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Our Ref: 081801-CUR-XX-XX-T-GE-00006-P01

14/08/2026

Tom Wimpenny
BAM Construction
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The Gateway East
Marsh Lane
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LS9 8AU

Dear Tom

RE: Our Cultural Heart, Kirklees – Clean Cover System Verification Report

Introduction

Curtins was instructed by BAM Construction (BAM) to produce a verification report following the completion of relevant remedial works at the Our Cultural Heart, Kirklees site, which comprised the import of topsoil and subsoil and placement as a clean cover system in areas of soft landscaping across the site.

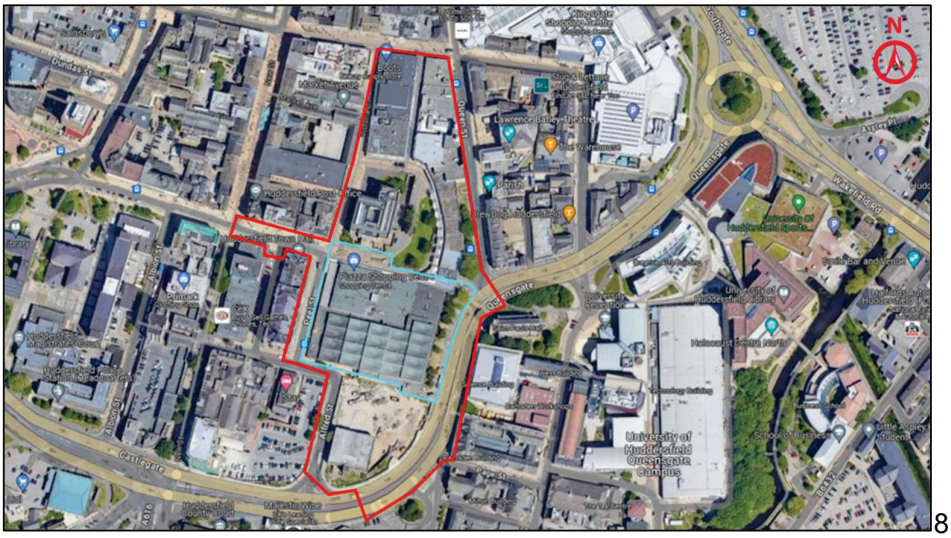
This verification report lays out relevant background information for the development, including a summary of the remedial requirements and of the fieldwork undertaken. A review of the findings is then presented, followed by an assessment of the compliance of the works with the requirements of the Remediation Strategy (Report ref. 081801-CUR-XX-XX-T-GE-00004-P02, dated 30 January 2025).

Background

The proposed Our Cultural Heart, Kirklees redevelopment comprises the conversion of the Grade II listed library into a museum with a new rear extension, the refurbishment of the Grade II listed market hall into a food hall and library with an additional extension, construction of a new multi-use performance venue and multi-storey car park, a new art gallery, and external works including soft landscaping and planters.

The overall redevelopment works are nearing completion at time of writing, including the external landscaping works. A site location plan for the site is presented in *Figure 1*.

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***Figure 1** - Site location plan - approximate wider site boundary shown in red, site works boundary shown in blue.*

Prior to redevelopment, Arup undertook a ground investigation (Report ref. CDT430201-ARP-XX-XX-RP-CG-0002-P01, dated 28 March 2023) which found asbestos to be present in some made ground samples, in addition to exceedances of the selected generic assessment criteria (GAC) for cyanide and selected polyaromatic hydrocarbons (PAHs).

Remedial Requirements

Following the recommendations of the risk assessment presented in the Phase 2 Ground Investigation Report, a remediation strategy (Report ref. 081801-CUR-XX-XX-T-GE-00004-P02, dated 30 January 2025) was produced for the redevelopment. The pollutant linkage highlighted in the Remediation Strategy is summarised in *Table 1*, along with the recommended remedial measures.

***Table 1** – Potential Pollution Linkages highlighted in the remediation strategy.*

Linkage	Source/s	Receptor	Potential Pathway	Remediation Recommendation
1	Made Ground impacted by PAHs, cyanide, and asbestos.	**On-site** Site end-users	Direct contact, ingestion, and inhalation of contaminated soils.	300 mm clean soil cover comprising minimum 150mm topsoil with the remaining depth comprising subsoil placed over a high-visibility marker membrane or hard dig layer in areas of soft landscaping.

The recommended clean cover system requires a minimum provision of 300 mm of clean capping material, to comprise a minimum of 150 mm of topsoil over a free draining subsoil layer. A break layer (e.g. geotextile or hard-dig layer) was recommended.

To verify that sufficient thickness of clean cover and the selected break layer has been placed, the Remediation Strategy includes a requirement for hand excavated trial pits, to be advanced in areas where clean cover has been placed.

Based on approximate measurements from landscape architect drawings (*Appendix A)*, a total soft landscaping area of approximately 1,350 m^2 has been noted. A requirement for 10 no. validation pits has been identified due to the presence of 10 distinct areas of soft landscaping. This corresponds to one pit per area of landscaping, or 1 per 50 m^2 in larger areas.

The Remediation Strategy also included guidance with respect to the sourcing and verification of suitable imported soils, including a recommended testing suite to assess suitability, which included pH, Soil Organic Matter (SOM), heavy metals, PAHs, TPHCWG and asbestos. A testing frequency of

1 sample per 200 m^3, or 4 samples per soil source (whichever is greater) was specified. A requirement for at source testing was also noted, however the Remediation Strategy did not state a required frequency.

BAM has confirmed that soil was imported from two sources, corresponding to one type of topsoil and one type of subsoil. Provided information regarding the tonnage of imported soils and corresponding sampling requirements is presented in *Table 2.*

***Table 2** – Summary of imported soil quantities and corresponding sampling requirements.*

Soil Type	Imported Tonnage (tonnes)	Estimated Volume[1] (m^3)	Testing Requirements (On Site)
Topsoil Type 1	168.82	130	4 no. samples
Subsoil Type 1	343.50	264	4 no. samples

1 – Approximate, based on an assumed loose bulk density of 1,300 kg/m^3

Verification Fieldworks

A Curtins engineer attended site on 09 and 30 July 2026 to inspect the validation hand pits, which were excavated to show the thickness of the capping layer, and to recover a suitable number of soil samples from each soil type. In total, eight samples were recovered and scheduled for laboratory testing, corresponding to four per soil type, with a testing suite selected based on the requirements of the Remediation Strategy.

