

Ieuan Wyn Jones AC/AM
Dirprwy Brif Weinidog /Deputy First Minister



Llywodraeth Cynulliad Cymru
Welsh Assembly Government

Eich cyf/Your ref P-03-162
Ein cyf/Our ref MB DFM 0568 10

Christine Chapman AM
Chair - Petitions Committee
National Assembly for Wales
Cardiff Bay
Cardiff
CF99 1NA

25 October 2010

Dear Christine

I wrote to you on the 5 May regarding petition P-03-162: Improvement to the A40 near Llanspyddid, where you asked for a copy of the safety review that we carried out on this part of the trunk road network.

The report is now finalised, and as previously advised I attach a copy for your information.

Ieuan Wyn Jones

Ieuan Wyn Jones
Gweinidog dros yr Economi a Thrafnidiaeth
Minister for the Economy and Transport

Asiantaeth Cefnffyrdd Canolbarth Cymru
Mid Wales Trunk Road Agency



**Raglan – Llandovery Trunk Road A40
Llanspyddid Preliminary Investigation**

September 2010

Report Prepared By: Powys County Council



Report Ref: 1913/DAP



Asiantaeth Cefnffyrdd Canolbarth Cymru
Mid Wales Trunk Road Agency

Partneriaeth Cyngor Sir Ceredigion & Powys County Council
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Raglan – Llandovery Trunk Road A40

Llanspyddid Preliminary Investigation
September 2010

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Raglan – Llandoverly Trunk Road A40
Llanspyddid Preliminary Investigations

1.Introduction

- 1.1 The Community has raised concerns with regard to the safety of trunk road highway users in the vicinity of the side road junction at Llanspyddid. Issues raised include: the high speed of trunk road vehicles through the village; RTCs; lack of street lighting. This study reviews the trunk road environment through the village, with particular focus at the junction, to determine if further measures are required in accordance with current highway authority guidelines and to improve safety.

2. Existing Layout

2.1 Geometry

- 2.1.1 The layout, as shown in Appendix 1, has a carriageway width of 6.9 metres generally running east/west through a curve radius 400 metres with a forward visibility of 120 metres. These values approximately relate to criteria for one departure and one step below desirable minimum for a design speed of 50mph. The whole of the village (except for the Vicarage) is located on the South side of this section of Trunk Road, over which the National Speed limit applies.

2.2 Signs and Road Markings

(See site photographs – Appendix 2.)

- 2.2.1 The A40 is a designated clearway with the centreline indicated by a 6 metre line and 3 metre gap with solid edge of carriageway line except at junctions and lay-bys, etc.
- 2.2.2 At 100 metres to east and west of the C0160 junction are “Junction Ahead” warning signs above a “Pedestrians in Road” warning sign, the latter being in existence prior to the provision of a footway and is no longer required.
- 2.2.3 Adjacent to the signs are ARAF/SLOW carriageway road markings.

3. Traffic & Accident Data

- 3.1 Annual average daily traffic (AADT) flows are shown to be 4900 vehicles with an 85thile speed of 55.9mph, 50m west of the carriageway junction and 62.2mph, 500 metres north west of the junction.
- 3.2 Accident records from 1988 to date show that there have been 17 personal injury collisions in total within a 200 metre length either side of the junction. (See location plan in Appendix 3)

To summarise:

1. At the junction – 4 slight, 1 serious
2. East of the junction – 7 slight
3. West of the junction – 1 slight, 4 serious

Whilst it is more usual to report a 3 or 5 year accident history, the longer term helps to give a better indication of the types of collision occurring at the junction and its approaches.

- 3.3 The 3 year accident record shows 4 slight and 1 serious personal injury collisions and the 5 year accident record, 6 slight and 1 serious.
- 3.4 It is worth noting that all the slight collisions in the last 3 years occurred over 100m to the east of the junction and there was only 1 slight collision at the junction in the past 5 years.
- 3.5 Collision details generally indicate the likelihood of driver error at the junction, the majority of collisions being shunts. The junction approaches possibly indicate inappropriate speeds resulting in "loss of control" or by crossing the centre line.
- 3.6 Collisions to the west of the junction have a higher severity designation to those on the east, which may be attributed to the higher 85thile speeds.
- 3.7 Based on the last 5 year accident history, the collision rate equates to 76 injury collisions/100 million.veh.km.
- 3.8 Turning counts at the junction were carried out at peak AM and PM periods – data is provided in Appendix 4.

