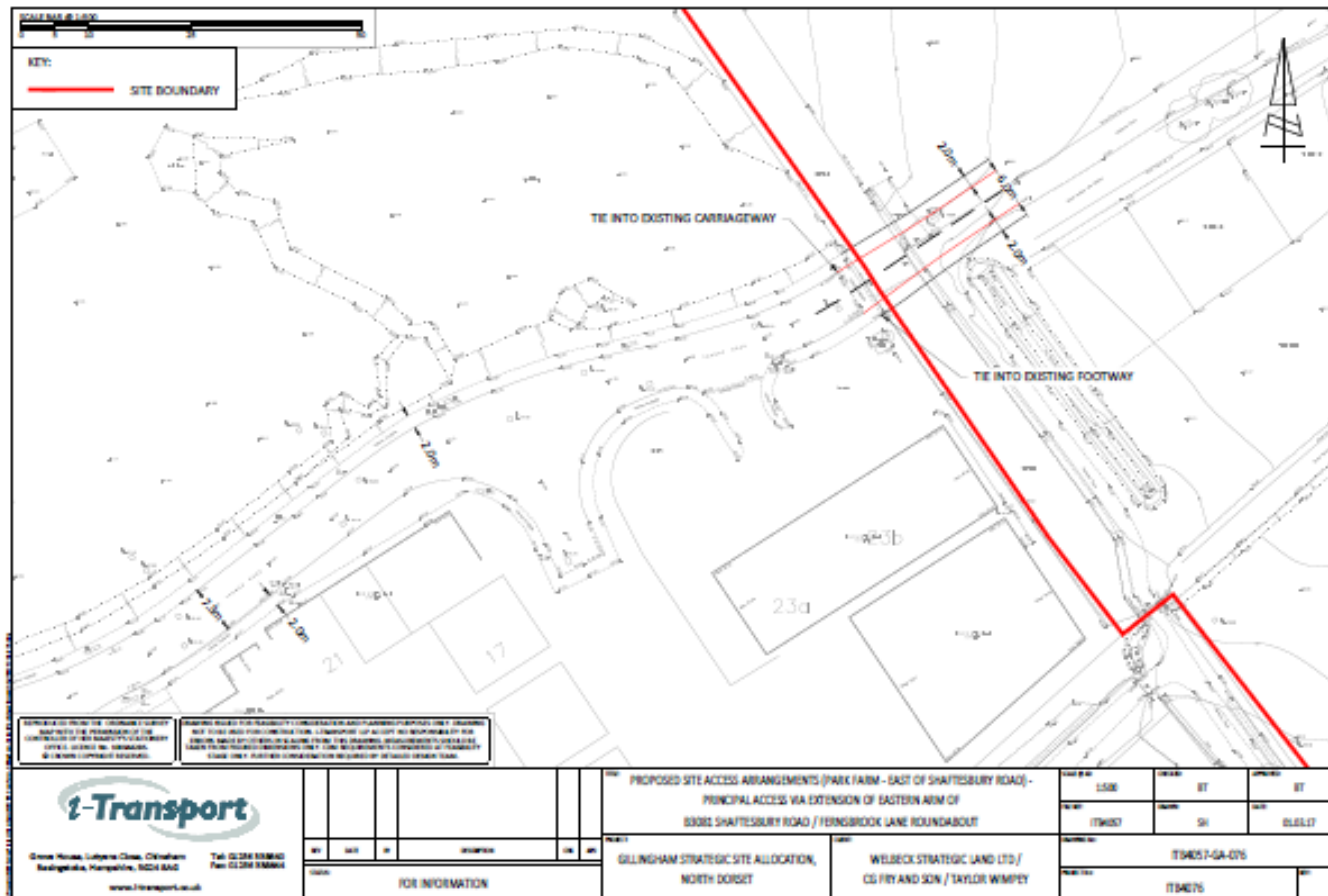
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