<u>Traffic Report</u> <u>Assessment of Proposed New Access</u> <u>Green Oak Farm, Stonham Road, Mickfield</u>

Prepared: Ian Booth – Consultant Engineer

Date: 27th March 2023, updated 1st September 2023

1 Introduction

- 1.1 This traffic report has been prepared for the owners of Green Oak Farm who gained planning permission on the 20th December 2022 for the following: conversion of their barn to a dwelling, construction of 2 no garages (one for the existing dwelling) and creation of a new vehicular access under planning application reference DC/22/05201.
- 1.2 For the original submission to the Local Planning Authority a traffic report was prepared to support the application and outline the current and proposed access arrangements. This report supplements the previous report and supports the new location for the vehicular crossing point at the southern end of their property boundary.
- 1.3 The owners of Green Oak Farm wish to move the position of the approved access further south along Stonham Road. This report looks at the current access arrangements at Green Oak Farm along with the proposed new vehicular access for the new dwelling and establishes whether the new access arrangement will work in highway terms. The report reviews the existing road conditions, accident records and visibility distances for both existing and proposed accesses along Stonham Road.
- 1.4 An aerial view of Green Oak Farm is shown in Appendix 1.

2 Accident Statistics

- 2.1 The CrashMap UK Accident record site was interrogated for details of injury accidents along this section of Stonham Road in Mickfield on Monday 27th March 2023. Since 2010 there have been no injury accidents recorded along the entire length of Stonham Road in the vicinity of the existing access to Green Oak Farm and several hundred metres in either direction.
- 2.2 Highway safety is an integral aspect of any new or existing vehicular access and the excellent accident record over the last 12 years demonstrates that there are no highway safety issues with this existing length of road.

3 Previously approved vehicular access

- 3.1 The location of the vehicular access approved under planning permission DC22/05201 is shown in Appendix 2.
- 3.2 This permission gained highways approval as part of the consultation process and an extract of the comments relating to visibility sight distances is shown in Appendix 3.
- 3.3 The required visibility splays were approved at 77m northbound and 100m southbound for the previously approved access location.
- 3.4 The above distances were based on traffic data previously collected in the area and it is thought that this data is suitable for use when assessing the revised access location. This data is shown in Appendix 4.

4 **Proposed and existing access arrangements**

- 4.1 This section of Stonham Road has a 60-mph speed limit and the main village's 30-mph speed limit is 190m north of the development site. The existing access into Green Oak farm is 9m wide at the carriageway edge, reducing to 3.2m where the gates are located 4.5m from the edge of the road.
- 4.2 Stonham Road is 5.3m wide at this point with a 2m wide verge to the south of the existing access and 2.6m to the north, widening to over 3m. The verge opposite the farm is 1.8m wide.

- 4.3 The existing access was surveyed for visibility distances onto Stonham Road measured on site from a 2.4m setback is as follows:
 - Looking north 14m
 - Looking south 90m, could be increased to over 120m with local hedge trimming.
- 4.4 The new access location is near the southern boundary of Green Oak Farm as shown in Appendix 5. At the proposed access location, the road is 4.5m wider and the verge is 3.8m wide from the edge of the carriageway to the field edge. This distance includes a highway ditch which runs partially along the property frontage in the highway verge.
- 4.5 There is a hedge running along this boundary and this will be removed as required to allow for the construction of the new access and to improve visibility to the south.
- 4.6 The visibility distances for the new access have also been assessed from the proposed position from a 2.4m setback as shown in Appendix 6, as follows:
 - Looking north 175m +
 - Looking south 100m, the sight line may cross the ditch slightly in places.
- 4.7 In the previous approval visibility distances of 100m looking north and 77m looking south were approved from a 2.4m setback. As can be seen above these distances are exceeded in both directions.
- 4.8 Normally for a 60 mph road visibility sight distances of 215m are quoted unless there is a relaxation in standards and a reduced figure is deemed suitable and this is based on traffic data recorded on site. Clearly the Officer responding to the previous development proposal has agreed to a reduction in visibility splay lengths as shown in paragraph 3.3.

