

LOCATION : MAIDA VALE

BOREHOLE No. : 3

BOREHOLE DIA. : 8" x 6"

GROUND LEVEL : 109.2' O.D.

DATE (Start) : 8 . 2 . 66

WATER LEVEL : See Note

Description	Thickness	Depth	Sample	Remarks
MADE GROUND	1' - 0"	0' - 0"		
Firm mottled blue & brown silty CLAY (becoming stiff)	15' - 0"	1' - 0"	1	29 blows to drive 1' - 0"
			2	34 blows to drive 1' - 0"
			3	33 blows to drive 1' - 0"
			4	37 blows to drive 1' - 0"
CLAYSTONE	1' - 0"	19' - 0"	5	
Stiff blue & brown silty CLAY	9' - 0"	20' - 0"	6	38 blows to drive 1' - 0"
			7	41 blows to drive 1' - 0"
		29' - 0"	8	35 blows to drive 1' - 0"
Very stiff blue-grey silty CLAY	11' - 0"		9	40 blows to drive 1' - 0"
		40' - 0"	10	45 blows to drive 1' - 0"
BOREHOLE COMPLETE				
Note: Borehole drilled to 40' - 0" & cased to 20' - 0" in the dry. Water rose to 15' - 0" overnight.				

FOUNDATION ENGINEERING
Ltd.

BOREHOLE LOG

TQ 28SE 1680
2572 8334

LOCATION : MAIDA VALE

BOREHOLE No. : 1 Sheet 1 of 2

BOREHOLE DIA. : 6"

GROUND LEVEL : 107.0' O.D.

DATE (Start) : 9 . 2 . 66

WATER LEVEL : See Note

Description	Thickness	Depth	Sample	Remarks
MADE GROUND brick rubble	1'-0"	0'-0" 1'-0"		
			1	31 blows to drive 1'-0"
			2	35 blows to drive 1'-0"
Stiff blue & brown silty CLAY	25'-0"			
			3	37 blows to drive 1'-0"
			4	39 blows to drive 1'-0"
			5	44 blows to drive 1'-0"
		26'-0"	6	47 blows to drive 1'-0"
Very stiff grey silty CLAY	34'-0" +			
			7	39 blows to drive 1'-0"
			8	46 blows to drive 1'-0"
			9	48 blows to drive 1'-0"
			10	51 blows to drive 1'-0"
		50'-0"		

BOREHOLE SCALE : 1" = 5' • : DISTURBED SAMPLE : UNDISTURBED SAMPLE + STANDARD PENETRATION TEST

LOCATION : MAIDA VALE

BOREHOLE No. : 1 Sheet 2 of 2

BOREHOLE DIA. :

GROUND LEVEL :

DATE (Start) :

WATER LEVEL :

Description	Thickness	Depth	Sample	Remarks
Very stiff grey silty CLAY	34'-0" +	50'-0"		11 54 blows to drive 1'-0"
				12 59 blows to drive 1'-0"
		60'-0"		BOREHOLE COMPLETE
				Note: Borehole drilled to 50'-0" & cased to 20'-0" in the dry, water rose to 15'-0" overnight

QUALITATIVE RISK ASSESSMENT METHODOLOGY

The following Contaminated Land Risk Assessment methodology is based on CIRIA C552 (2001) *Contaminated Land Risk Assessment – A Guide to Good Practice*, in order to quantify potential risk via **risk estimation** and **risk evaluation**, which can be adopted at the Phase I stage. This will then determine an overall risk category which can be used to identify likely actions. This methodology uses qualitative descriptors and therefore is a qualitative approach.

The methodology requires the classification of:

- the magnitude of the **consequence** (severity) of a risk occurring, and
- the magnitude of the **probability** (likelihood) of a risk occurring.

The potential consequences of contamination risks occurring at this site are classified in accordance with Table A4.1 below, which is adapted from the CIRIA guidance.