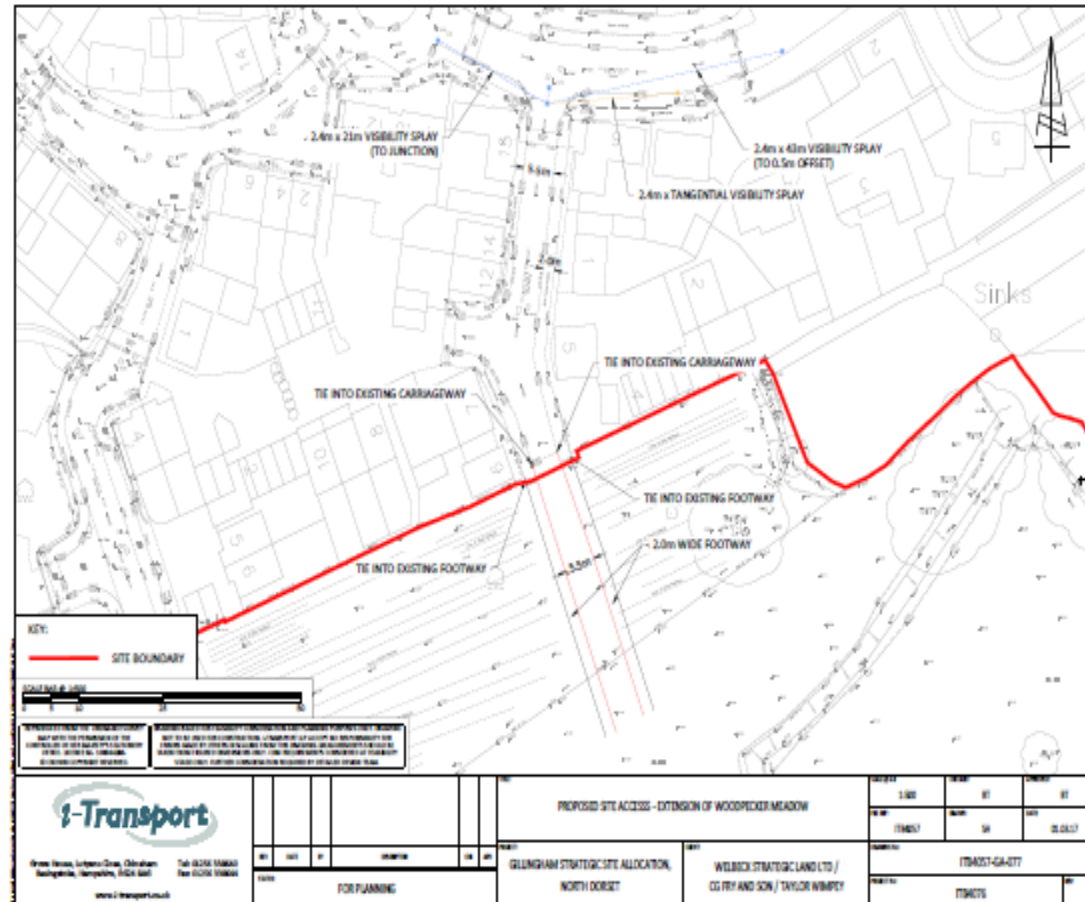
## APPENDIX A: LOCATION PLANS

