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GLANLLYNFI GARTH WIND FARM

Draft Environmental Statement

Appendix 13C - Construction Traffic Noise



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1. Construction Traffic Noise

1.1 Construction Traffic Noise

- 1.1.1 Construction road traffic noise has been predicted using the method presented in Calculation of Road Traffic Noise (CRTN)¹. CRTN uses Annual Average Weekday Traffic flows (AAWT) over the 18-hour period between 06:00 and midnight, to predict road traffic noise levels in terms of the noise descriptor $L_{A10,18hr}$.
- 1.1.2 Basic Noise Levels (BNL) have been predicted, which, as set out in CRTN are road traffic noise level predictions at 10 m from the nearside kerb line of the carriageway.
- 1.1.3 Road traffic noise predictions have been undertaken for the following scenarios:
- Scenario 1: Traffic flows in 2029.
 - Scenario 2: Traffic flows in 2029 plus Proposed Development construction traffic.
- 1.1.4 The data is based on measurements from two Automatic Traffic Count (ATC) locations surveyed in 2026 and has been processed by the transport team to derive 2029 AAWT, 18h flows for use in the assessment. The ATC locations were on the A4017 (approximate BNG coordinates: Easting 291740, Northing 195535), and the A4061 (approximate BNG coordinates Easting 293300, Northing 205106). Further details on the traffic surveys are provided in **Chapter 12: Traffic and Transport**.
- 1.1.5 The construction traffic scenario is based on the peak daily construction traffic forecast, which comprises up to 73 heavy vehicles per day.
- 1.1.6 The traffic data used in the assessment is presented in **Table 1.1**.

Table 1.1 Construction traffic assessment data

Road	Scenario 1			Scenario 2		
	Total vehicles	HGV%	Ave. speed (km/h)	Total vehicles	HGV%	Ave. speed (km/h)
A4017	1,286	16.0	62.4	1,360	20.6	62.4
A4061	4,235	17.0	85.9	4,308	18.4	85.9

- 1.1.7 Changes in road traffic noise levels have been calculated by comparing the BNLs for each scenario. The results are presented in **Table 1.2**.

¹ Department of Transport and Welsh Office (1988) Calculation of Road Traffic Noise. London: Her Majesty's Stationery Office (HMSO)

Table 1.2 Predicted road traffic noise change due to construction vehicles

Road	Scenario 1	Scenario 2	Difference
	BNL, dB L _{A10,18h}	BNL, dB L _{A10,18h} 2	Scenario 2 - Scenario 1
A4017	63.8	64.5	+0.7
A4061	69.5	69.8	+0.3