A total of nine hand pits were excavated across the site area, and the excavated soils were logged in general accordance with the requirements of BS5930:2015 (British Standards Institution. Code of practice for ground investigations, *(BS5930: 2015 + A1:2020).* 2020.), with no visual or olfactory indicators of potential contamination noted at any of the locations. An exploratory hole location plan which shows the sample locations is presented in *Appendix A*.

One area of proposed soft landscaping in the northeast of the site is understood to be part of a future phase of works and is not planned to be completed in line with the completion of this development. BAM has suggested that this area is to be fenced off from the rest of the site until the completion of the next phase of works.

Selected soil samples were placed in laboratory provided containers and stored in cool boxes prior to being transported to the nominated laboratory under the laboratory chain of custody documentation. The laboratory selected by Curtins was i2 Analytical (UKAS and MCERTS accredited). The testing certificates are presented in *Appendix B*.

Assessment – Capping Thickness Validation Pits

During the site visits, nine capping thickness validation hand pits were excavated and assessed by a suitably qualified Curtins engineer. In total, two distinct soil types were noted across the site, corresponding to one type of topsoil and one type of subsoil. This is in accordance with information received from BAM regarding soil having been imported from two sources.

Table 3 presents soil descriptions for each soil type. The validation pit photographic record is enclosed in *Appendix C*.

***Table 3** – BS5930:2015 soil descriptions for the topsoil and subsoil, based on arisings from the verification hand pits.*

Soil Type	Description
Topsoil Type 1	Dark brown sandy slightly gravelly CLAY. Gravel is sub-angular to sub-rounded fine sandstone with common rootlets.
Subsoil Type 1	Light brown gravelly fine to medium grained SAND. Gravel is sub-angular to sub-rounded fine to coarse limestone.

Table 4 presents a summary of the findings of each verification pit, and notes that a hard-dig layer or geotextile membrane was not encountered in the base of any of the inspection pits which were all advanced beyond the minimum depth of the required clean cover layer.

***Table 4** – Summary of verification pit findings.*

Pit Reference	Topsoil Thickness	Subsoil Thickness	Overall Capping Thickness	Thickness Compliant with Remediation Strategy?	'Hard-dig' layer encountered at base?
Topsoil / Subsoil – Type 1					
HP201	200 mm	>500 mm	>700 mm	Yes	N/A
HP202	200 mm	>250 mm	>450 mm	Yes	N/A
HP203	250 mm	>200 mm	>450 mm	Yes	N/A
HP204	250 mm	>200 mm	>450 mm	Yes	N/A
HP205	300 mm	>100 mm	>400 mm	Yes	N/A
HP206	250 mm	>150 mm	>400 mm	Yes	N/A
HP207	350 mm	>250 mm	>600 mm	Yes	N/A
HP208	200 mm	>300 mm	>500 mm	Yes	N/A
HP209	200 mm	>200 mm	>400 mm	Yes	N/A

Based on discussions with BAM, a layer of gravel hardcore or concrete hardstand are understood to have been placed beneath the areas of soft landscaping and planters. Whilst this hard-dig layer was not encountered in any of the inspection pits, BAM has reassured Curtins that it was placed. BAM has provided a timelapse of the siteworks which shows the formation of selected areas of the site and provides evidence of a gravel hardcore being laid in these areas. Selected still images from the timelapse are provided in *Appendix D*.

Additionally, BAM have provided design drawings showing selected areas of the site proposed to be underlain by retained concrete hardstand, or newly installed concrete hardstand. These are included in Appendix A.

Furthermore, the thickness of the cover layer evidenced in the inspection pits is greater than the minimum required and provides additional protection to the end users.

Assessment - Chemical Testing Results

BAM has provided records relating to the import of the soils, including at-source testing (*Appendix B*) and delivery tickets, these have been reviewed in addition to the in-situ information gathered by Curtins.

The chemical laboratory data has been screened against the generic assessment criteria (GACs) based on a *'Public Open Space* end-use for an SOM of 1 %. The relevant GACs are presented in *Appendix E*. The outcomes of the screening are summarized in *Table 5*.

***Table 5** – Summary of screening results for imported soils*

Soil Type		Tests Undertaken	Tests Passing Screening Criteria	Material Considered Suitable?
Topsoil Type 1	At Source[1]	1	1 (100%)	Yes
	On Site	4	4 (100%)	
Subsoil Type 1	At Source[1]	1	1 (100%)	Yes
	On Site	4	4 (100%)	

1 – While the remediation strategy did not include a frequency requirement for at source testing, the frequency undertaken (corresponding to at least 1 sample per 250m^3) is deemed acceptable.

With respect to the *'Public Open Space'* end-use GAC, no exceedances were recorded within any of samples submitted for testing. All soil samples were screened for asbestos, with no asbestos being identified in any of the samples.

Summary and Conclusions

Curtins has undertaken an assessment of the remedial actions undertaken at the Our Cultural Heart, Kirklees site, in relation to the remedial requirement for the implementation of a clean cover system in areas of soft landscaping.

The assessment comprised a review of the information provided by BAM, including site plans, soil import records, at-source chemical testing certificates, site photographs and timelapse stills. In addition, fieldworks were undertaken by a Curtins engineer, including assessment of nine capping thickness validation pits and the recovery of a suitable number of soil samples for laboratory testing from the imported topsoil and subsoil.

Based on the findings of the assessment:

- The clean cover layer has been installed in accordance with the requirements of the remediation strategy, with sufficient thicknesses of topsoil (>150 mm) and overall capping (>300mm) verified by visual inspection. Although a hard dig layer or hi-vis membrane was not encountered in the validation pits observed by Curtins, BAM has reassured Curtins that the break layer is present in the form of granular hardcore or concrete hardstand. A timelapse video showing evidence of this in selected areas of the site was provided by BAM and has been presented herein.
- Chemical testing of the soils imported to form the cover layer has been undertaken in accordance with the frequency requirements of the Remediation Strategy. The results of the chemical testing have been screened, and no exceedances of the relevant GAC values have been noted.

Therefore, the potential pollution linkage identified in the Remediation Strategy and *Table 1* no longer presents a potentially unacceptable risk to human health receptors, and the site is considered suitable for use with respect to the identified remedial requirements.