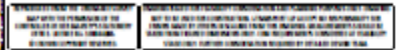


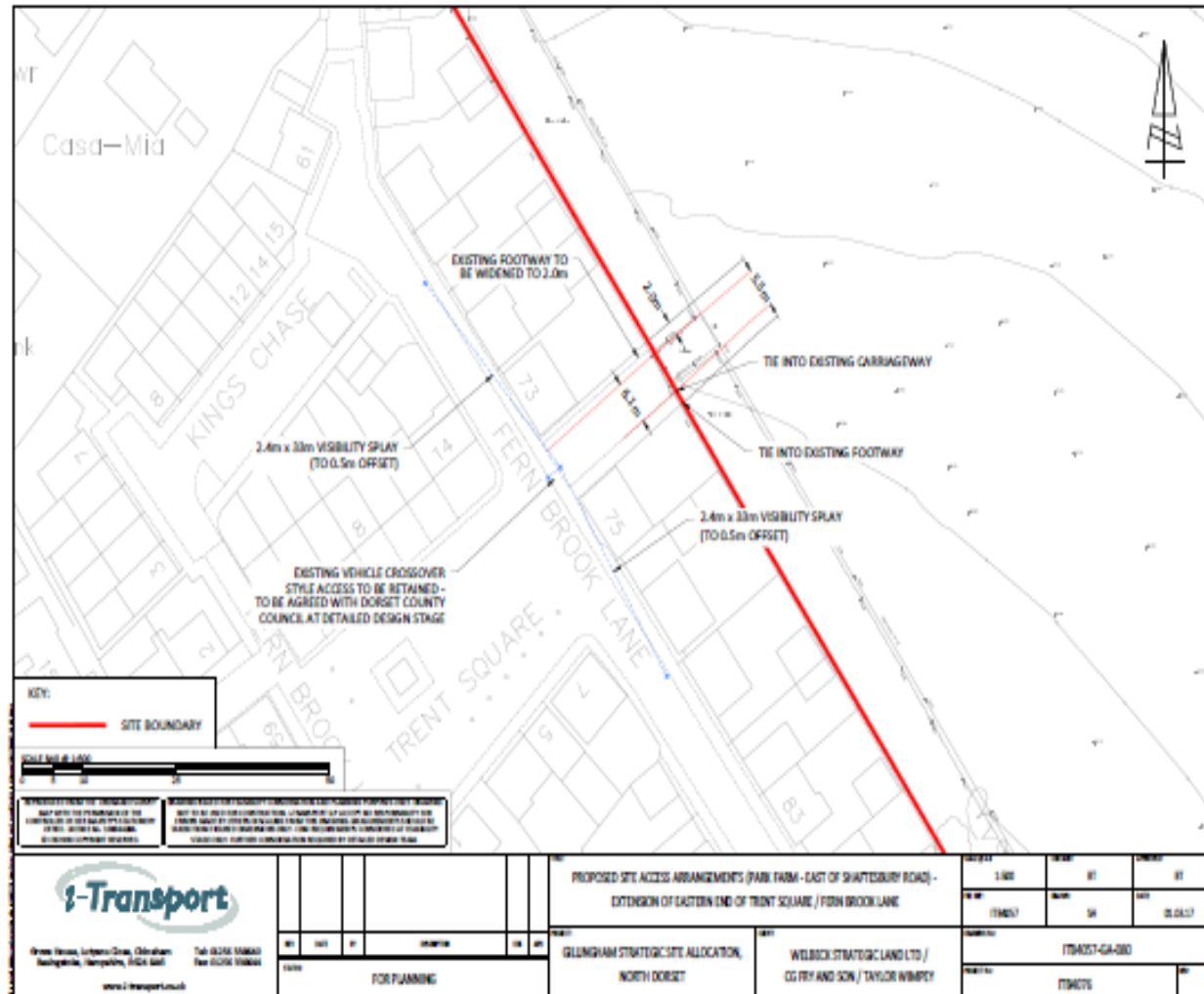


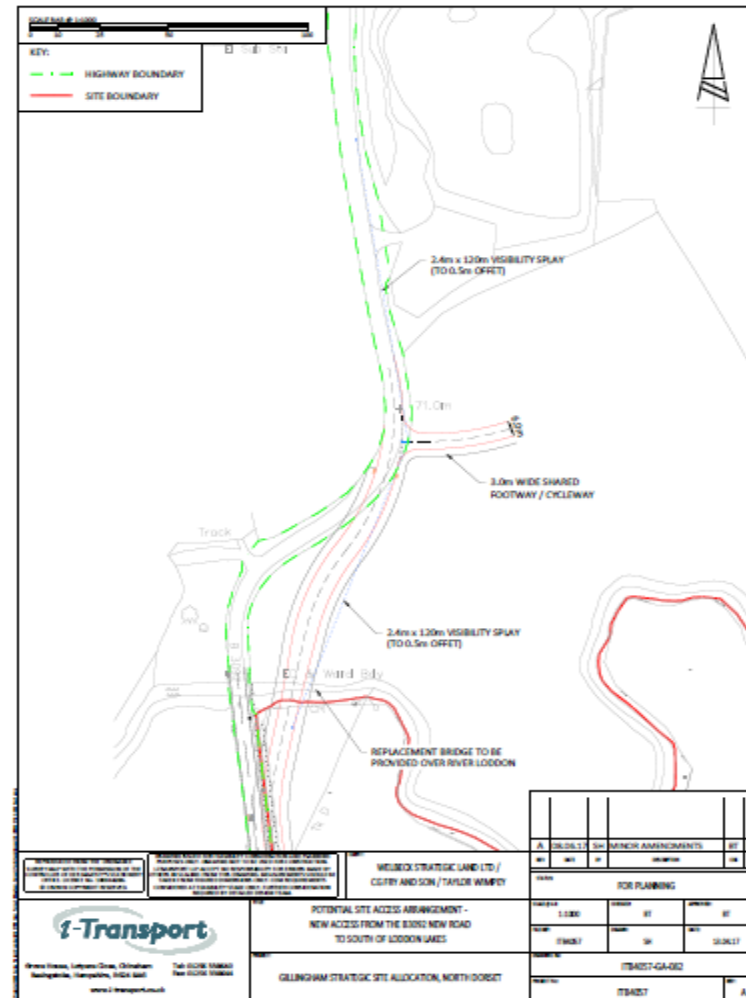














## APPENDIX B: DESIGNERS RESPONSE

Auditors: Mark Barrett (Team Leader) and Ian Medd (Team Member)

Scheme: Gillingham Strategic Site Allocation, North Dorset - Proposed Access Arrangements

Date Audit Completed: 4 July 2017

This response is to a Stage 1 Road Safety Audit to the design standard detailed within HD19/15 of Volume 5, Section 2, Part 2, of the Design Manual for Roads and Bridges, as detailed by the Highways Agency.

| Problem no.<br>in safety<br>audit report | Problem<br>accepted<br>(yes/no) | Recommended<br>measure accepted<br>(yes/no) | Alternative measure (detail description)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
|------------------------------------------|---------------------------------|---------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 3.1.1                                    | Yes                             | Yes                                         | <p>The bus stop has been relocated to a point where vehicles can pass without encroaching into the opposing carriageway – there is a 3.0m space between the bus stop markings and central white line marking.</p> <p>There is a forward visibility of 49m to the back of bus at the bus stop, which is suitable for vehicle speeds of 33mph. Southbound vehicles will have just negotiated the existing Park Farm Roundabout and are unlikely to be travelling greater than 33mph after exiting the roundabout. Appropriate signage can also be provided to inform approach motorists of the presence of an on-carriageway bus stop.</p> |
| 3.1.2                                    | Yes                             | Yes                                         |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
| 3.7.1                                    | Yes                             | Yes                                         |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |

**APPENDIX C: LOCAL HIGHWAY AUTHORITY RESPONSE**

**Principal Engineer's Statement:**

**Road Safety Audit for Gillingham Strategic Site Allocation, North Dorset**

**Proposed Access Arrangements**

I certify that I have considered the items that have arisen in the Stage 1 Road Safety Audit Report and I am content to accept all of its recommendations except for the ones listed above. I have stated my reasons for not accepting them and I seek the Chief Engineer's endorsement of my proposals.

..... Date.....