4. Proposals

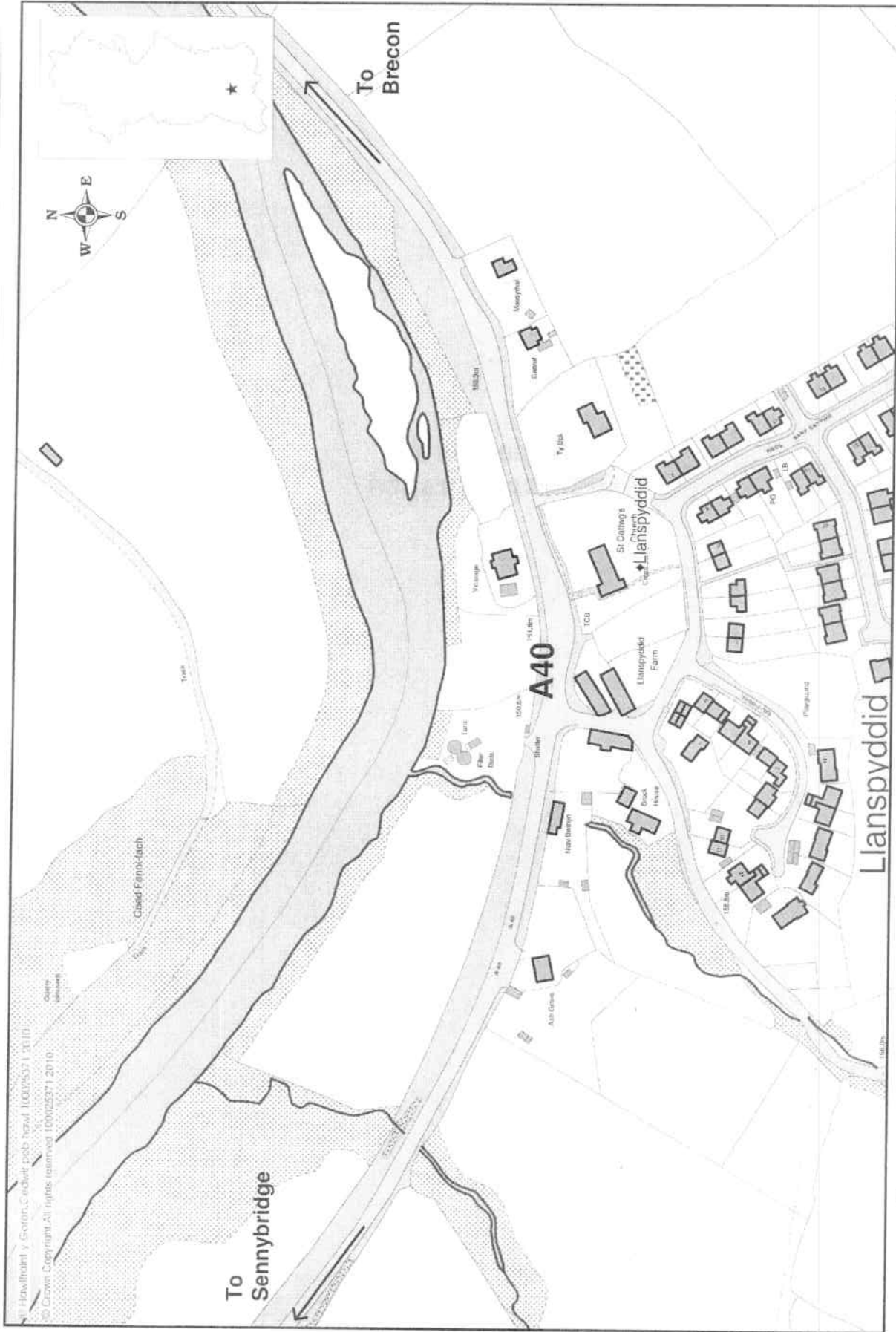
- 4.1 It is proposed to visually enhance the trunk road signing and lining as shown in Appendix 5.
- 4.2 This consists of a centreline hatching for 200 metres either side of the junction which coincides with the accident boundaries and frontage development.
- 4.3 At the extremities it is proposed to erect new yellow backed junction ahead warning signs with "reduce speed now" plates (both sides of the road). Adjacent to the sign, in the approach lane, it is proposed to install an ARAF/SLOW road marking on a red patch with the same road markings repeated 100 metres from the junction.
- 4.4 Estimate cost for these measures are as follows:-

TS&M	500
4 signs @ £500 supply and erect	2,000
4 Red Patch/ARAF/SLOW	2,000
400metres C.L. hatching	2,400
80 road studs unidirectional	<u>1,000</u>
	7,900
Contingencies	<u>800</u>
	8,700
Design and Site Supervision	900
Total	<u>£9,600</u>

