

ACOUSTIC DESIGN TECHNOLOGY
Noise and Vibration Consultants

ADT 3630

22 October 2025

Wythenshawe Community Housing Group
8 Poundswick Lane
WYTHENSHAW
M22 9TA

GREENBROW SOCIAL CLUB, MANCHESTER
POST COMPLETION VALIDATION TESTING
ACOUSTIC CONSULTANCY REPORT ADT 3630/VT

Revision	Date	Issued By	Checked By	Revision Notes
-	22 October 2025	Chris Middleton	-	first issue

1.0 SUMMARY

Post completion validation testing has been undertaken to demonstrate compliance with condition 8 of planning permission 137485/FO/2023.

The scheme of sound insulation measures for this development as required by part a) of the condition is described in the previously issued report ADT 3630/ENIA dated 17 January 2024.

A post construction survey has now been undertaken as required by part b) of the condition.

Measurements have been taken over a period of at least 24 hours in a living room and a bedroom of 2 apartments and 1 house, thereby fulfilling the Manchester City Council requirement to test at least 10% of dwellings.

The test results are all within the noise criteria set out in the Manchester City Council publication 'Planning and Noise: Technical Guidance (October 2022)', and therefore demonstrate compliance with planning condition 8.

2.0 POST COMPLETION TESTING

2.1 Acoustic Design Criteria

Condition 8 of planning permission 137485/FO/2023 reads as follows:

8) a) Before the development commences a scheme for acoustically insulating the proposed residential accommodation against noise from Greenbrow Road and surrounding traffic network shall be submitted to and approved in writing by the City Council as local planning authority. There may be other actual or potential sources of noise which require consideration on or near the site. The approved noise insulation and ventilation scheme shall be completed before any of the dwelling units are occupied.

Noise survey data shall include measurements taken during a rush-hour period and night time to determine the appropriate sound insulation measures necessary. The following noise criteria shall be required to be achieved:

b) Prior to first occupation of the residential units, a verification report shall be required to validate that the work undertaken throughout the development conforms to the recommendations and requirements in the approved acoustic consultant's report. The report shall also undertake post completion testing to confirm that the internal noise criteria have been met. Any instances of non-conformity with the recommendations in the report shall be detailed along with any measures required to ensure compliance with the internal noise criteria.

Reason - To safeguard the amenity of nearby residential properties and to insulate the proposed residential accommodation against noise from Manchester Road and the neighbouring Metrolink Line, pursuant to saved policy DC26 of the Unitary Development

Plan for the City of Manchester and Policies DM1 and SP1 of the Manchester Core Strategy.

There are no specific noise criteria provided in planning condition 8, although the relevant criteria from the Manchester City Council publication 'Planning and Noise: Technical Guidance (October 2022)' are as follows:

Location	Noise criterion
Bedrooms (night)	30 dB L _{Aeq,8hour} 45 dB L _{Amax} *
Living rooms (day)	≤35 dB L _{Aeq,16hour}
Gardens and terraces (day)	55 dB L _{Aeq,16hour}

* Note:- not normally to be exceeded more than 15 times over the night

Please note that the criterion for gardens and terraces is provided for information only and has not been tested, as there was ongoing construction taking place on the site during the day.

In any case, compliance or non-compliance with that particular requirement would be determined by the location and massing of the building, which were fixed when planning permission was granted.

2.2 Site Particulars

The development is located on Greenbrow Road, Manchester.

At the time of testing the building envelopes to the apartment block and the houses were completed but not carpeted or furnished. Construction works were ongoing between 07:00 hours and 16:00 hours daily and will continue up until occupation, and the tests have therefore by necessity been undertaken around the ongoing construction noise.

3.0 TEST PROCEDURE

3.1 Purpose of Tests

Noise measurements were undertaken in a sample of rooms to check compliance with the applicable Manchester City Council indoor ambient noise criteria, towards discharge of planning condition 8 b). A method statement for these tests was submitted to Manchester City Council on 1 October 2025.

3.2 Instrumentation

The instrumentation used, and the field calibration values before and after the survey are detailed in Appendix B of this report.

3.3 Procedure

The test room locations, the survey periods and the instrumentation used are set out in the following table. The locations are also illustrated on the attached site plan 3630/SP1.