Table A4.1: Classification of Consequence

Classification	Definition of Consequence
Severe	<ul style="list-style-type: none">• Short-term (acute) risks to human health.• Short-term risk of pollution of sensitive water resource or ecosystem.• Catastrophic damage to crops/buildings/property/infrastructure, including off-site soils.
Medium	<ul style="list-style-type: none">• Medium/long-term (chronic) risks to human health.• Medium/long-term risk of pollution of sensitive water resource or ecosystem.• Significant damage to crops/buildings/property/infrastructure (on or off-site).• Contamination of off-site soils.
Mild	<ul style="list-style-type: none">• Easily preventable, permanent health effects on humans.• Pollution of non-sensitive water resources.• Localised damage to crops/buildings/property/infrastructure (on or off-site).
Minor	<ul style="list-style-type: none">• Easily preventable, non-permanent health effects on humans, or no effects.• Minor, low-level and localised contamination of on-site soils.• Easily repairable damage to crops/buildings/property/infrastructure.

The probability of contamination risks occurring at this site will be classified in accordance with Table A4.2 below which is also adapted from the CIRIA guidance. Note that for each category, it is assumed that a pollution linkage exists. Where a pollution linkage does not exist, the likelihood is zero, as is the risk.

Table A4.2: Classification of Probability

Classification	Definition of Probability
High Likelihood	Circumstances are such that an event appears very likely in the short-term or almost inevitable in the long-term; or there is already evidence that such an event has occurred.
Likely	Circumstances are such that such an event is not inevitable, but is possible in the short-term and is likely over the long-term.
Low Likelihood	Circumstances are such that it is by no means certain that an event would occur even over a longer period, and it is less likely in the short-term.
Unlikely	Circumstances are such that it is improbable that an event would occur even in the very long-term.

For each possible pollution linkage (source-pathway-receptor) identified, the potential risk can be evaluated, as presented in Table A3.3. Based upon this, CIRIA C552 presents definitions of the risk categories, together with the investigatory and remedial actions that are likely to be necessary in each case, as in Table A3.4. These risk categories apply to each possible pollutant linkage, and not simply to each hazard/source of contamination or sensitive receptor.

Table A4.3: Overall Contamination Risk Matrix

		Consequence			
		Severe	Medium	Mild	Minor
Probability	High likelihood	Very high risk	High risk	Moderate risk	Low risk
	Likely	High risk	Moderate risk	Moderate risk	Low risk
	Low likelihood	Moderate risk	Moderate risk	Low risk	Very low risk
	Unlikely	Low risk	Low risk	Very low risk	Very low risk

Table A4.4: Definition of Risk Categories and Likely Actions Required

Risk Category	Definition and likely actions required
Very high	<ul style="list-style-type: none"> • Severe harm to a defined receptor is very likely, or has already occurred. • The risk is likely to result in a substantial liability. • Urgent investigation (if not already undertaken) is likely to be required. • Urgent remediation is likely to be required.
High	<ul style="list-style-type: none"> • Harm to a defined receptor is likely. • The risk, if realised, may result in a substantial liability. • Urgent investigation (if not already undertaken) is likely to be required. • Remediation is likely to be required in the long term, possibly sooner.
Moderate	<ul style="list-style-type: none"> • Harm to a defined receptor is possible, but severe harm is unlikely. • Investigation is likely to be required to clarify the level of potential liability and risk. • Some remediation may be required in the longer term
Low	<ul style="list-style-type: none"> • Harm to a defined receptor is possible, but is likely to be mild at worst. • Liabilities could theoretically arise, but are unlikely. • Further investigation is not required at this stage • Remediation is unlikely to be required.
Very low	<ul style="list-style-type: none"> • Harm to a defined receptor is unlikely, and would be minor at worst. • No liabilities are likely to arise. • Further investigation is not required at this stage • Remediation is very unlikely to be required.