5.Conclusion

- 5.1 The proposals are measures to improve driver awareness in the immediate vicinity of the junction, and are similar to measures introduced at various locations in the County with great success.
- 5.2 Consideration has been given to provision of a 50mph speed limit, in accordance with the DMRB and the road geometry, but the 85%ile speed of 55mph is considered to be an acceptable tolerance.
- 5.3 Whilst the accident rate is in excess of the threshold under current speed limit guidance (Setting Local Speed Limits in Wales), it also states that speed limits should not be used in an attempt to solve isolated hazards, hence visual enhancement is the preferred option.
- 5.4 Following implementation of the proposals the situation can be monitored and if further measures become necessary, the advance junction warning signs may be replaced by a mandatory 50mph section. The length being 450 metres, which is slightly below the recommended minimum distance of 600metres, but allowable under different or specific circumstances such as the junction.

Appendix 1
General Layout



Yr Hysfoddi y Gwein, Cwchwr pob hysfoddi 100025371 2010.
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Appendix 2
Site Photographs

Google maps
UK

Address **A40**

Address is approximate

C0161 Junction from East



Google maps
UK

Address **A40**

Address is approximate

C0161 Junction from West



Google maps
UK

Address **A40**

Address is approximate

Junction Approach from Sennybridge



Google maps
UK

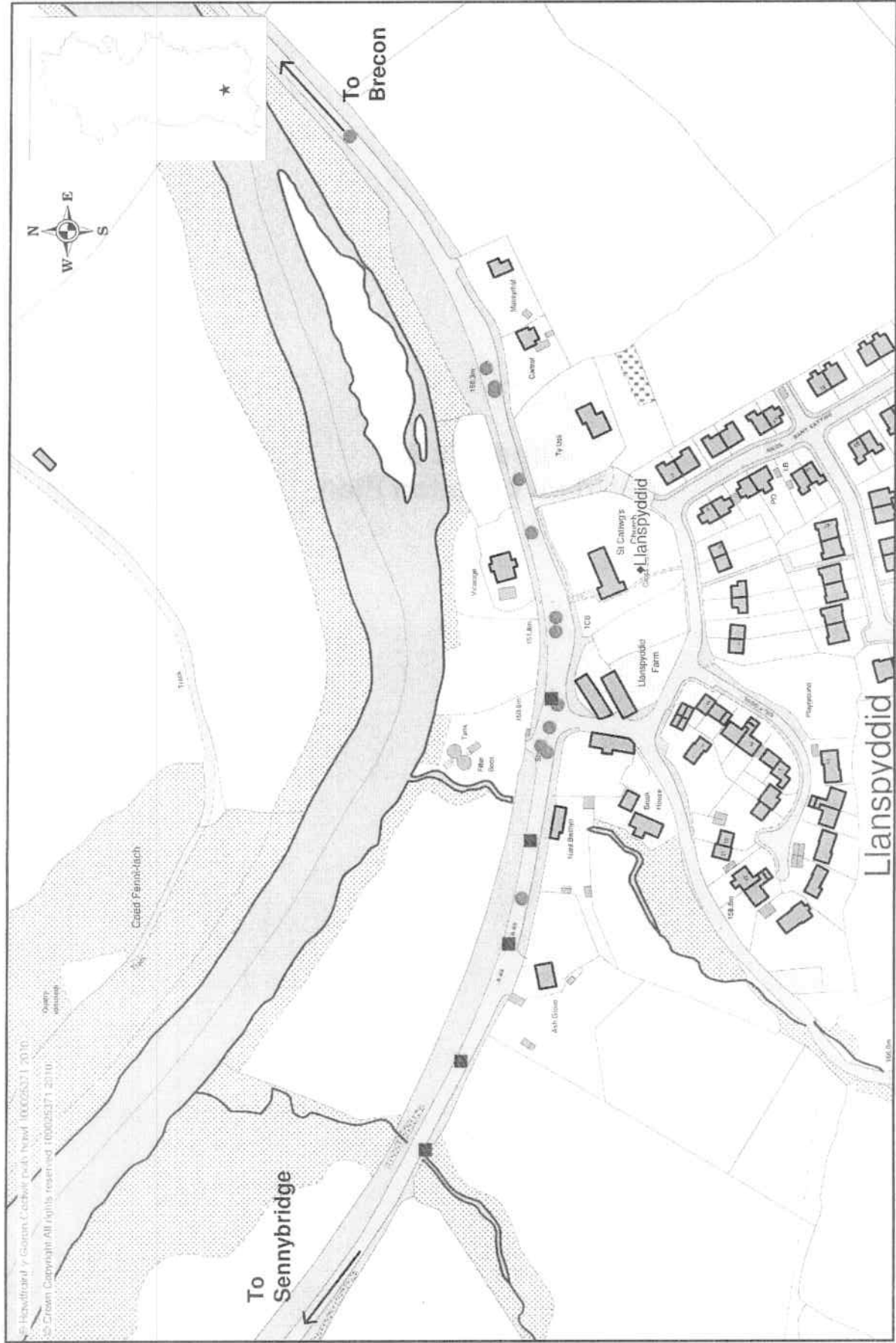
Address **A40**

Address is approximate

Junction Approach from Brecon

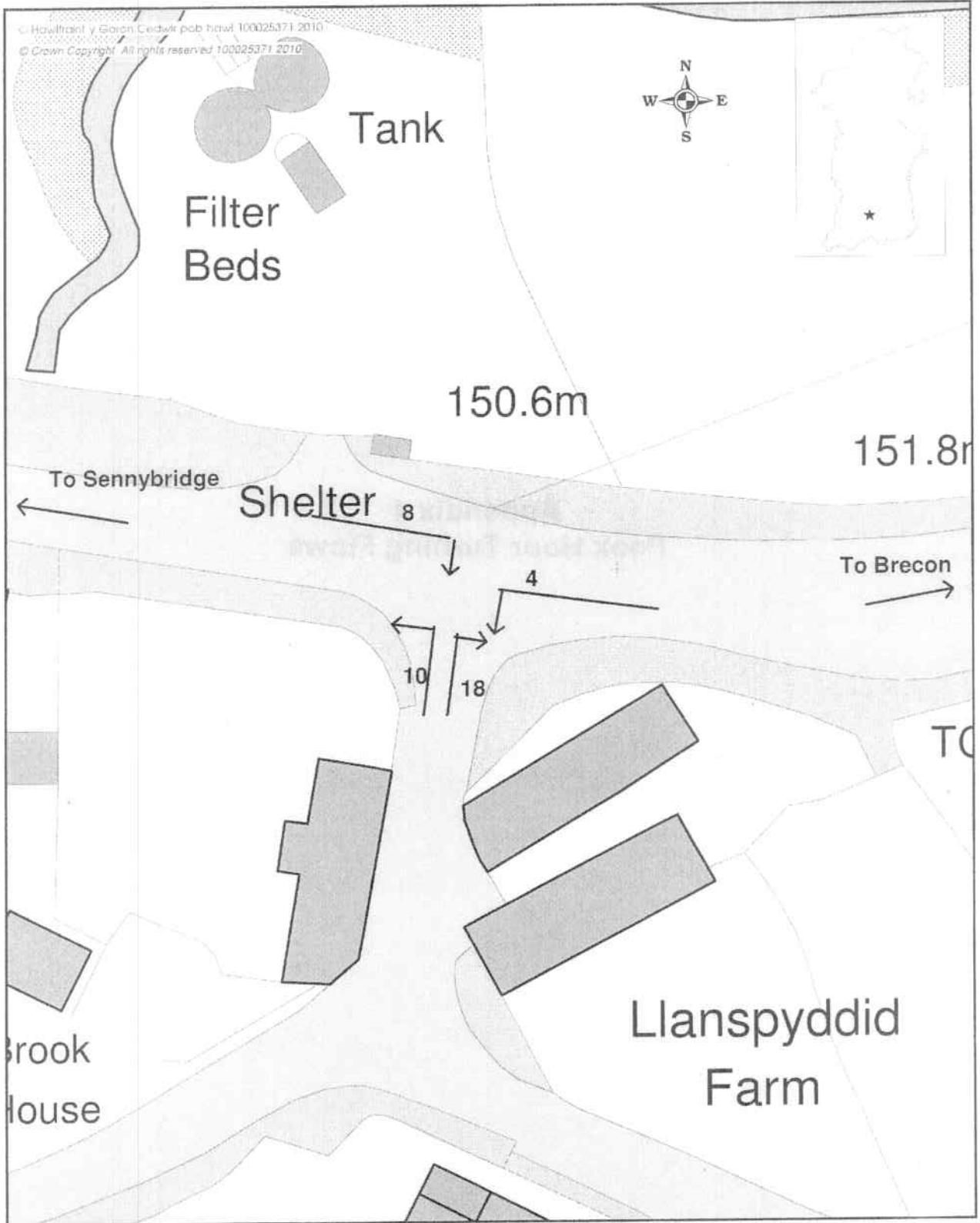


Appendix 3
Accident Location Plan



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Appendix 4
Peak Hour Turning Flows



Appendix 5
Traffic Proposals