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Design Speed kph	100	85	70	60	50
Desirable minimum stopping site distance m	215	160	120	90	70
One Step below minimum m	160	120	90	70	50

4.9 The table below outlines the visibility requirements from the DMRB:

- 4.10 The distances previously referred to relate to a design speed of 60-mph. This section of road is within a 60-mph speed limit, but vehicles do not travel at this speed. To determine the actual vehicle 85-percentile speeds automated traffic counts were carried out to the south and north of the proposed access by Suffolk Highways.
- 4.11 This data can be used to determine the actual design speed for the road based on the 85-percentile speed. Once known this speed can be applied to the table in paragraph 4.9 to give accurate visibility distances for the new vehicular access.
- 4.12 The speed data recorded is shown in Appendix 4 and was recorded both north and south of Green Oak Farm and it is believed the most accurate way of assessing the visibility is to average the sets of data based on the distances from the table from the DMRB in paragraph 4.9:
 - Site north of the development 90m splays reduced to 70m with relaxation
 - Site south of the development 111m splays reduced to 84m with relaxation
 - Average of both sites- 100m splays reduced to 77m with a relaxation

- 4.13 As mentioned previously relaxation of standards are permitted and are related to the safety aspects and environmental benefits for users of the road. The following factors are considered when assessing a site for relaxation of standards:
 - Proximity of other junctions
 - Subject to momentarily visibility impairment only
 - Only affects a small proportion of the traffic
 - On straight forward geometry readily understandable to drivers
 - Where traffic speeds would be reduced locally due to adjacent road geometry or speed limits
 - Excellent accident record
- 4.14 From the list of factors above several apply to this location and a relaxation of standards related to visibility site distances is warranted if required.
- 4.15 As can be seen from the measurements provided in paragraph 4.6 the visibility achievable exceeds the requirements laid down in the DMRB.
- 4.16 In order to ensure these distances are increased on site, even though they comply with the relevant standards, the applicant is arranging for some minor hedge trimming along his boundary edge to increase these distances and further provide an even safer environment.

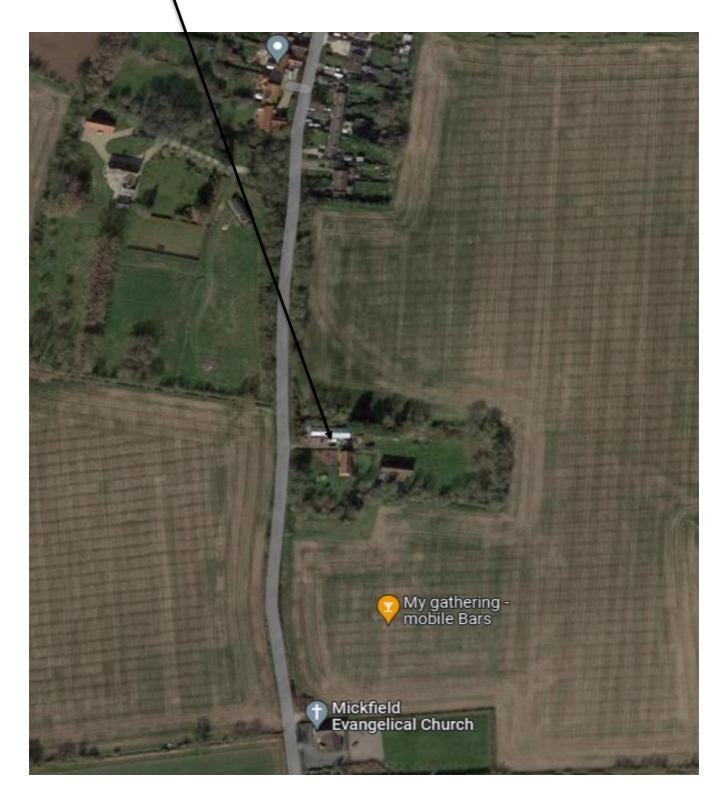
5 Summary and Conclusions

- 5.1 The visibility splays for the proposed new access meet the requirements of the DMRB. The southern splay crosses an existing ditch which is part of the highway verge which will never be developed.
- 5.2 Local hedge trimming will be carried out to improve the existing situation and improve on these distances.
- 5.3 All the visibility splays are positioned within the applicant's land or highway verge. There is no third-party land required for the new splays.
- 5.4 The area is very safe in highway terms and the CrashMap UK Accident Record Site results obtained on the 27th March 2023 reinforce this matter as no injury accidents had been recorded in the vicinity of the proposed new dwelling since 2010 along Stonham Road, Mickfield.
- 5.5 The accident record is a compelling factor in the overall consideration of whether a vehicle can enter the highway with sufficient visibility. Certainly, from assessment of the proposal the applicant is of the sound opinion that these proposals are acceptable and safe.
- 5.6 Traffic flows in this area are not excessive for this type of rural location and vehicle speeds are well below the 60-mph speed limit. It is accepted within the industry that vehicle speeds are greater now due to the reduced traffic flows during the Covid-19 pandemic.
- 5.7 In view of the above, my conclusion is that the proposed new access for the previously approved dwelling will have no detrimental effect on road safety for either users of the new access or the public highway at this location. The report demonstrates that there is sufficient inter-visibility between approaching and emerging vehicles and that there is no additional unacceptable highways risk.
- 5.8 This Traffic Report demonstrates that the proposals have been developed in accordance with the aims and objectives of current policy as it relates to transport and will not have a significant impact on the efficiency or safety of the local transport network.