WINDOW/WINDOWLESS SAMPLING BOREHOLE RECORD




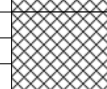


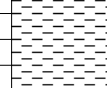
Exploratory Hole No:

WS1

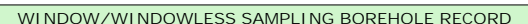
Site Address:	7 Greville Place London NW6 5JP	Project No:	P9372J779
Client:	Niru Raveendran	Ground Level:	
Logged By:	Bobby	Date Commenced:	21/01/2016
Checked By:	AG	Date Completed:	21/01/2016
Type and diameter of equipment:	WS	Sheet No:	1 Of 2

Water levels recorded during boring, m						
Date:	21/01/2016					
Hole depth:	9.00					
Casing depth:	1.00					
Level water on strike:	5.5					
Water Level after 20mins:						

Remarks						
1:						
2:						
3:						
4:						

Sample or Tests										Strata			Strata Description	Installation									
Type	Depth (mbgl)	Result								Legend	Depth (mbgl)	Water Strikes (mbgl)											
		75	75	75	75	75	75	N															
ES	0.20								0.00		0.10		Paving slabs (MADE GROUND)										
									0.20	Gravel (MADE GROUND)													
										Gravelly loose brick and hard core (MADE GROUND)													
ES B	0.50								0.50				Firm brown initially slightly gravelly CLAY. Becoming stiff by 4.0m										
ES B S	1.00																						
	1.20																1	2	2	2	3	3	10
B S	2.00								1.50														
									2.00										2	2	3	3	3
									2.50														
3.00	3	3	3	3	4	4	14																
3.50																							
4.00														3	3	3	4	4	5	16			
4.50																							
5.00	3	3	4	4	5	6	19																

Sampling Code: U- Undisturbed B - Large Disturbed D - Small Disturbed W - Water (U*) Non recovery of Sample
Jomas Associates Ltd - Lakeside House, 1 Furzeground Way, Stockley Park, UB11 1BD
T: 0843 289 2187 E: info@jomasassociates.com W: www.jomasassociates.com



WS2

Project No:	P9372J779
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Ground Level:	
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Date Commenced:	21/01/2016
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Date Completed:	21/01/2016
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Sheet No:	1 Of 1
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Date:						
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Hole depth:						
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Casing depth:						
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Level water on strike:						
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Water Level after 20mins:						
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Remarks

1;	

3:	

4.				
	Conservation Treaties		States	

Sampling Code: U- Undisturbed B - Large Disturbed D - Small Disturbed W - Water (U*) Non recovery of Sample
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THE ENVIRONMENTAL LABORATORY LTD

Analytical Report Number: 16-05431

Issue: 1

Date of Issue: 02/02/2016

Contact: Marc Williams

Customer Details: Jomas Associates Ltd
Lakeside House
1 Furzeground Way

UB11 1BD

Quotation No: Q14-00127

Order No: P9372J779.4

Customer Reference: J779

Date Received: 27/01/2016

Date Approved: 02/02/2016

Details: 7 Greville Place, London, NW6 5JP

Approved by: 

Mike Varley,

Any comments, opinions or interpretations expressed herein are outside the scope of UKAS accreditation (Accreditation Number 2683)



Sample Summary

Report No.: 16-05431

Elab No.	Client's Ref.	Date Sampled	Date Scheduled	Description	Deviations
51849	WS1 ES2 0.50	21/01/2016	27/01/2016	Clay	
51850	WS1 ES3 1.00	21/01/2016	27/01/2016	Clay	
51851	WS1 B3 2.00	21/01/2016	27/01/2016	Clay	
51852	WS1 B5 4.00	21/01/2016	27/01/2016	Clay	
51853	WS1 B7 6.00	21/01/2016	27/01/2016	Clay	
51854	WS2 ES1 0.20	21/01/2016	27/01/2016	Loamy sand + stones	
51855	WS2 ES3 1.00	21/01/2016	27/01/2016	Clay	
51856	WS2 B4 3.00	21/01/2016	27/01/2016	Clay	
51857	WS1 7.00	21/01/2016	27/01/2016		
51858	WS1 9.00	21/01/2016	27/01/2016		
51859	WS2 0.50	21/01/2016	27/01/2016		
51860	WS1 0.20	21/01/2016	27/01/2016		