Yours faithfully,

REDACTED

REDACTED

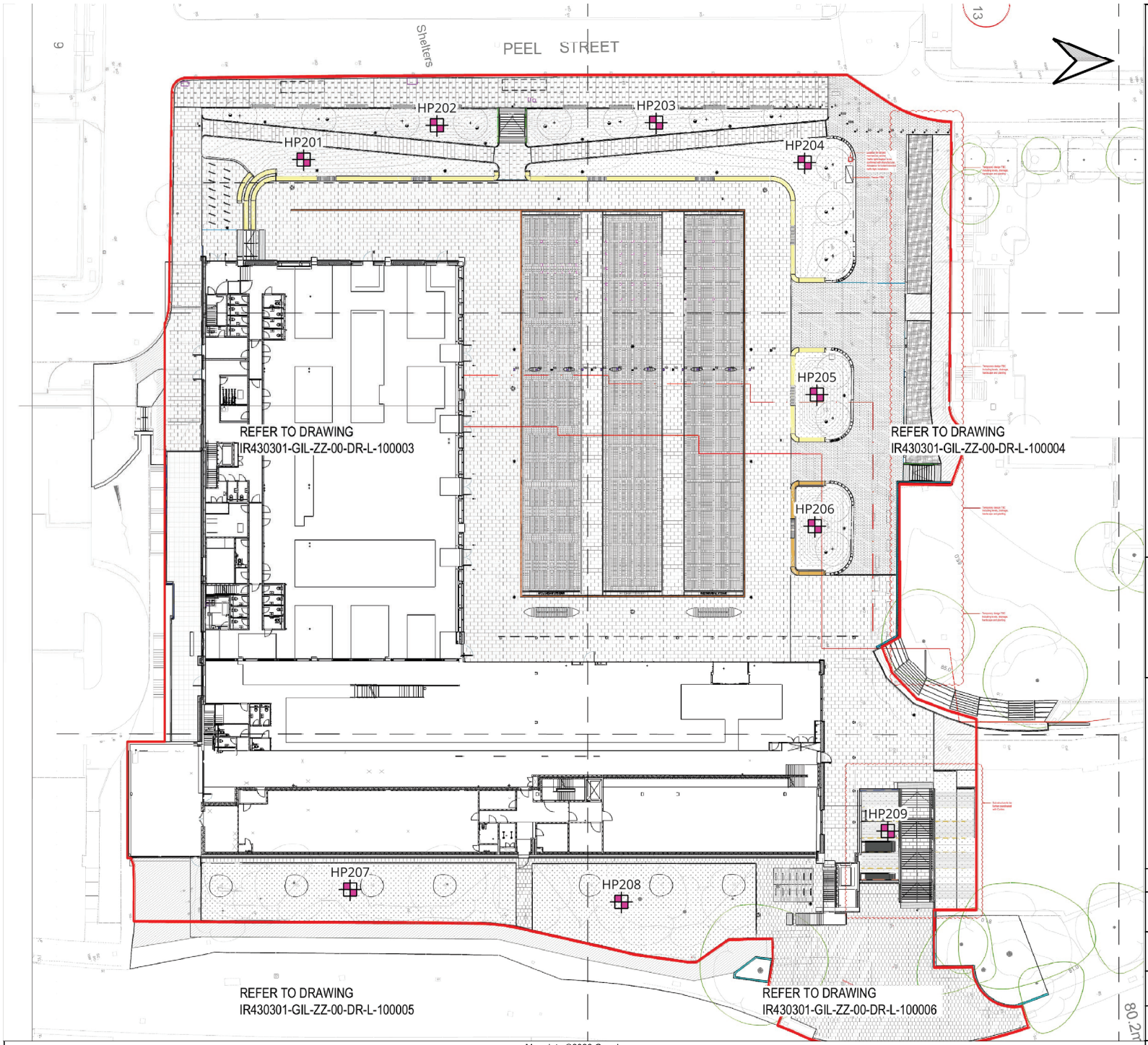
Evie Allen
Geo-environmental Engineer
BSc (Hons) FGS

For and on behalf of
Curtins Consulting Ltd

Chris Ryan
Senior Geo-environmental Engineer
BSc (Hons) FGS

Curtins

Appendix A – Drawings



Pits

Reproduced from Gillespies Drawing Ref. IR430301-GIL-ZZ-00-DR-L-000001, dated 14.08.2023

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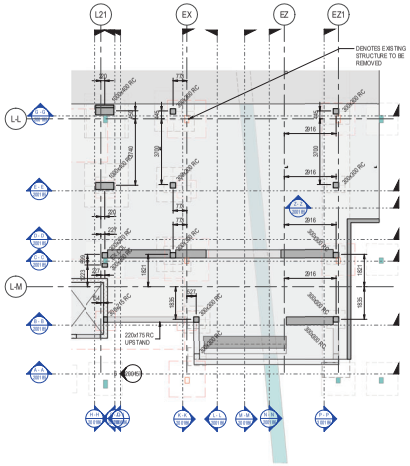
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Status	INFORMATION
Project:	**Our Cultural Heart, Kirklees**
Drg Title:	**Validation Pit Location Plan**

Scale:	Size:	Issue Date:	Drawn:	Checked:
NTS	**A3**	**12/08/2026**	**CR**	**ES**

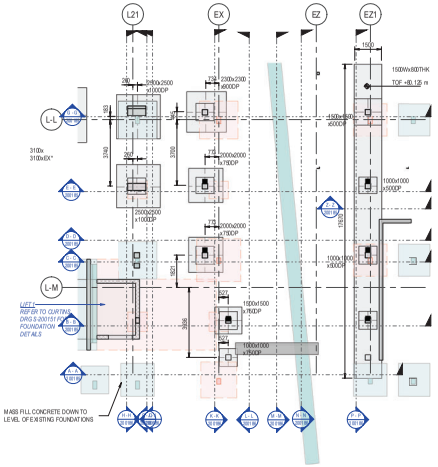
Drg No:	Rev:
081801-CUR-XX-XX-D-GE-00002	**P01**