Test room	Location	Survey period	Instrument
R1	Plot 5 (house) bedroom	Thursday 16 October to Friday 17 October 2025	Norsonic 140
R2	Plot 5 (house) living room	Thursday 16 October to Friday 17 October 2025	Norsonic 140
R3	Plot 9 (apartment) bedroom	Thursday 16 October to Friday 17 October 2025	01dB Fusion
R4	Plot 9 (apartment) living room	Thursday 16 October to Friday 17 October 2025	01dB Solo
R5	Plot 14 (apartment) bedroom	Friday 17 October 2025 to Saturday 18 October 2025	01dB Fusion
R6	Plot 14 (apartment) living room	Friday 17 October 2025 to Saturday 18 October 2025	01dB Solo

In each room the microphone was mounted on a tripod approximately 1.2 metres above the floor in the centre of the room and set to log over a period of at least 24 hours. The meters were set to log the 100ms L_{Aeq} and $L_{Amax(F)}$ for the duration of the survey period, for subsequent post processing. The windows were closed, there are no trickle vents, and the whole house ventilation plant was operating in all test rooms.

4.0 **RESULTS**

4.1 **Recorded Data**

The calculated $L_{Aeq, 1 \text{ hour}}$ for each test room are listed in the attached table 3630/T1, along with the calculated $L_{Aeq,T}$ for the portion of the day time period unaffected by site noise and for the whole of the night time period (23:00 – 07:00).

The night time $L_{Amax,F}$ are shown on the attached graphs 3630/G1 – G6, at 1 minute resolution.

All results are standardised to a reverberation time of 0.5 seconds as recommended in the ANC ‘Measurement of Sound Levels in Buildings: ANC Guidelines’ document (June 2020).

4.2 Discussion of Results

As site work was continuing throughout each survey period, the data from 07:00 hours to 16:00 hours was affected by site noise to some degree.

In the absence of site noise, observations and analysis of audio samples indicates that the noise levels were generally controlled by traffic noise, with the night time L_{Amax} generally controlled by road traffic, as is typical of many urban areas.

Reference to the attached table 3630/T1 shows that the measured $L_{Aeq,T}$ over the surveyed portion of the day time period outside site opening hours, and over the whole night time period are within the required day time $L_{Aeq, 16 \text{ hour}} \leq 35 \text{ dB}$ and the night time $L_{Aeq, 8 \text{ hour}} \leq 30 \text{ dB}$.

Reference to the attached L_{Amax} time history graphs reveals that the levels were generally less than the required limit of $L_{Amax,F} \leq 45 \text{ dB}$, with only one excess recorded at the end of one night (06:56 hours), which is expected to be associated with the opening up of the site.

4.3 Conclusion

The conclusion of this report is that the measured levels of external noise intrusion are within the indoor ambient noise criteria in the Manchester City Council publication 'Planning and Noise: Technical Guidance (October 2022)', and therefore demonstrate compliance with planning condition 8b).

FOR ACOUSTIC DESIGN TECHNOLOGY



Notes

Description

Site plan showing approximate locations of test rooms

Project

Greenbrow Social Club, Manchester

Date

22 October 2025

Drawing No.