- 5.9 Paragraph 109 within the Promoting Sustainable Transport Section of the Revised NPPF 2018 states that development should only be prevented or refused on highway grounds if there would be an unacceptable impact on highway safety, or the residual cumulative impacts on the roads would be severe. It is considered that these proposals will have no detrimental effect on road safety for either users of the new dwelling or the public highway at this location and would expect the Highway Authority to support the proposal accordingly.
- 5.10 In view of the foregoing, it is considered that there are no substantive highway or transportation reasons for not allowing the new vehicular access to be installed for the new dwelling at Green Oak Farm as described in planning approval reference DC/22/05201.

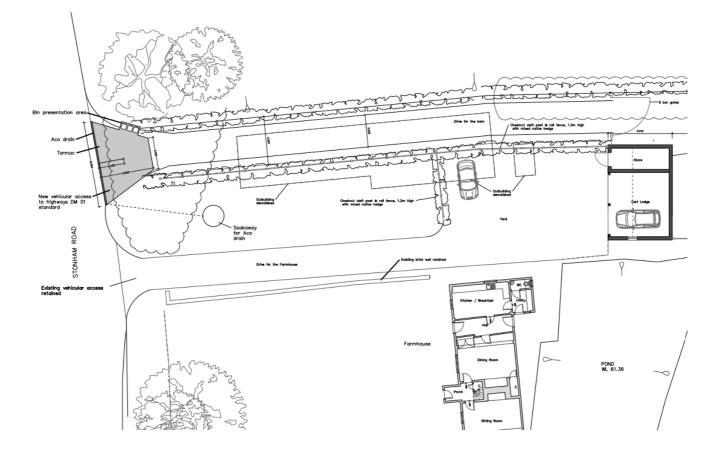
Appendix 1 – Aerial Photgraph

Green Oak Farm



Appendix 2 – Previously approved access

Extract from approved drawing number 1.04F



Appendix 3 – Extract of comments from SCC Development Management Team

Dear Averil,						
TOWN AND COUNTRY PLANNING ACT 1990						
CONSULTATION RETURN:	DC/22/05201					
PROPOSAL:	Full Planning Application - Conversion of and extension to barn to form 1No dwelling; Erection of 2No garages (one for the existing dwelling). Creation of new vehicular access (following demolition of existing outbuilding).					
LOCATION:	Green Oak Farm, Stonham Road, Mickfield, Stowmarket Suffolk IP14 5LS					

Notice is hereby given that the County Council as Highway Authority recommends that any permission which that Planning Authority may give should include the conditions shown below:

Visibility Splays:

Condition: Before the access is first used visibility splays shall be provided as shown on Drawing No. 10.01A with an X dimension of 2.4 metres and a Y dimension of 77 metres in the northern direction and 100 metres in the southern direction [tangential to the nearside edge of the carriageway] and thereafter retained in the specified form. Notwithstanding the provisions of Part 2 Class A of the Town & Country Planning (General Permitted Development) Order 2015 (or any Order revoking and re-enacting that Order with or without modification) no obstruction to visibility shall be erected, constructed, planted or permitted to grow over 0.6 metres high within the areas of the visibility splays.

Reason: To ensure drivers of vehicles entering the highway have sufficient visibility to manoeuvre safely including giving way to approaching users of the highway without them having to take avoiding action and to ensure drivers of vehicles on the public highway have sufficient warning of a vehicle emerging in order to take avoiding action, if necessary.

Access:

Appendix 4: Traffic survey results

Automated traffic loop installed across Stonham Road north of the 30mph speed limit for 2 weeks from the $8^{\rm th}$ June 2022

Figures	Total volume	85- Percentile	Average	Total volume	85- Percentile	Average
Date		Northbound Direction			Southbound Direction	
Mon 22/11/21	266	38	33	215	38	33
Tue 23/11/21	265	38	33	209	38	33
Wed 24/11/21	250	37	33	196	36	33
Thu 25//11/21	266	38	34	198	38	33
Fri 26/11/21	288	37	33	217	38	33
Sat 27/11/21	202	36	33	153	38	33
Sun 28/11/21	201	37	33	164	36	33
7 day av	248	38	33	193	37	33

Figures	Total volume	85- Percentile	Average	Total volume	85- Percentile	Average
Date	Northbound Direction			Southbound Direction		
Mon 29/11/21	238	37	33	203	36	32
Tue 30/11/21	252	37	33	183	38	33
Wed 1/12/21	281	37	33	204	37	33
Thu 2/12/21	286	38	33	211	37	33
Fri 3/12/21	289	37	33	211	37	33
Sat 4/12/21	203	36	33	167	37	33
Sun 5/12/21	186	36	32	157	36	32
7 day av	248	37	33	191	37	33

The average 85-percentile speed for this site was 37.5 mph and this equates to 60 kph

The visibility splay requirements for this design speed are 90m in each direction or 70m with a relaxation in standards.

