



ENVIRONMENTAL STATEMENT
VOLUME 2
APPENDIX 8.2 – BASELINE NOISE
MONITORING

Appendix 8.2 – baseline noise monitoring.

Site plan and measurement positions

A baseline noise survey was carried out across the Site between Tuesday 19th March 2019 to Monday 25th March 2019 to measure the existing baseline noise climate across the site and surrounding area. A total of four locations were surveyed: two unmanned noise loggers for the entire duration of the survey one central to the site and the second to the east, representative of the nearest dwellings off the Golf Club access road. In addition, two manned short-sample measurements were undertaken following the Shortened Measurement Procedure described in the Calculation of Road Traffic Noise 1988 adjacent to the M40 and the A4095 to quantify these noise sources. These locations are shown on Figure 1 below.

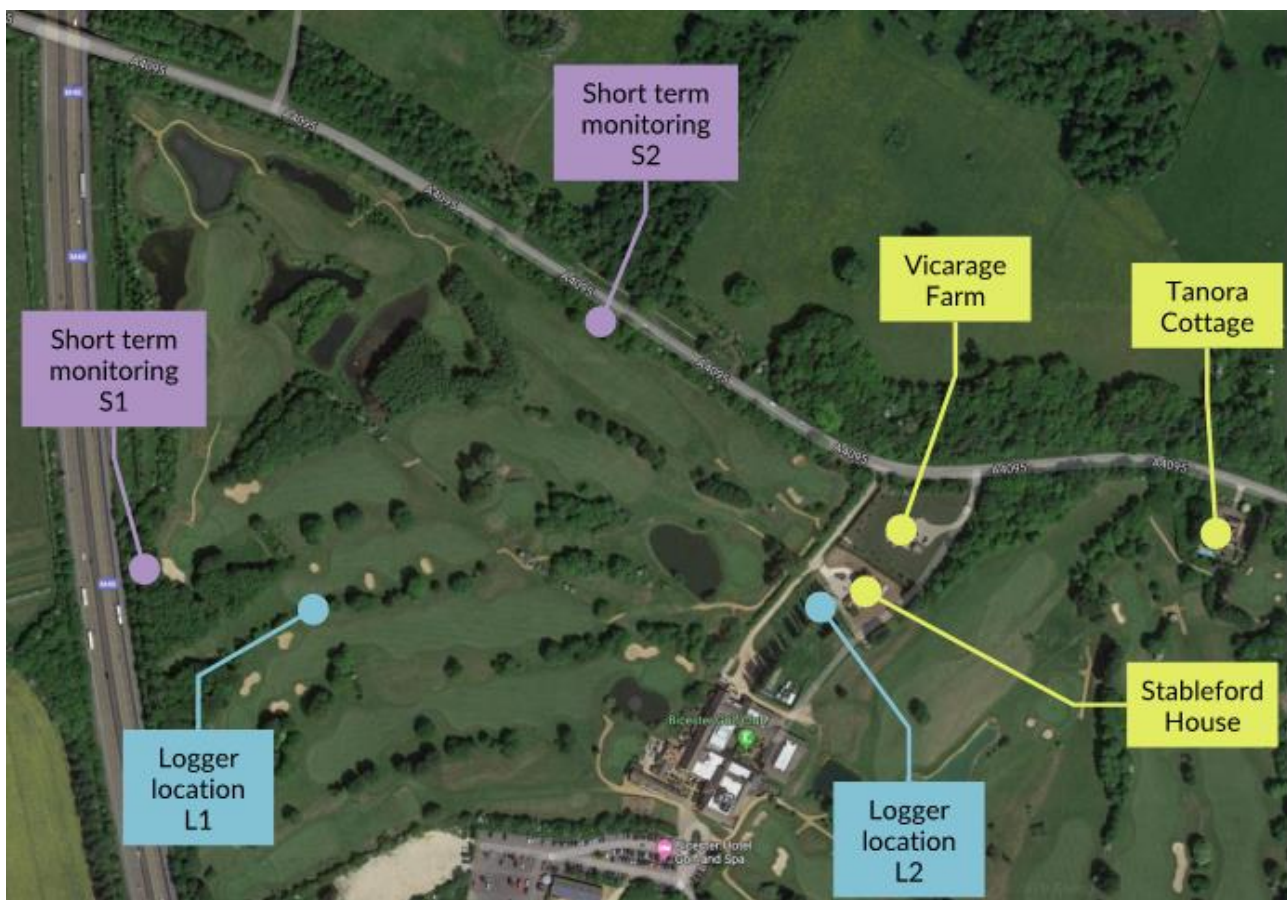


Figure 1: Site location showing noise measurement locations and nearest noise sensitive receivers

Photographs of the above noise measurement locations are shown in the following figures.



Figure 2: Logger location L1



Figure 3: Logger location L2



Figure 4: Short term location S1



Figure 5: Short term location S2

Equipment.