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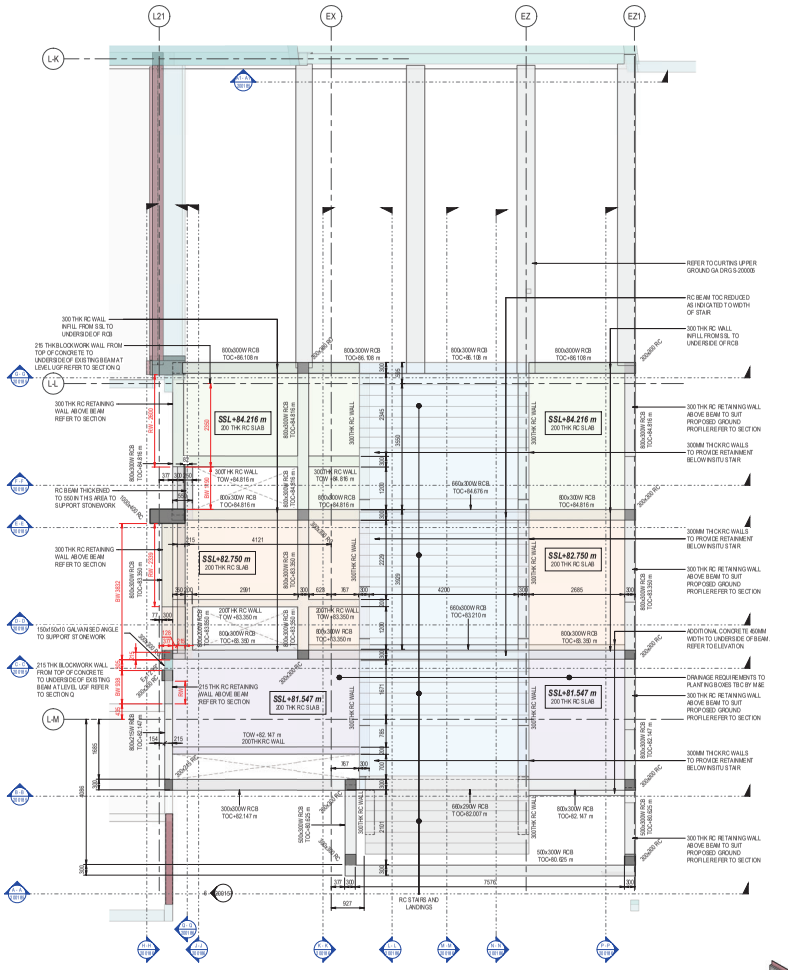
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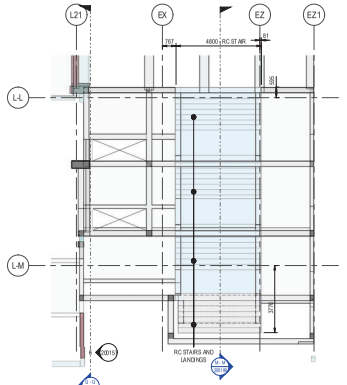
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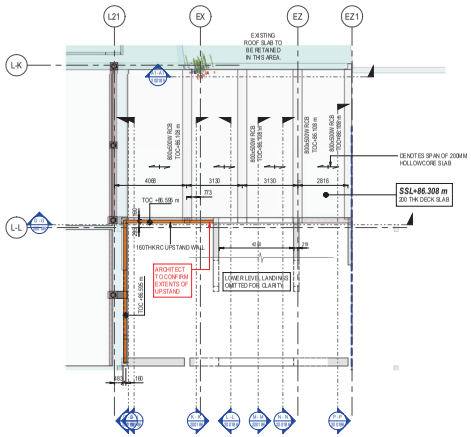
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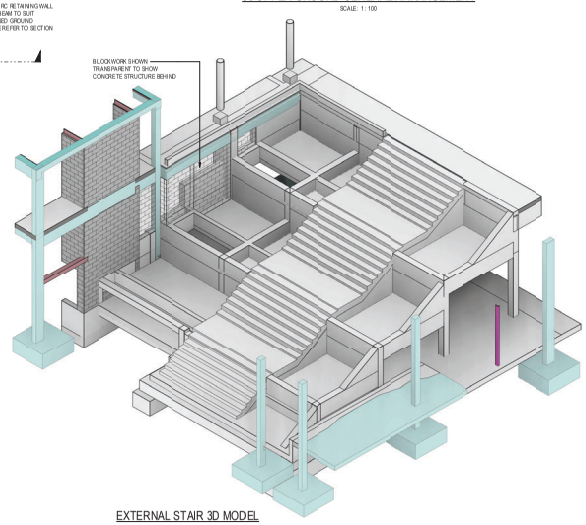
EXTERNAL STAIR SETTING OUT

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EXTERNAL STAIR SUPPORT STRUCTURE - LEVEL 00 UPPER GROUND GENERAL ARRANGEMENT

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EXTERNAL STAIR 3D MODEL

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2.04	Crowd induced vibration to existing structure.
2.05	Building over existing movement joint.
2.06	Loading limitations to existing retained parts of the structure
3.01	Services to be diverted with confirmation of any easements.
3.02	Building foundations near existing 700dia culvert
4.01	Demolition of existing foundations
4.02	Demolition of existing super structure elements.
4.03	Structural Support for Existing Façade
4.04	Structural stability of external lift pits and existing retained ceramic wall panel
4.05	Existing RC beams proposed to be cut
4.06	Existing Foundation and column demolition
4.07	Existing Foundation Demolition Sequencing
4.08	Existing Retaining wall Foundation Demolition
4.09	Existing stone wall stability
4.1	Existing retaining wall stability
4.11	Existing retaining prop removal
4.12	Existing column Loss of restraint
4.13	Demolition of existing RC ramp
4.14	Existing column Loss of restraint
4.15	Existing cantilever RC beams being cut
4.16	demolition near existing retaining wall
4.17	Cutting of existing retained RC slab
4.18	Existing Slab Demolition
4.19	Notching of Existing Level 01 Masonry Wall
6.01	Existing obstructions (Foundations).
7.01	Installation of Circular pinned columns supporting fit floor plate.
7.02	Dewatering to ground water found during intrusive survey works
7.03	Temporary stability during construction works
7.04	Temporary support of proposed metal deck.
7.05	Temporary support of existing beam.