3630/SP1



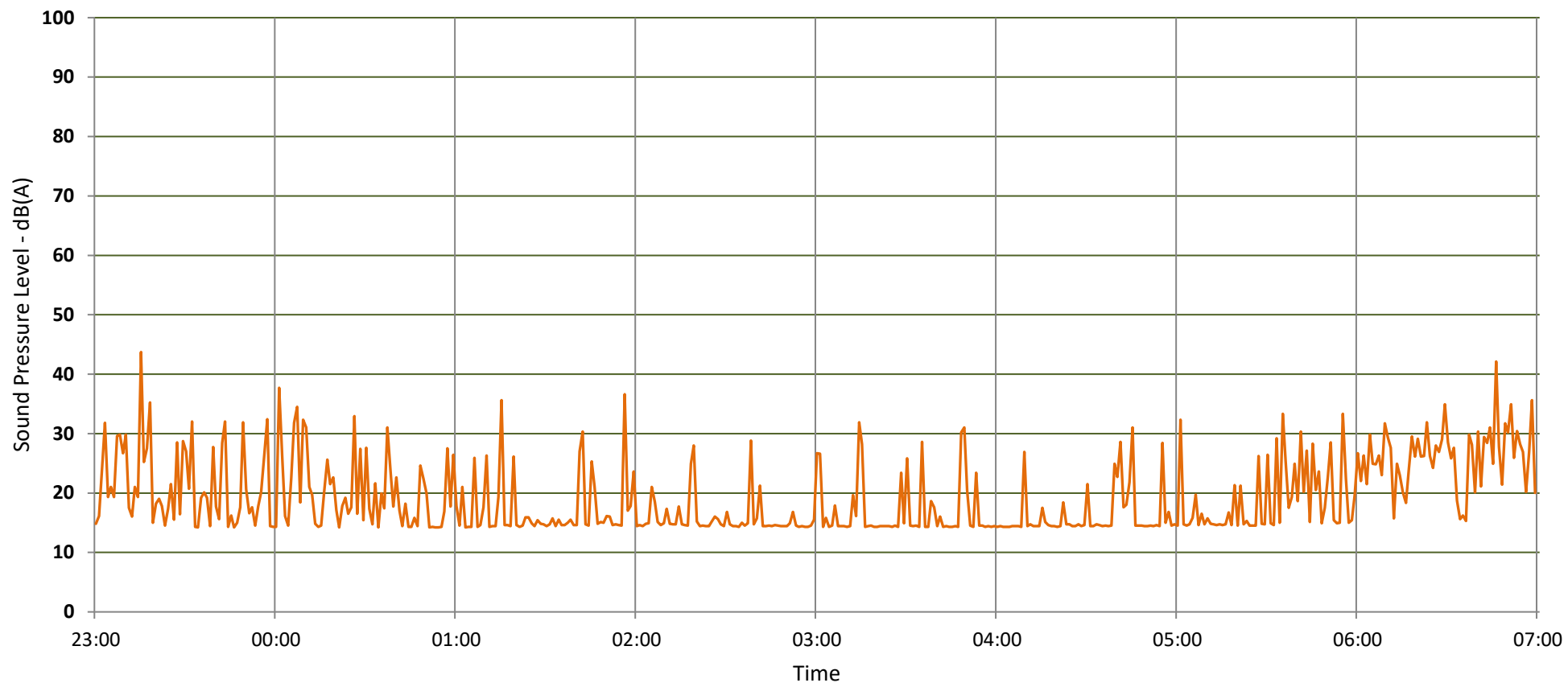
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Summary of $L_{Aeq, 1 \text{ hour}}$ dB

Periods affected by construction noise are highlighted and not included in day / night $L_{Aeq,T}$ calculations

Start	Stop	$L_{Aeq, 1 \text{ hour}}$ dB					
		Test room 1	Test room 2	Test room 3	Test room 4	Test room 5	Test room 6
		Plot 5 house bedroom 16/10 to 17/10	Plot 5 house living room 16/10 to 17/10	Plot 9 apartment bedroom 16/10 to 17/10	Plot 9 apartment living room 16/10 to 17/10	Plot 14 apartment bedroom 17/10 to 18/10	Plot 14 apartment living room 17/10 to 18/10
10:00	11:00				44		
11:00	12:00	23	24	34	63	32	32
12:00	13:00	38	48	34	32	32	32
13:00	14:00	25	25	29	28	32	32
14:00	15:00	26	26	28	27	31	31
15:00	16:00	27	26	29	28	29	30
16:00	17:00	26	24	26	25	29	30
17:00	18:00	23	22	30	27	29	30
18:00	19:00	22	21	31	28	31	30
19:00	20:00	21	21	25	24	29	30
20:00	21:00	20	19	24	23	29	30
21:00	22:00	18	18	24	22	29	30
22:00	23:00	16	17	24	23	30	30
23:00	00:00	16	18	24	23	29	30
00:00	01:00	16	18	24	23	29	29
01:00	02:00	15	17	24	22	29	29
02:00	03:00	14	17	24	22	29	29
03:00	04:00	15	17	24	22	29	29
04:00	05:00	15	17	24	23	29	29
05:00	06:00	15	17	24	22	29	29
06:00	07:00	19	19	32	30	30	30
07:00	08:00	23	22	29	27	29	30
08:00	09:00	29	32	33	31	30	30
09:00	10:00	34	41	34	32	38	34
10:00	11:00	24	29	34	32	38	37
Day $L_{Aeq,T}$ dB*		24	25	30	28	30	31
Night $L_{Aeq,T}$ dB		16	17	26	24	29	29