Results Summary

Report No.: 16-05431

ELAB Reference	51849	51850	51851	51852	51853	51854
Customer Reference	ES2	ES3	B3	B5	B7	ES1
Sample ID						
Sample Type	SOIL	SOIL	SOIL	SOIL	SOIL	SOIL
Sample Location	WS1	WS1	WS1	WS1	WS1	WS2
Sample Depth (m)	0.50	1.00	2.00	4.00	6.00	0.20
Sampling Date	21/01/2016	21/01/2016	21/01/2016	21/01/2016	21/01/2016	21/01/2016

Determinand	Codes	Units	LOD						
Metals									
Arsenic	M	mg/kg	1	n/t	12.0	n/t	n/t	n/t	^ 9.1
Cadmium	M	mg/kg	0.5	n/t	< 0.5	n/t	n/t	n/t	^ 0.7
Chromium	M	mg/kg	5	n/t	51.3	n/t	n/t	n/t	^ 14.3
Copper	M	mg/kg	5	n/t	34.0	n/t	n/t	n/t	^ 24.6
Lead	M	mg/kg	5	n/t	49.9	n/t	n/t	n/t	^ 104
Mercury	M	mg/kg	0.5	n/t	< 0.5	n/t	n/t	n/t	^ < 0.5
Nickel	M	mg/kg	5	n/t	36.2	n/t	n/t	n/t	^ 9.1
Selenium	M	mg/kg	1	n/t	1.2	n/t	n/t	n/t	^ < 1.0
Zinc	M	mg/kg	5	n/t	72.4	n/t	n/t	n/t	^ 95.8
Anions									
Water Soluble Sulphate	M	g/l	0.02	n/t	2.68	0.12	0.19	2.06	^ 0.14
Inorganics									
Hexavalent Chromium	N	mg/kg	0.8	n/t	< 0.8	n/t	n/t	n/t	< 0.8
Total Cyanide	M	mg/kg	1	n/t	5.2	n/t	n/t	n/t	^ < 1.0
Acid Soluble Sulphate (SO4)	U	%SO4	0.02	n/t	0.84	n/t	n/t	n/t	0.09
Water Soluble Boron	N	mg/kg	0.5	n/t	1.2	n/t	n/t	n/t	< 0.5
Miscellaneous									
Acid Neutralisation Capacity	N	mol/kg	0.1	< 0.1	n/t	n/t	n/t	n/t	n/t
Loss On Ignition (450°C)	M	%	0.01	2.68	n/t	n/t	n/t	n/t	n/t
pH	M	pH units	0.1	8.4	7.7	8.1	8.2	7.7	^ 10.8
Total Organic Carbon	N	%	0.01	0.38	n/t	n/t	n/t	n/t	n/t
Organics									
>C8-C10 BCB	N	mg/kg	1	n/t	< 1.0	n/t	n/t	n/t	< 1.0
>C10-C12 BCB	N	mg/kg	1	n/t	< 1.0	n/t	n/t	n/t	< 1.0
>C12-C16 BCB	N	mg/kg	1	n/t	< 1.0	n/t	n/t	n/t	< 1.0
>C16-C21 BCB	N	mg/kg	1	n/t	< 1.0	n/t	n/t	n/t	1.6
>C21-C35 BCB	N	mg/kg	1	n/t	< 1.0	n/t	n/t	n/t	21.3
>C35-C40 BCB	N	mg/kg	1	n/t	< 1.0	n/t	n/t	n/t	< 1.0
Total (>C8-C40) BCB	N	mg/kg	1	n/t	< 1.0	n/t	n/t	n/t	22.9
Phenols									
Total Monohydric Phenols	N	mg/kg	5	n/t	< 5	n/t	n/t	n/t	< 5
Polyaromatic hydrocarbons									
Naphthalene	M	mg/kg	0.1	n/t	< 0.1	n/t	n/t	n/t	^ < 0.1
Acenaphthylene	M	mg/kg	0.1	n/t	< 0.1	n/t	n/t	n/t	^ < 0.1
Acenaphthene	M	mg/kg	0.1	n/t	< 0.1	n/t	n/t	n/t	^ < 0.1
Fluorene	M	mg/kg	0.1	n/t	< 0.1	n/t	n/t	n/t	^ < 0.1
Phenanthrene	M	mg/kg	0.1	n/t	0.2	n/t	n/t	n/t	^ < 0.1
Anthracene	M	mg/kg	0.1	n/t	< 0.1	n/t	n/t	n/t	^ < 0.1
Fluoranthene	M	mg/kg	0.1	n/t	< 0.1	n/t	n/t	n/t	^ 0.5
Pyrene	M	mg/kg	0.1	n/t	0.1	n/t	n/t	n/t	^ 0.7
Benzo(a)anthracene	M	mg/kg	0.1	n/t	0.1	n/t	n/t	n/t	^ 0.5
Chrysene	M	mg/kg	0.1	n/t	0.2	n/t	n/t	n/t	^ 0.6
Benzo (b) fluoranthene	M	mg/kg	0.1	n/t	0.3	n/t	n/t	n/t	^ 1.1
Benzo(k)fluoranthene	M	mg/kg	0.1	n/t	0.2	n/t	n/t	n/t	^ 1.1
Benzo (a) pyrene	M	mg/kg	0.1	n/t	0.2	n/t	n/t	n/t	^ 1.1
Indeno (1,2,3-cd) pyrene	M	mg/kg	0.1	n/t	0.2	n/t	n/t	n/t	^ 1.2
Dibenzo(a,h)anthracene	M	mg/kg	0.1	n/t	0.1	n/t	n/t	n/t	^ 0.3
Benzo[g,h,i]perylene	M	mg/kg	0.1	n/t	0.2	n/t	n/t	n/t	^ 1.1
Total PAH(16)	M	mg/kg	0.4	n/t	1.6	n/t	n/t	n/t	^ 8.4
Total PAH (Including Coronene)	N	mg/kg	2	8	n/t	n/t	n/t	n/t	n/t