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REFER TO CURTINS DRAWINGS S-200185 FOR SECTIONS AND DETAILS

ALL CONCRETE TO BE WATERPROOF GRADE C32/40

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Rev	Description	Date	By	Chkd
C13	FINAL CONSTRUCTION	13.08.25	JO	TL
C12	FINAL CONSTRUCTION	13.08.25	TG	HK
C11	SLU DROPPING WALL ADDED TO EXTERNAL STAIR AS CLOUDED	13.10.25	TG	HK
C10	EXTERNAL STAIRS REVISED AS CLOUDED	03.10.25	TG	HK
C9	EXTERNAL STAIR REVISED AS CLOUDED	02.10.25	TG	HK
C8	ADDITIONAL CONCRETE ADDED AS CLOUDED	10.11.25	AP	HK
C7	LOCK AND BEAM UPDATED AS CLOUDED	13.08.25	AP	HK
C6	2 NO. CLOUDED NOTE ADDED	23.08.25	AP	HK
C5	BLOCKWORK CONSTRUCTION	23.07.25	AP	HK
C4	INFILL WALLS ADDED AS CLOUDED	08.04.25	TG	HK
R4	REVISED TO SUIT COMMENTS AND INSITU STAIR	13.12.24	AP	HK
R3	STAGE4 ISSUE REVISED AS CLOUDED	18.07.24	TG	HK
R2	REVISED TO SUIT LANDSCAPE MODEL	28.06.24	AP	HK
R1	PRELIMINARY ISSUE	31.01.24	AP	HK

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Site loc: FINAL CONSTRUCTION

Project: OUR CULTURAL HEART, HUDDERSFIELD

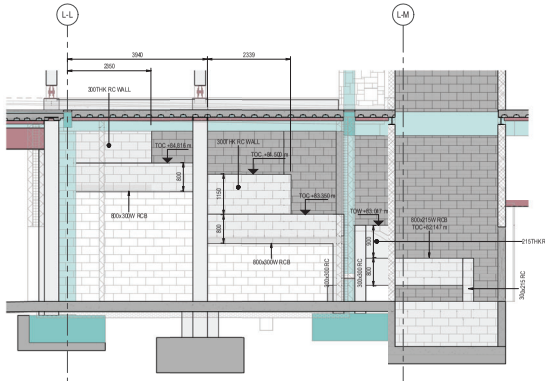
Drg Title: EXTERNAL STAIR - GENERAL ARRANGEMENT

Drawn By	Designed By	Checked By
AP	HK	TL
Project No	Date	Size ins @ A1
IR430301	02.06.25	As indicated

Project Code – Origin etor – Fur ction – Sys tem – Discipline – Number — Revision

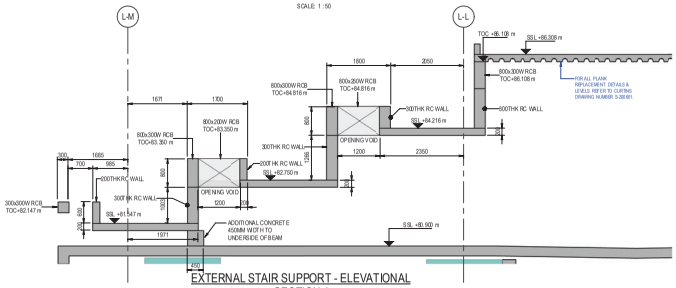
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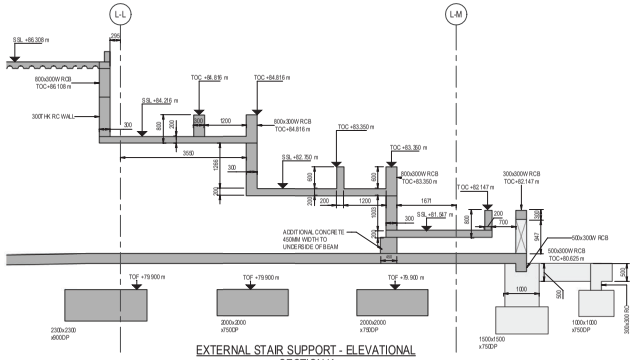
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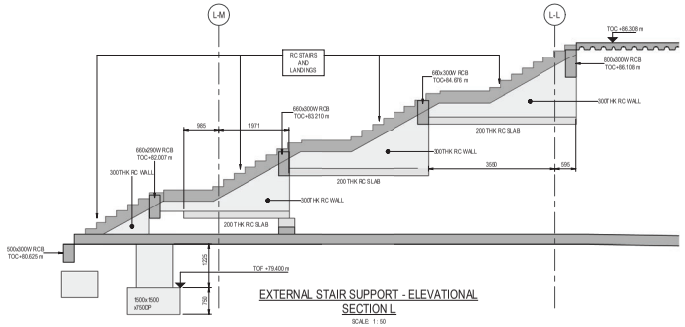
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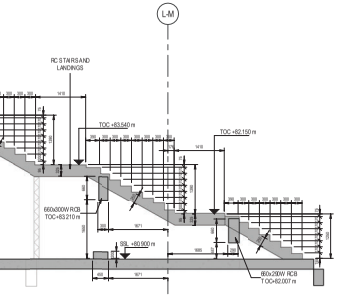
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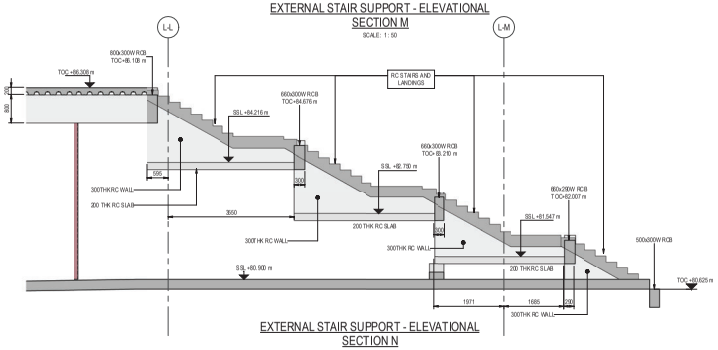
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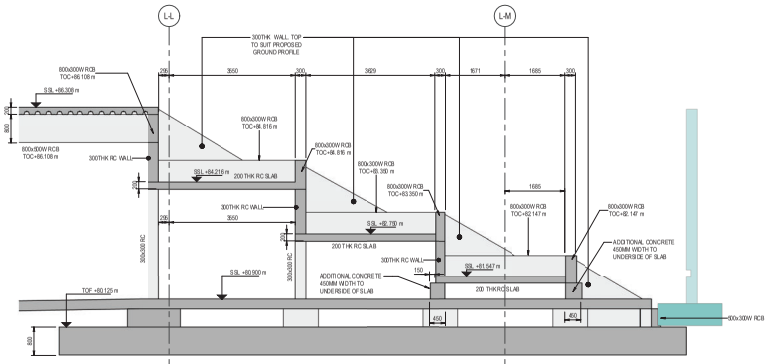
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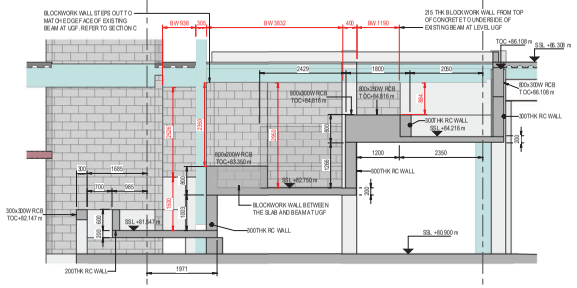
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EXTERNAL STAIR SUPPORT - ELEVATIONAL SECTION P