Appendix 4 continued: Traffic survey results

Automated traffic loop installed across Stonham Road south of the Evangelical Church for 2 weeks from the $8^{\rm th}$ June 2022

Figures	Total volume	85- Percentile	Average	Total volume	85- Percentile	Average
Date		Northbound Direction			Southbound Direction	
Wed 8/6/22	246	42		214	42	35
Thur 9/6/22	279	42		248	42	36
Fri 10/6/22	273	41		251	41	36
Sat 11/6/22	218	43		199	44	38
Sun 12/6/22	178	41		167	40	35
Mon 13/6/22	273	42		287	43	36
Tue 14/6/22	504	42		287	43	37
7 day av	282	42		236	42	36

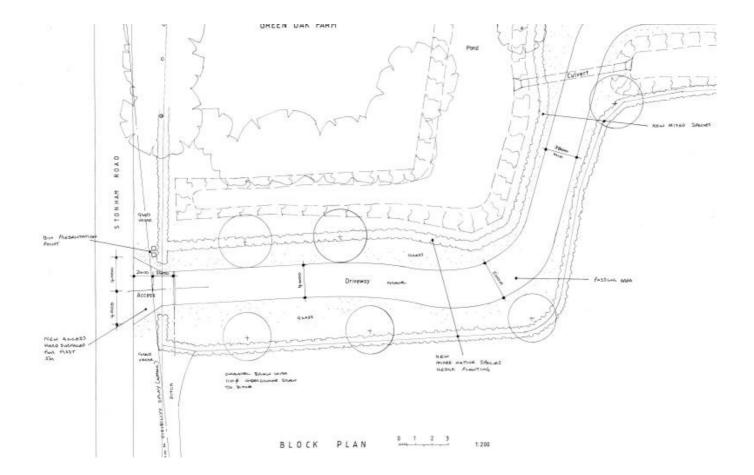
Figures	Total volume	85- Percentile	Average	Total volume	85- Percentile	Average
Date		Northbound Direction			Southbound Direction	
Wed 15/6/22	801	38	33	589	41	35
Thur 16/6/22	292	43	36	275	43	37
Fri 17/6/22	293	43	37	254	42	36
Sat 18/6/22	247	41	35	248	42	35
Sun 19/6/22	243	40	35	243	42	35
Mon 20/6/22	259	42	36	243	43	37
Tue 21/6/22	270	43	37	214	43	37
7 day av	344	41	35	295	42	36

The average 85-percentile speed for this site was 41.5 mph and this equates to 67 kph

The visibility splay requirements for this design speed are 111m in each direction or 84m with a relaxation in standards.

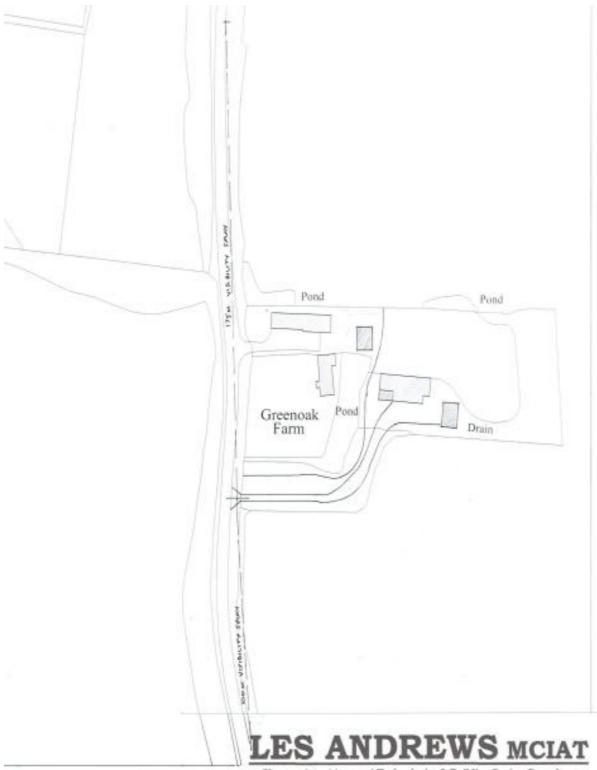
Appendix 5 – Proposed new access location.

Extract from drawing number 2312/02



Appendix 6 – Proposed visibility splays

Extract from drawing number 2312/01



Charterad Architectural Technologist & Building Design Consultant