Results Summary

Report No.: 16-05431

ELAB Reference	51849	51850	51851	51852	51853	51854
Customer Reference	ES2	ES3	B3	B5	B7	ES1
Sample ID						
Sample Type	SOIL	SOIL	SOIL	SOIL	SOIL	SOIL
Sample Location	WS1	WS1	WS1	WS1	WS1	WS2
Sample Depth (m)	0.50	1.00	2.00	4.00	6.00	0.20
Sampling Date	21/01/2016	21/01/2016	21/01/2016	21/01/2016	21/01/2016	21/01/2016

Determinand	Codes	Units	LOD						
BTEX									
Total BTEX	M	mg/kg	0.01	< 0.01	n/t	n/t	n/t	n/t	n/t
Total Petroleum Hydrocarbons									
Mineral Oil	U	mg/kg	5	< 5	n/t	n/t	n/t	n/t	n/t
PCB (ICES 7 congeners)									
PCB (Total of 7 Congeners)	M	mg/kg	0.03	< 0.03	n/t	n/t	n/t	n/t	n/t

Results Summary

Report No.: 16-05431

ELAB Reference	51855	51856
Customer Reference	ES3	B4
Sample ID		
Sample Type	SOIL	SOIL
Sample Location	WS2	WS2
Sample Depth (m)	1.00	3.00
Sampling Date	21/01/2016	21/01/2016