Logger location L1 and short term location S1

Equipment	Type	Serial Number	Last Calibrated
Sound Level Meter	Rion NL-52	00632044	10/10/2017
Pre-amplifier	Rion UC-59	05211	10/10/2017
Microphone	Rion NH-25	32072	10/10/2017

Logger location L2

Equipment	Type	Serial Number	Last Calibrated
Sound Level Meter	Rion NL-52	00632044	10/10/2017
Pre-amplifier	Rion UC-59	05211	10/10/2017
Microphone	Rion NH-25	32072	10/10/2017

Short term location S2

Equipment	Type	Serial Number	Last Calibrated
Sound Level Meter	B&K 2250	3003815	12/10/2017
Pre-amplifier	B&K 4189	2887159	12/10/2017
Microphone	B&K ZC 0032	19781	12/10/2017

Calibrator

A field calibration was carried out at the start and end of the measurements, using:

Equipment	Type	Serial Number	Last Calibrated
Calibrator	Rion NC-74	34304644	26/03/2018

Tables of results.

Logger measurements

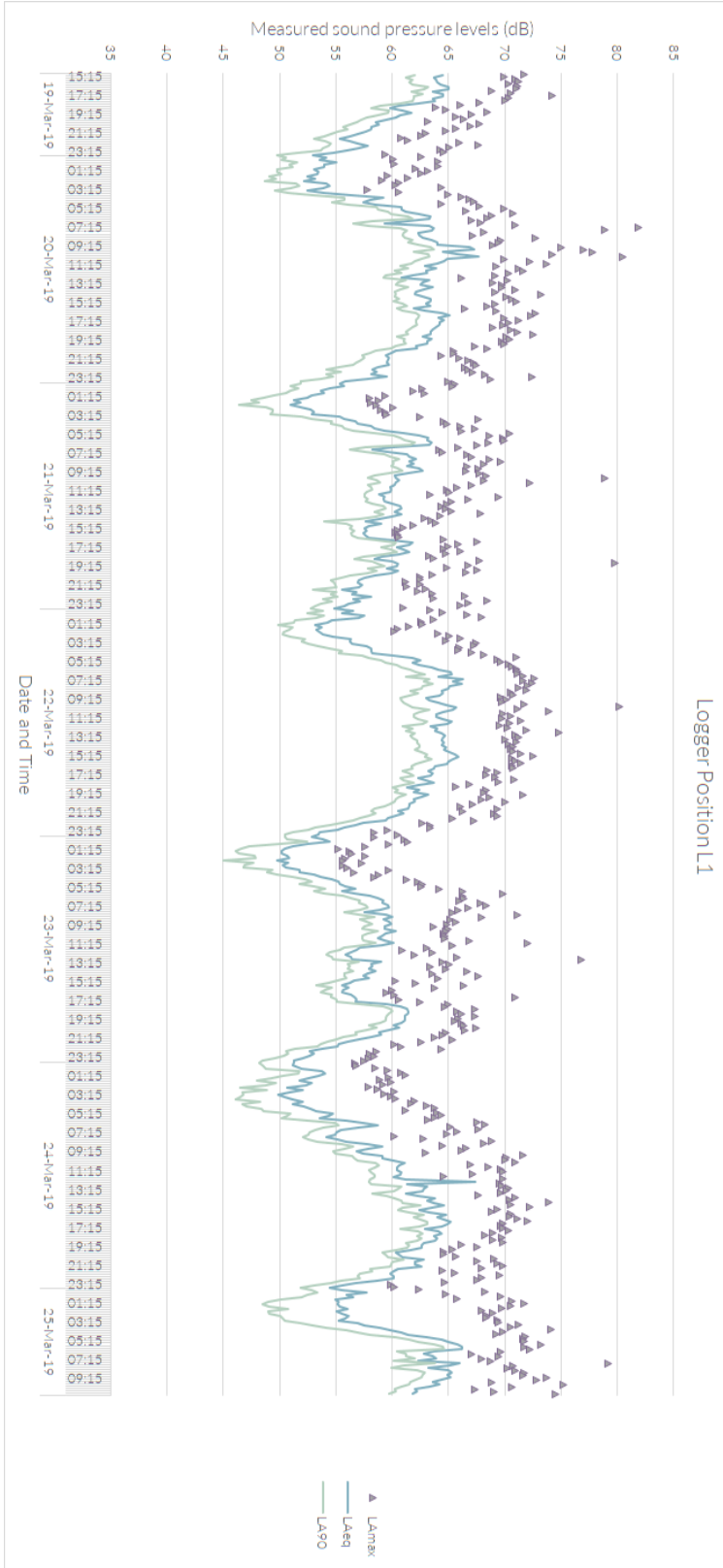
Measurement position	Average ambient sound pressure levels		Typical minimum background noise levels		Typical maximum noise levels	
	Daytime (07:00-23:00) L _{Aeq, 16 hours}	Night time (23:00-07:00) L _{Aeq, 8 hours}	Daytime (07:00-23:00) L _{A90, 1 hour}	Night time (23:00-07:00) L _{A90, 15 min}	Daytime (07:00-23:00) L _{Amax, 15 min}	Night time (23:00-07:00) L _{Amax, 15 min}
L1	62 dB	58 dB	55 dB	47 dB	57 – 82 dB	55 – 74 dB
L2	57 dB	53 dB	47 dB	44 dB	52 – 86 dB	50 – 76 dB