TABLE 3630/T1



Notes

No $L_{Amax(F)}$ above 45 dB

Description

1 minute $L_{Amax(F)}$ in Test Room R1

Project

Greenbrow Social Club, Manchester

Survey Date

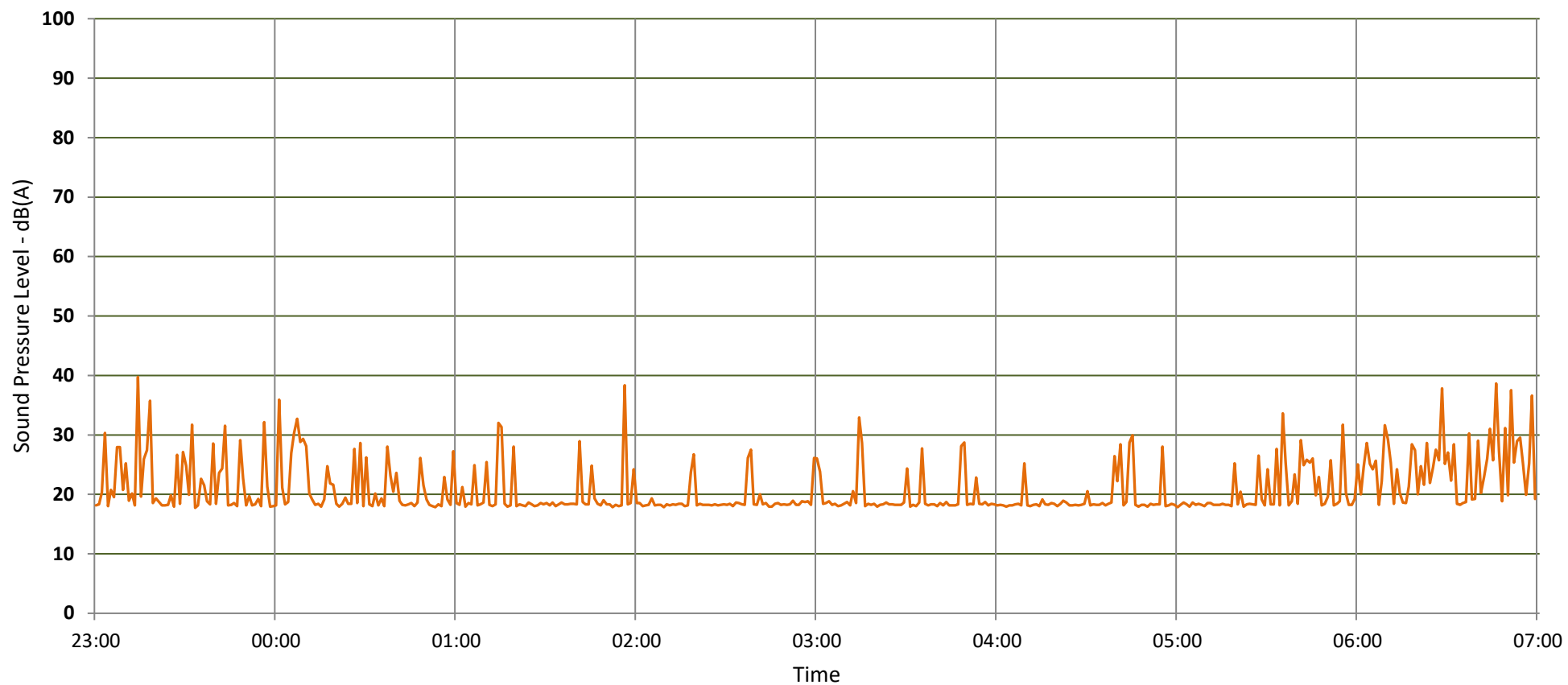
Thursday 16 October to Friday 17 October

Drawing No.