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2.06	Loading limitations to existing retained parts of the structure
3.01	Services to be diverted with confirmation of any easements
3.02	Building foundations near existing 750dia culvert
4.01	Demolition of existing foundations
4.02	Demolition of existing super structure elements
4.03	Structural Support for Existing Façade
4.04	Structural stability of external lift tarise and existing retained ceramic wall panel
4.05	Existing RC beam proposed to be cut
4.06	Existing Foundation and column demolition
4.07	Existing Foundation Demolition Sequencing
4.08	Existing Retaining wall Foundation Demolition
4.09	Existing stone wall stability
4.1	Existing retaining wall stability
4.11	Existing retaining prop removal
4.12	Existing column loss of restraint
4.13	Demolition of existing RC core
4.14	Existing column loss of restraint
4.15	Existing cantilever RC beam being cut
4.16	demolition near existing retaining wall
4.17	Cutting of existing retained RC slab
4.18	Existing Slab Demolition
4.19	Notching of Existing Level 01 Masonry Wall
6.01	Existing obstructions (Foundations)
7.01	Installation of circular pinned columns supporting 1st floor slab
7.02	Dewatering to ground water found during intrusive survey works
7.03	Temporary stability during construction works.
7.04	Temporary support of proposed metal deck
7.05	Temporary support of existing beam.

ALL CONCRETE TO BE WATERPROOF GRADE C32/40

FINAL CONSTRUCTION NOTE:

1. THE INFORMATION ON THIS DRAWING REPRESENTS THE FINAL CONSTRUCTION ISSUE INFORMATION INCORPORATING ANY DETAIL AMENDMENTS ADVISED BY THE CONTRACTOR DURING THE WORKS.
2. THIS INFORMATION SHOULD BE READ IN CONJUNCTION WITH THE NOTES AND BACKGROUND INFORMATION HELD IN THE PROJECT BUILDING FILE.

Rev	Description	Date	By	Chkd
C08	FINAL CONSTRUCTION	23.07.25	GS	TR
C07	SLC DESIGN WALL ADDED TO EXTERNAL STAIR AS CLOUDED	12.12.25	GS	TR
C06	LOCKWALL STAIRS REVISED AS CLOUDED	03.12.25	GS	TR
C05	LOCKWALL STAIR REVISED AS CLOUDED	03.12.25	GS	TR
C04	ADDITIONAL CONCRETE ADDED AS CLOUDED	19.11.25	AP	TR
C03	DECK AND BEAMS UPDATED AS CLOUDED	13.08.25	AP	TR
C02	SLC ADDED NOTE ADDED	24.06.25	AP	TR
C01	ISSUED FOR CONSTRUCTION	23.07.25	AP	TR

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Birmingham Bristol Cambridge Cardiff Dublin Edinburgh Glasgow Kendal Leeds Liverpool London Manchester Nottingham

Site Ref: FINAL CONSTRUCTION

Project: OUR CULTURAL HEART, HUDDERSFIELD

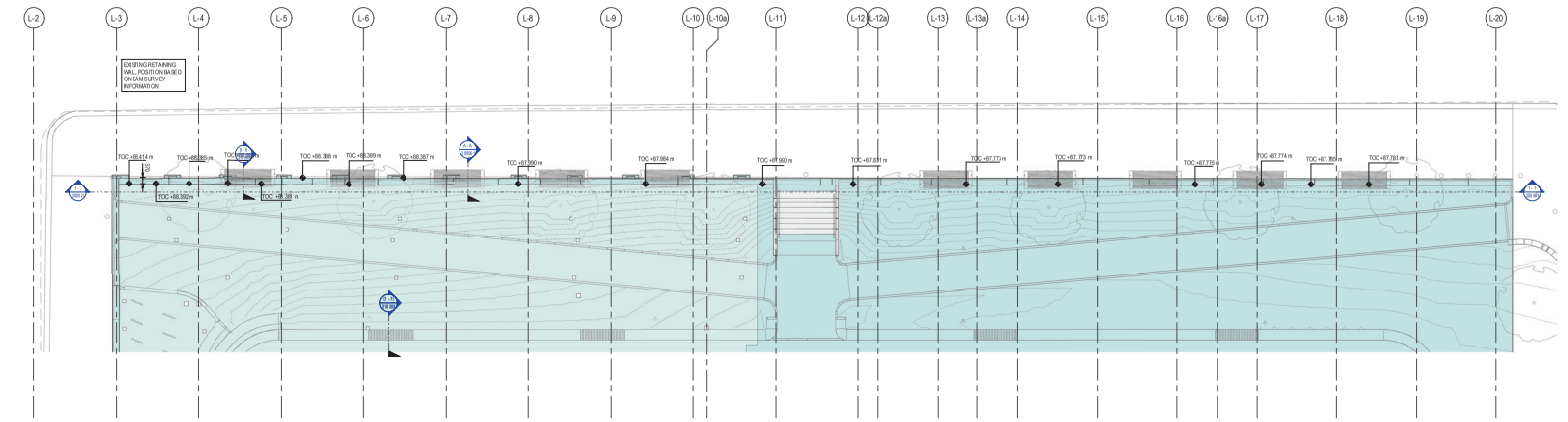
Drg Title: EXTERNAL STAIR - SECTIONS SHEET 2

Drawn By	Designed By	Checked By
AP	HK	TL
Project No	Date	Size ins @ A4
IR430301	02.06.25	As indicated