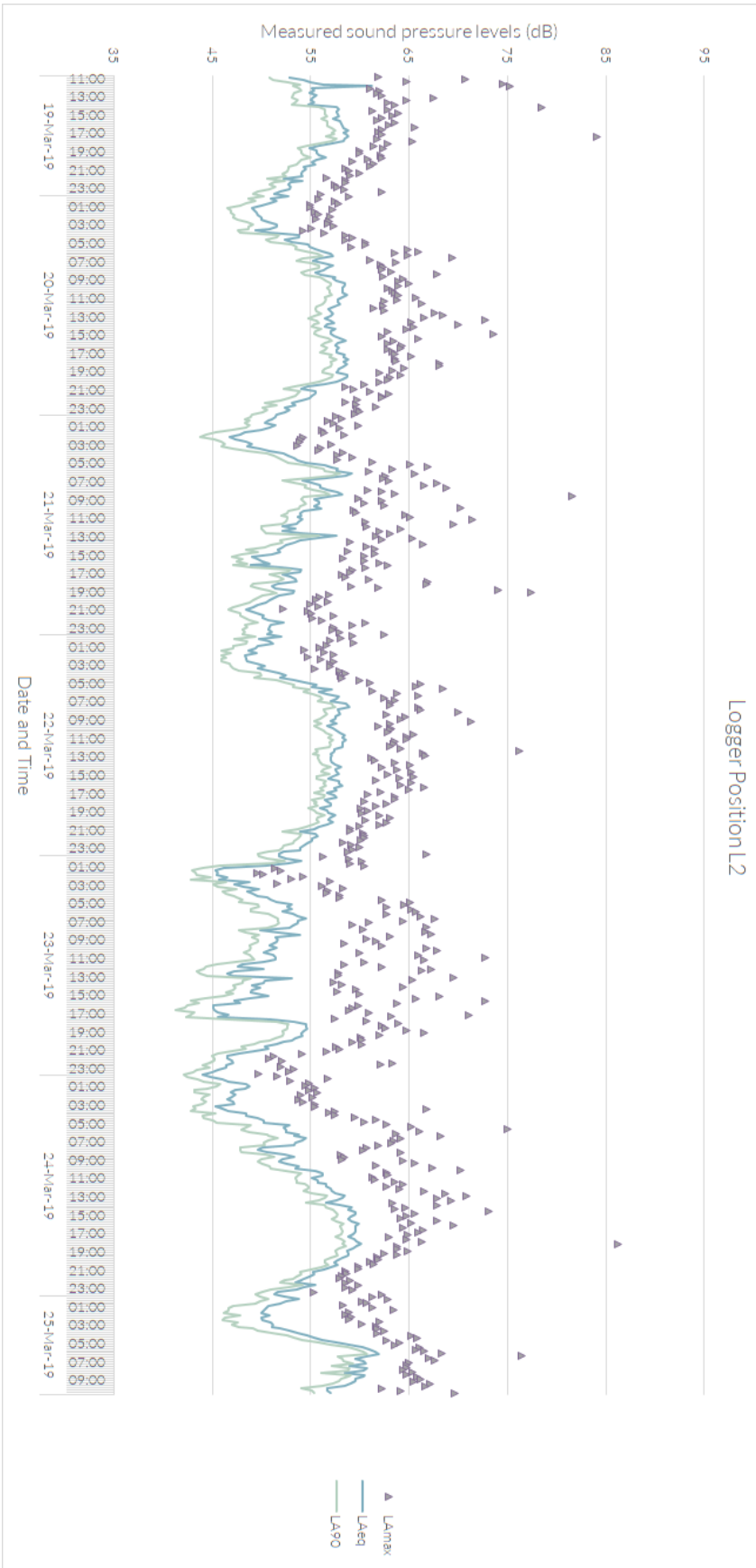
Short term measurements for CRTN assessment

Position	L ₁₀ (3-hour) (12:00 – 15:00)	Correction to L _{A10, 18-hour}	Calculation to L _{Aeq, 16hour} 07:00-23:00	Calculation to L _{Aeq, 8-hour} 23:00-07:00
S1	78 dB	77 dB	75 dB	71 dB
S2	64 dB	63 dB	61 dB	53 dB

Charts of results.

Environmental noise time histories.





Background noise statistical analysis charts