3630/G1



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Notes

No $L_{Amax(F)}$ above 45 dB

Description

1 minute $L_{Amax(F)}$ in Test Room R2

Project

Greenbrow Social Club, Manchester

Survey Date

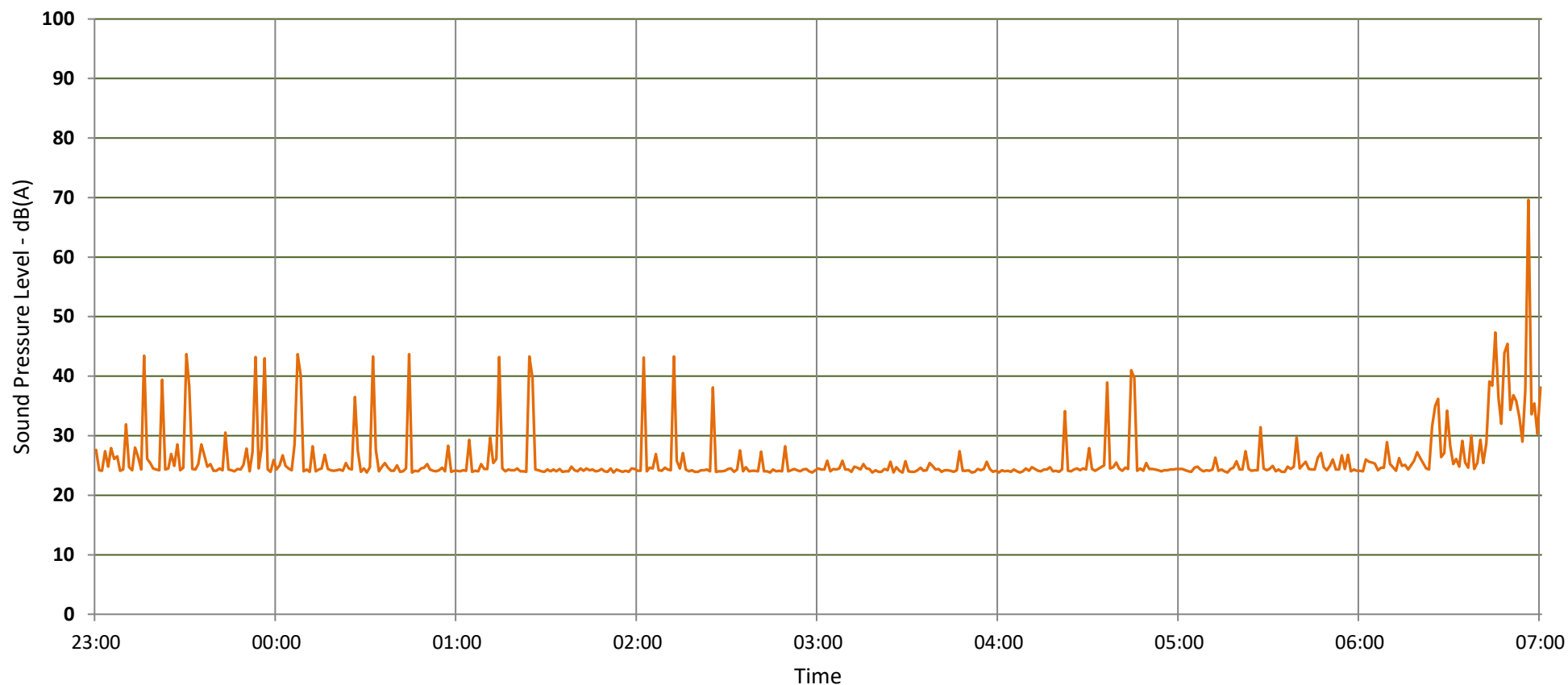
Thursday 16 October to Friday 17 October

Drawing No.