Principal Engineer

**Chief Engineer's Decision:**

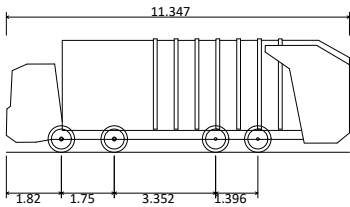
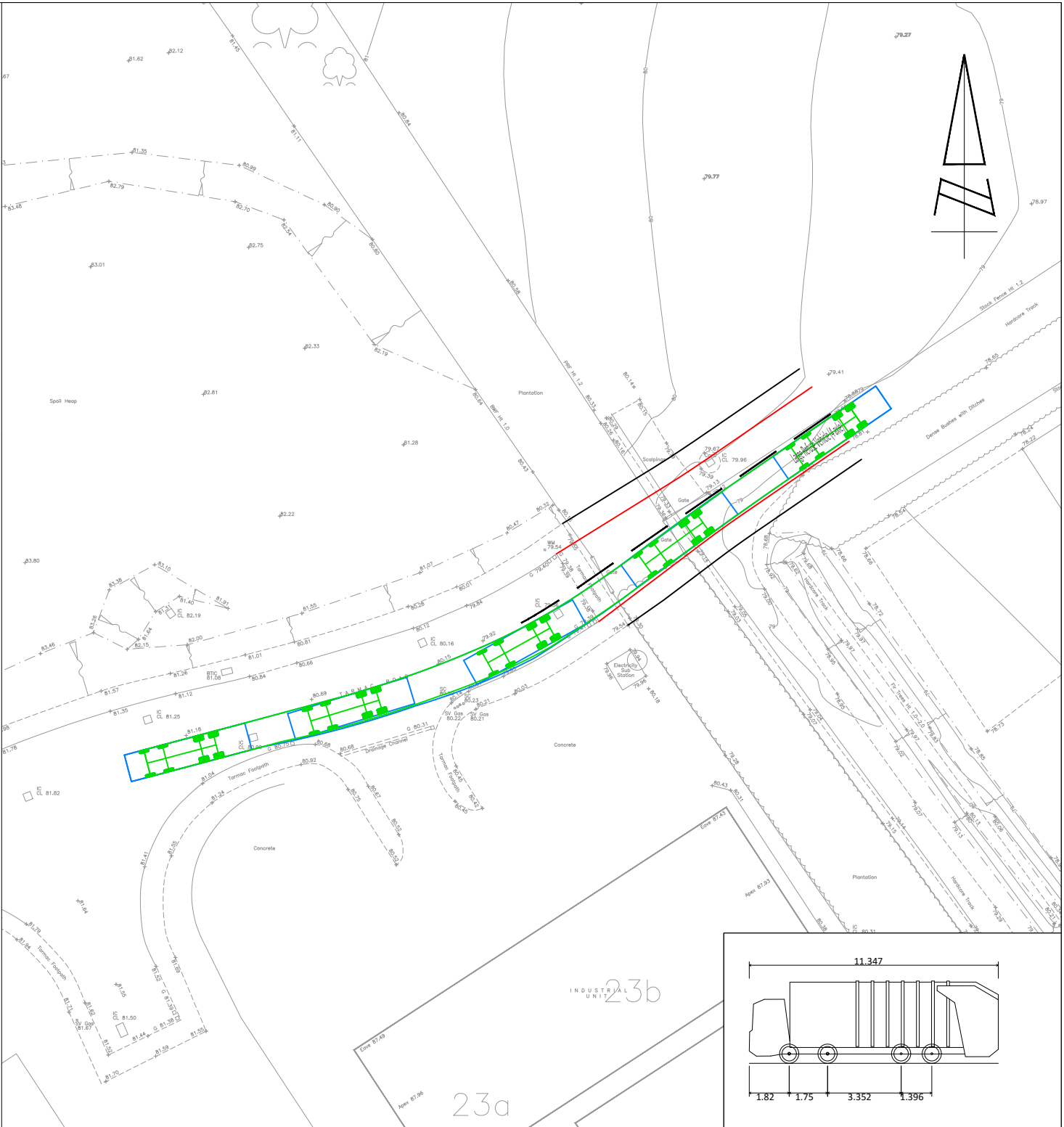