Project Code – Originator – Volume/System – Spatial – Form – Discipline – Number

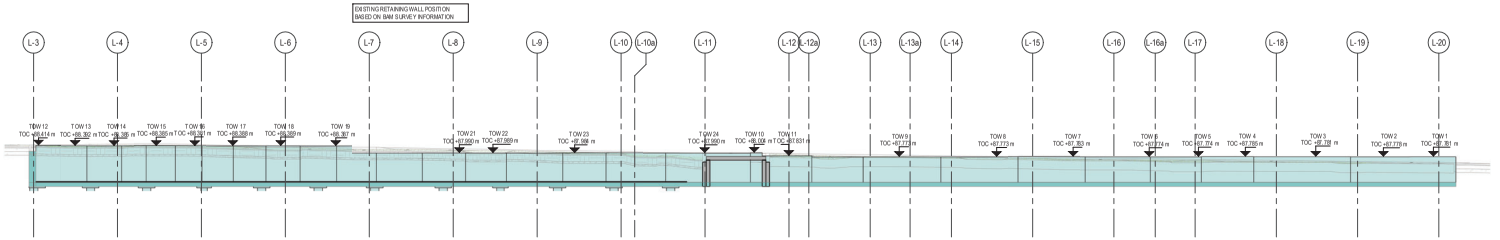
IR430301-CUR-XX-00-DR-S-200186 — Revision: C08

IR430301-CUR-XX-XX-DR-S-200181



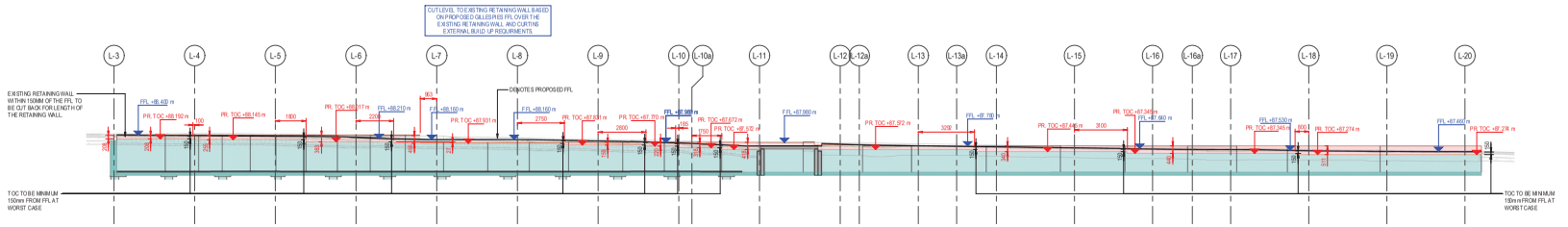
PEEL STREET RETAINING WALL GA

SCALE: 1 : 100



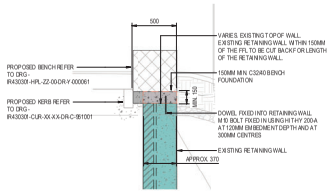
EXISTING ELEVATION 1 ON PEEL STREET RETAINING WALL

SCALE: 1 : 100



PROPOSED ELEVATION 1 ON PEEL STREET RETAINING WALL

SCALE: 1 : 100



SECTION A-A ON PEEL EXISTING RETAINING WALL (THROUGH PROPOSED BENCH)

SCALE: 1 : 20

GENERAL NOTES:

1. THIS DRAWING IS TO BE READ IN CONJUNCTION WITH ALL RELEVANT ARCHITECTS AND ENGINEERS DRAWINGS AND SPECIFICATIONS.
2. DO NOT SCALE THIS DRAWING. ANY AMBIGUITIES, OMISSIONS AND ERRORS ON DRAWINGS SHALL BE BROUGHT TO THE ENGINEERS ATTENTION IMMEDIATELY. ALL DIMENSIONS MUST BE CHECKED / VERIFIED ON SITE.
3. ALL DIMENSIONS ARE IN MILLIMETRES UNLESS NOTED OTHERWISE.

EXISTING INFORMATION LEGEND
(NOTE: THIS DRAWING MUST BE PRINTED IN COLOUR)

DENOTES EXISTING STRUCTURE TO REMAIN

DENOTES DEMOLISHED EXISTING STRUCTURE. REFER TO DEMOLITION GENERAL ARRANGEMENTS

DURABILITY - MATERIALS AND FINISHES

ITEM	MATERIAL	FINISH / LOCATION
EXISTING RETAINING WALL	REINFORCED CONCRETE SPECIFIED ON ARCHIVE DRAWINGS AS C32/40 CONCRETE	PEEL STREET BURR WALL FINISH REMAINS UNCHANGED. BRUSH APPLIED FOSROC NITOPRIME ZINCRICH PLUS FINISHES HAVE BEEN INSTALLED FOR REBAR PROTECTION. FURTHER CORROSION PROTECTION DETAILS ARE SPECIFIED IN APPENDIX B.

FINAL CONSTRUCTION NOTE:
1. THE INFORMATION ON THIS DRAWING REPRESENTS THE FINAL CONSTRUCTION IN BLUE INFORMATION INCORPORATING ANY DETAIL AMENDMENTS ADVISED BY THE CONTRACTOR DURING THE WORKS.
2. THIS INFORMATION SHOULD BE READ IN CONJUNCTION WITH THE NOTES AND BACKGROUND INFORMATION HELD IN THE PROJECT BUILDING FILE.

Rev	Description	Date	By	Chkd
C0.4	FINAL CONSTRUCTION	12.08.25	AS	TL
C0.4	FINAL CONSTRUCTION	14.03.25	CD	TL
C0.3	SECTION AA ADDED	28.08.25	AP	TL
C0.2	RETAINING WALL UPDATED TO BE 150mm BELOW PROPOSED FFL	11.08.25	CD	TL
C0.1	FIRST ISSUE	11.07.25	AP	TL

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Birmingham Bristol Cambridge Cardiff Dingwall Dublin Edinburgh Glasgow Kendal Leeds Liverpool London Manchester Nottingham

Site loc: FINAL CONSTRUCTION

Project: OUR CULTURAL HEART, HUDDERSFIELD

Drg Title: PEEL STREET RETAINING WALL

Drawn By	Designed By	Checked By
AP	HK	TL
Project No	Date	Size res @ A1
IR430301	02.06.25	As indicated

Project Code - Origin other - Per other - Type Nat. - Fn im. - Discipline - Number

IR430301 - CUR - XX - 00 - DR - S - 200561

Revision: C05

IR430301-CUR-ZZ-XX-DR-A-000001

Appendix B – Chemical Testing Certificates

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Watford,
Herts,
WD18 8YS

t: 01923 225404
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e: info-i2analytical@normecgroup.com

Analytical Report Number : 26-037754

Project / Site name:	OCH Kirklees	**Samples received on:**	13/07/2026
Your job number:	81801	**Samples instructed on/ Analysis started on:**	13/07/2026
Your order number:	33498	**Analysis completed by:**	24/07/2026
Report Issue Number:	1	**Report issued on:**	24/07/2026
Samples Analysed:	8 soil samples		

REDACTED

Signed:

Rachel Chappell
Key Account Manager
For & on behalf of i2 Analytical Ltd.