3630/G2



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Notes

$L_{Amax(F)}$ exceeded 45 dB once, probably associated with site being opened up (06:56)

Description

1 minute $L_{Amax(F)}$ in Test Room R3

Project

Greenbrow Social Club, Manchester

Survey Date

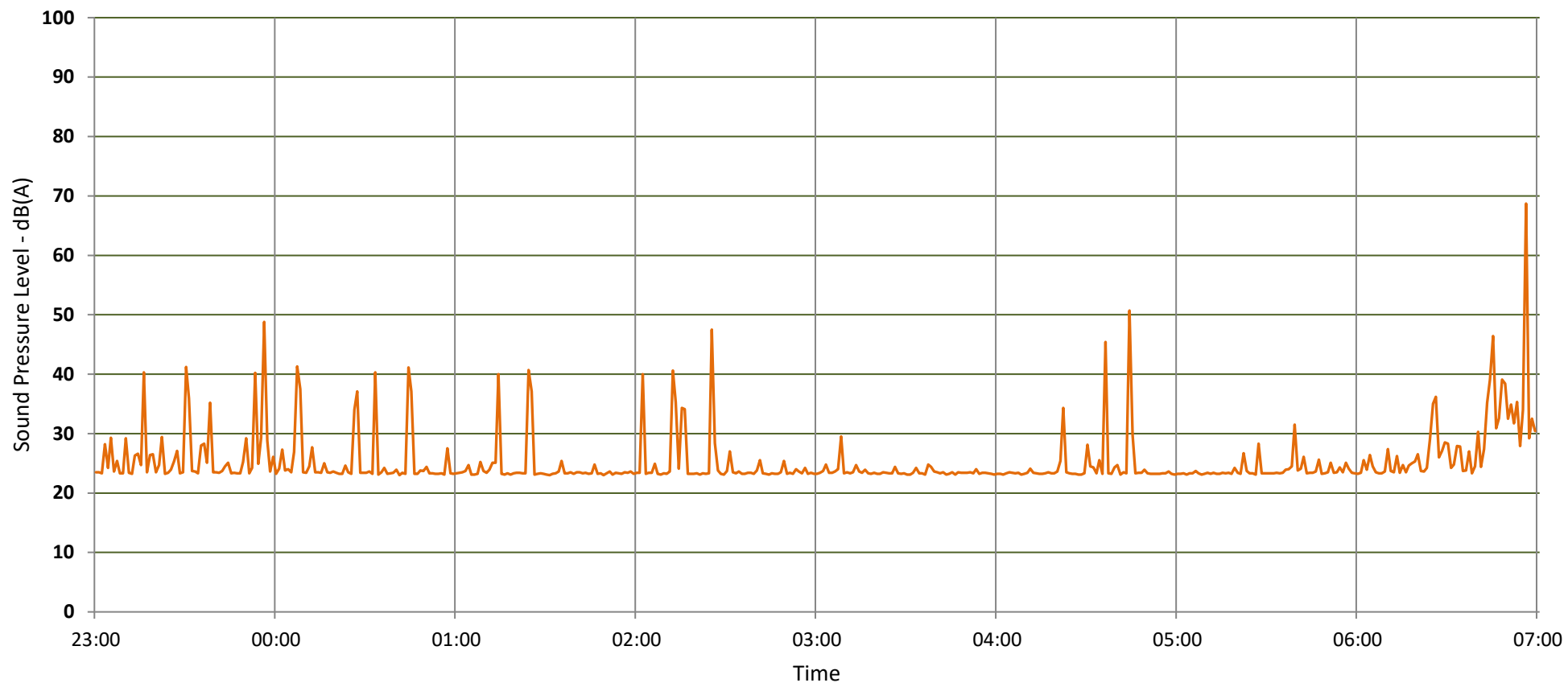
Thursday 16 October to Friday 17 October

Drawing No.

3630/G3



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Notes

$L_{Amax(F)}$ exceeded 45 dB once, probably associated with site being opened up (06:56)