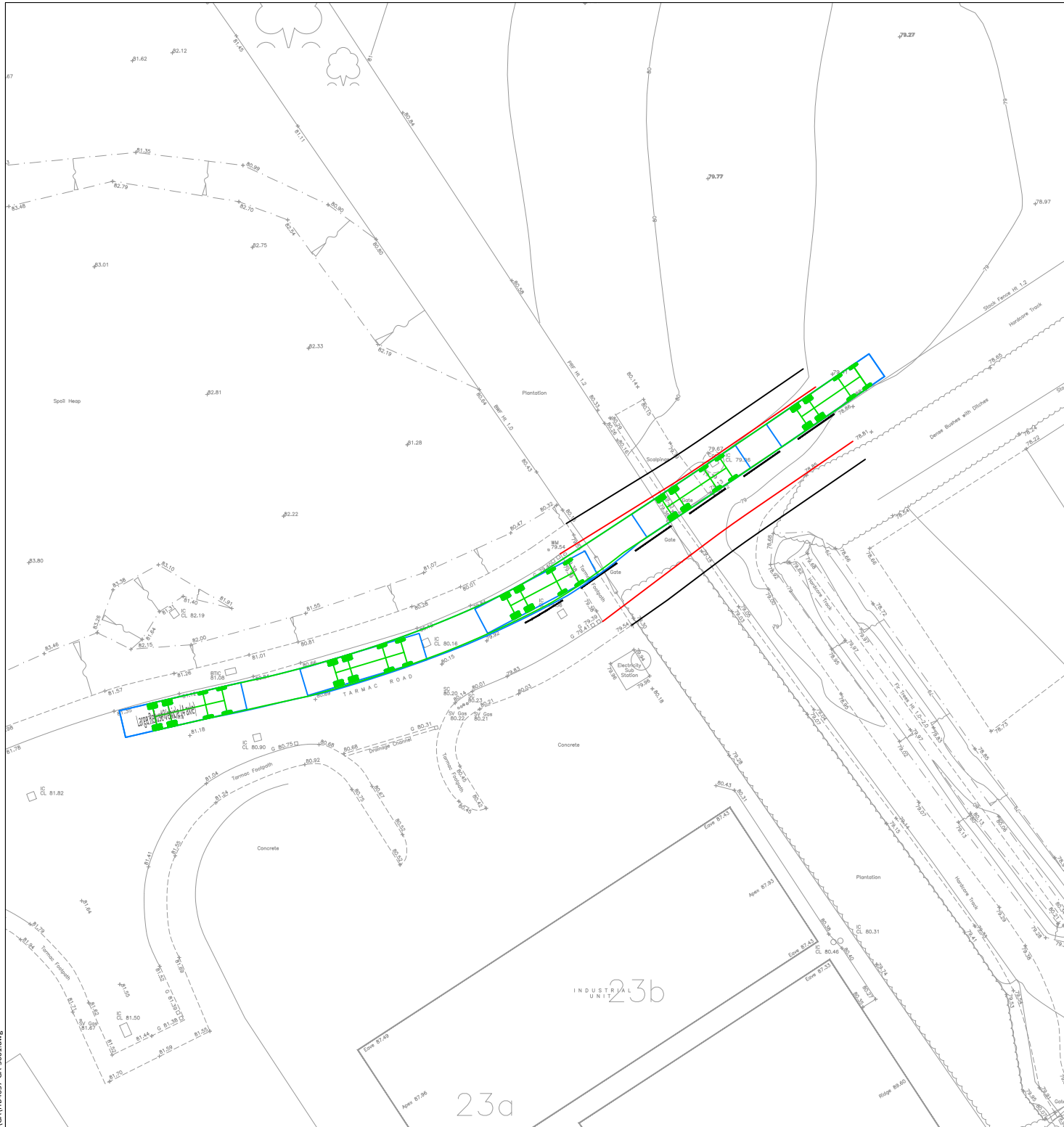
I accept these proposals by the Principal Engineer.