Standard Geotechnical, Asbestos and Chemical Testing Laboratory located at: ul. Pionierów 39, 41-711 Ruda Śląska, Poland.

Accredited tests are defined within the report, opinions and interpretations expressed herein are outside the scope of accreditation.

Standard sample disposal times, unless otherwise agreed with the laboratory, are :

soils	- 4 weeks from reporting
leachates	- 2 weeks from reporting
waters	- 2 weeks from reporting
asbestos	- 6 months from reporting
air	- once the analysis is complete

Excel copies of reports are only valid when accompanied by this PDF certificate.

Retention period for records and reports is minimum 6 years from the date of issue of the final report.
Some records may be kept for longer according to other legal/best practice requirements.

Any assessments of compliance with specifications are based on actual analytical results with no contribution from uncertainty of measurement.
Application of uncertainty of measurement would provide a range within which the true result lies.
An estimate of measurement uncertainty can be provided on request.

This certificate should not be reproduced, except in full, without the express permission of the laboratory.
The results included within the report are representative of the samples submitted for analysis.

Analytical Report Number: 26-037754
Project / Site name: OCH Kirklees
Your Order No: 33498

Lab Sample Number				981075	981076	981077	981078	981079
Sample Reference				HP202	HP204	HP205	HP206	HP201
Sample Number				ES01	ES01	ES01	ES01	ES02
Water Matrix				N/A	N/A	N/A	N/A	N/A
Depth (m)				0.10	0.15	0.20	0.10	0.30
Date Sampled				09/07/2026	09/07/2026	09/07/2026	09/07/2026	09/07/2026
Time Taken				None Supplied	None Supplied	None Supplied	None Supplied	None Supplied
Analytical Parameter (Soil Analysis)	Units	Test Limit of detection	Test Accreditation Status					
Mass of stone >10mm	%	0.1	NONE	< 0.1	0.2	< 0.1	< 0.1	0.7
Moisture Content	%	0.01	NONE	4.3	6.1	11	8	4.6
Total mass of sample received	kg	0.1	NONE	0.7	0.7	0.7	0.7	0.8
Asbestos								
Asbestos in Soil Detected/Not Detected	Type	N/A	ISO 17025	Not-detected	Not-detected	Not-detected	Not-detected	Not-detected
Asbestos Analyst ID	N/A	N/A	N/A	WIK	WIK	WIK	WIK	WIK
Analysis completed	N/A	N/A	N/A	23/07/2026	23/07/2026	23/07/2026	23/07/2026	23/07/2026
General Inorganics								
pH (L099)	pH Units	N/A	MCERTS	8.1	8.1	8.3	7.8	8.5
Water Soluble Sulphate as SO_4 16hr extraction (2:1)	mg/kg	2.5	MCERTS	240	330	220	200	270
Water Soluble SO_4 16hr extraction (2:1 Leachate Equivalent)	mg/l	1.25	MCERTS	118	167	108	99.8	133
Organic Matter (automated)	%	0.1	MCERTS	5.2	4.2	3.9	3.9	0.6
Speciated PAHs								
Naphthalene	mg/kg	0.05	MCERTS	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05
Acenaphthylene	mg/kg	0.05	MCERTS	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05
Acenaphthene	mg/kg	0.05	MCERTS	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05
Fluorene	mg/kg	0.05	MCERTS	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05
Phenanthrene	mg/kg	0.05	MCERTS	0.25	0.08	0.2	0.38	0.12
Anthracene	mg/kg	0.05	MCERTS	0.08	< 0.05	0.06	0.15	< 0.05
Fluoranthene	mg/kg	0.05	MCERTS	0.72	0.22	0.44	0.9	0.13
Pyrene	mg/kg	0.05	MCERTS	0.67	0.21	0.42	0.81	0.14
Benzo(a)anthracene	mg/kg	0.05	MCERTS	0.46	0.13	0.24	0.47	0.09
Chrysene	mg/kg	0.05	MCERTS	0.39	0.14	0.25	0.44	0.07
Benzo(b)fluoranthene	mg/kg	0.05	ISO 17025	0.5	0.15	0.26	0.51	0.08
Benzo(k)fluoranthene	mg/kg	0.05	ISO 17025	0.18	0.08	0.14	0.2	< 0.05
Benzo(a)pyrene	mg/kg	0.05	MCERTS	0.44	0.12	0.25	0.42	0.07
Indeno(1,2,3-cd)pyrene	mg/kg	0.05	MCERTS	0.21	0.07	0.14	0.21	< 0.05
Dibenz(a,h)anthracene	mg/kg	0.05	MCERTS	0.05	< 0.05	< 0.05	< 0.05	< 0.05
Benzo(ghi)perylene	mg/kg	0.05	MCERTS	0.24	0.09	0.15	0.24	0.06
Total PAH								
Speciated Total EPA-16 PAHs	mg/kg	0.8	ISO 17025	4.18	1.29	2.56	4.73	< 0.80
Heavy Metals / Metalloids								
Arsenic (aqua regia extractable)	mg/kg	1	MCERTS	2.8	3.7	3	3.1	4.1
Boron (water soluble)	mg/kg	0.2	MCERTS	0.9	1.3	1.5	1.2	0.4
Cadmium (aqua regia extractable)	mg/kg	0.2	MCERTS	< 0.2	< 0.2	< 0.2	< 0.2	< 0.2
Chromium (hexavalent) Low Level	mg/kg	1.2	NONE	< 1.2	< 1.2	< 1.2	< 1.2	< 1.2
Chromium (aqua regia extractable)	mg/kg	1	MCERTS	8.9	11	8.9	9.4	10
Copper (aqua regia extractable)	mg/kg	1	MCERTS	21	19	19	18	17
Lead (aqua regia extractable)	mg/kg	1	MCERTS	20	16	18	18	12
Mercury (aqua regia extractable)	mg/kg	0.3	MCERTS	< 0.3	< 0.3	< 0.3	< 0.3	< 0.3
Nickel (aqua regia extractable)	mg/kg	1	MCERTS	9.4	12	9.7	10	21
Selenium (aqua regia extractable)	mg/kg	1	MCERTS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Zinc (aqua regia extractable)	mg/kg	1	MCERTS	44	43	39	41	38

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