Description

1 minute $L_{Amax(F)}$ in Test Room R4

Project

Greenbrow Social Club, Manchester

Survey Date

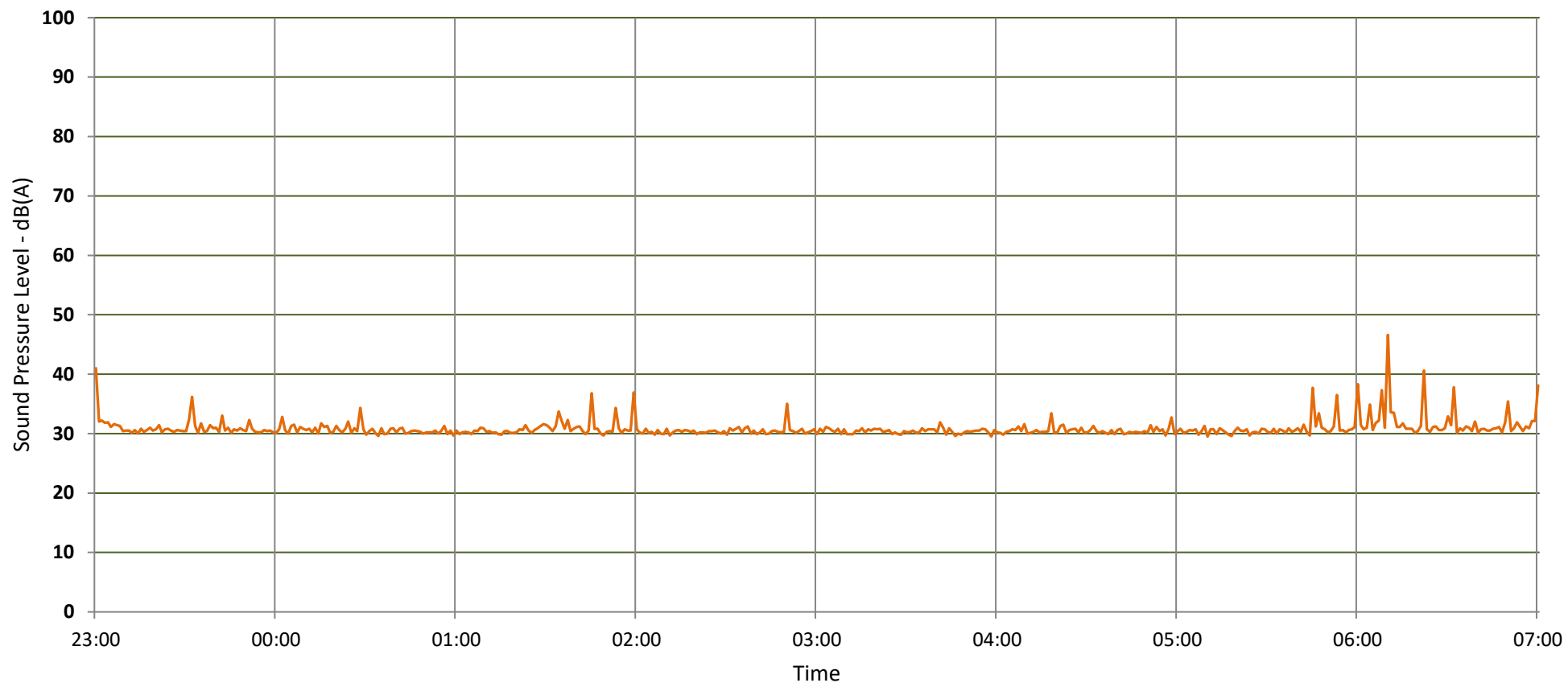
Thursday 16 October to Friday 17 October

Drawing No.