..... Date.....

Chief Engineer

## **APPENDIX P**

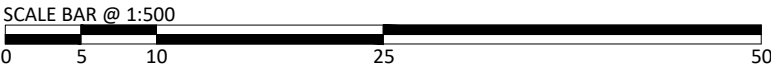
### **Vehicle Swept Path Analysis – Site Access Arrangements**



Large Refuse Vehicle (4 axle)  
Overall Length 11.347m  
Overall Width 2.500m  
Overall Body Height 3.751m  
Min Body Ground Clearance 0.304m  
Track Width 2.500m  
Lock-to-lock time 6.00s  
Wall to Wall Turning Radius 11.330m

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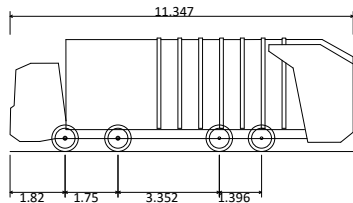


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|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|----------------------------|--|------|--|----|--|-------------|--|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|-------------------------------------------------------------------|----------------|---------------------------------------------------------------------------|--|------------------------|
| <div></div> <div>Grove House, Lutyens Close, Chineham<br/>Basingstoke, Hampshire, RG24 8AG</div> <div>Tel: 01256 338640<br/>Fax: 01256 338644</div> <div>www.i-transport.co.uk</div> |  |                            |  |      |  |    |  |             |  | TITLE:<br>PROPOSED SITE ACCESS ARRANGEMENTS (PARK FARM - EAST OF SHAFTESBURY ROAD) -<br>PRINCIPAL ACCESS VIA EXTENSION OF EASTERN ARM OF<br>B3081 SHAFTESBURY ROAD / FERNSBROOK LANE ROUNDABOUT - SWEEPED PATH ANALYSIS |  | SCALE @ A3:<br>1:500                                              | CHECKED:<br>BT | APPROVED:<br>BT                                                           |  |                        |
|                                                                                                                                                                                                                                                                         |  |                            |  |      |  |    |  |             |  |                                                                                                                                                                                                                         |  | FILE REF:<br>ITB4057                                              | DRAWN:<br>SH   | DATE:<br>13.10.17                                                         |  |                        |
|                                                                                                                                                                                                                                                                         |  | REV                        |  | DATE |  | BY |  | DESCRIPTION |  | CHK                                                                                                                                                                                                                     |  | APD                                                               |                | DRAWING No:<br>ITB4057-GA-5001                                            |  |                        |
|                                                                                                                                                                                                                                                                         |  | STATUS:<br>FOR INFORMATION |  |      |  |    |  |             |  |                                                                                                                                                                                                                         |  | PROJECT:<br>GILLINGHAM STRATEGIC SITE ALLOCATION,<br>NORTH DORSET |                | CLIENT:<br>WELBECK STRATEGIC LAND LTD /<br>CG FRY AND SON / TAYLOR WIMPEY |  | PROJECT No:<br>ITB4076 |



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Large Refuse Vehicle (4 axle)  
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Min Body Ground Clearance 0.304m  
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Lock-to-lock time 6.00s  
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Grove House, Lutyens Close, Chineham  
Basingstoke, Hampshire, RG24 8AG  
www.i-transport.co.uk

Tel: 01256 338640  
Fax: 01256 338644

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|-----|------|----|-------------|-----|-----|
|     |      |    |             |     |     |

STATUS: FOR INFORMATION

TITLE:  
PROPOSED B3081 SHAFTESBURY ROAD/PRINCIPAL STREET SIGNALISED JUNCTION -  
SWEEP PATH ANALYSIS - LARGE REFUSE VEHICLE

PROJECT:  
GILLINGHAM STRATEGIC SITE ALLOCATION,  
NORTH DORSET

CLIENT:  
WELBECK STRATEGIC LAND LTD /  
CG FRY AND SON /  
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