3630/G4



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Notes

No $L_{Amax(F)}$ above 45 dB

Description

1 minute $L_{Amax(F)}$ in Test Room R5

Project

Greenbrow Social Club, Manchester

Survey Date

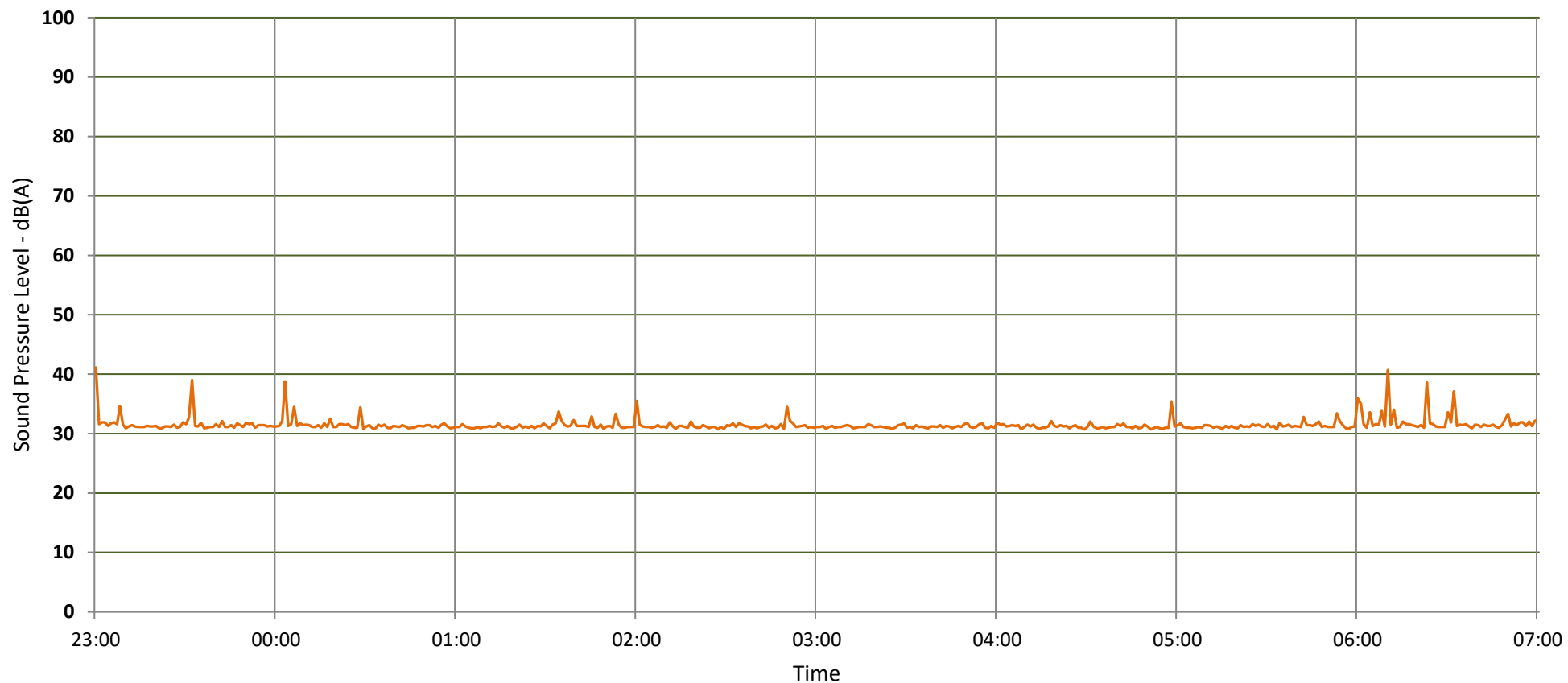
Friday 17 October to Saturday 18 October

Drawing No.

3630/G5



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Notes

No $L_{Amax(F)}$ above 45 dB

Description

1 minute $L_{Amax(F)}$ in Test Room R6

Project

Greenbrow Social Club, Manchester

Survey Date

Friday 17 October to Saturday 18 October

Drawing No.

3630/G6



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APPENDIX A
Instrumentation

Manufacturer	Type and / or Model	Serial Number	Last Laboratory Calibration	Calibrator Output (dB)	Free Field Correction (dB)	Initial reading (dB)	Final reading (dB)
01dB	Blue Solo Class 1 Sound Level Meter	60320	March 2025		-0.10	113.8	113.7
01dB	PRE 21 S Pre-Amplifier	16866					
01dB	MCE 212 ½ inch Microphone	90549					
Norsonic	Nor140 Class 1 Sound Level Meter	1404515	February 2024		-0.20	113.7	113.8
Norsonic	Nor1225 ½" Microphone	142527					
Norsonic	Nor1209 Preamplifier	13885					
Norsonic	Nor140 Class 1 Sound Level Meter	1407647	February 2025		-0.2	113.7	113.7
Norsonic	Nor1225 ½" Microphone	413060					
Norsonic	Nor1209 Preamplifier	22847					
01dB	Fusion 1 Class 1 Sound Level Meter	15131	July 2025		-0.20	113.7	113.7
01dB	Fusion MCE3 Microphone	14038	July 2025				
Norsonic	Nor1251 Calibrator	33453	March 2025	113.88			