Determinand	Codes	Units	LOD		
Metals					
Arsenic	M	mg/kg	1	n/t	n/t
Cadmium	M	mg/kg	0.5	n/t	n/t
Chromium	M	mg/kg	5	n/t	n/t
Copper	M	mg/kg	5	n/t	n/t
Lead	M	mg/kg	5	n/t	n/t
Mercury	M	mg/kg	0.5	n/t	n/t
Nickel	M	mg/kg	5	n/t	n/t
Selenium	M	mg/kg	1	n/t	n/t
Zinc	M	mg/kg	5	n/t	n/t
Anions					
Water Soluble Sulphate	M	g/l	0.02	n/t	0.05
Inorganics					
Hexavalent Chromium	N	mg/kg	0.8	n/t	n/t
Total Cyanide	M	mg/kg	1	n/t	n/t
Acid Soluble Sulphate (SO4)	U	%SO4	0.02	n/t	n/t
Water Soluble Boron	N	mg/kg	0.5	n/t	n/t
Miscellaneous					
Acid Neutralisation Capacity	N	mol/kg	0.1	< 0.1	n/t
Loss On Ignition (450°C)	M	%	0.01	2.47	n/t
pH	M	pH units	0.1	8.3	8.2
Total Organic Carbon	N	%	0.01	0.15	n/t
Organics					
>C8-C10 BCB	N	mg/kg	1	n/t	n/t
>C10-C12 BCB	N	mg/kg	1	n/t	n/t
>C12-C16 BCB	N	mg/kg	1	n/t	n/t
>C16-C21 BCB	N	mg/kg	1	n/t	n/t
>C21-C35 BCB	N	mg/kg	1	n/t	n/t
>C35-C40 BCB	N	mg/kg	1	n/t	n/t
Total (>C8-C40) BCB	N	mg/kg	1	n/t	n/t
Phenols					
Total Monohydric Phenols	N	mg/kg	5	n/t	n/t
Polyaromatic hydrocarbons					
Naphthalene	M	mg/kg	0.1	n/t	n/t
Acenaphthylene	M	mg/kg	0.1	n/t	n/t
Acenaphthene	M	mg/kg	0.1	n/t	n/t
Fluorene	M	mg/kg	0.1	n/t	n/t
Phenanthrene	M	mg/kg	0.1	n/t	n/t
Anthracene	M	mg/kg	0.1	n/t	n/t
Fluoranthene	M	mg/kg	0.1	n/t	n/t
Pyrene	M	mg/kg	0.1	n/t	n/t
Benzo(a)anthracene	M	mg/kg	0.1	n/t	n/t
Chrysene	M	mg/kg	0.1	n/t	n/t
Benzo (b) fluoranthene	M	mg/kg	0.1	n/t	n/t
Benzo(k)fluoranthene	M	mg/kg	0.1	n/t	n/t
Benzo (a) pyrene	M	mg/kg	0.1	n/t	n/t
Indeno (1,2,3-cd) pyrene	M	mg/kg	0.1	n/t	n/t
Dibenzo(a,h)anthracene	M	mg/kg	0.1	n/t	n/t
Benzo[g,h,i]perylene	M	mg/kg	0.1	n/t	n/t
Total PAH(16)	M	mg/kg	0.4	n/t	n/t
Total PAH (Including Coronene)	N	mg/kg	2	< 2	n/t



2683



Results Summary

Report No.: 16-05431

ELAB Reference	51855	51856
Customer Reference	ES3	B4
Sample ID		
Sample Type	SOIL	SOIL
Sample Location	WS2	WS2
Sample Depth (m)	1.00	3.00
Sampling Date	21/01/2016	21/01/2016

Determinand	Codes	Units	LOD		
BTEX					
Total BTEX	M	mg/kg	0.01	< 0.01	n/t
Total Petroleum Hydrocarbons					
Mineral Oil	U	mg/kg	5	< 5	n/t
PCB (ICES 7 congeners)					
PCB (Total of 7 Congeners)	M	mg/kg	0.03	< 0.03	n/t

Results Summary

Report No.: 16-05431

2683

WAC Analysis

Elab Ref:	51855					Landfill Waste Acceptance Criteria Limits		
Sample Date:	21/01/2016					Inert Waste Landfill	Stable Non-reactive Hazardous waste in non-hazardous Landfill	Hazardous Waste Landfill
Sample ID:	WS2 ES3							
Depth (m)	1							
Site:	7 Greville Place, London, NW6 5JP							
Determinand		Code	Units					
Total Organic Carbon		N	%		0.15	3	5	6
Loss on Ignition		M	%		2.5	--	--	10
Total BTEX		M	mg/kg		< 0.01	6	--	--
Total PCBs (7 congeners)		M	mg/kg		< 0.03	1	--	--
TPH Total WAC		M	mg/kg		< 5	500	--	--
Total (of 17) PAHs		N	mg/kg		< 2	100	--	--
pH		M			8.3	--	>6	--
Acid Neutralisation Capacity		N	mol/kg		< 0.1	--	To evaluate	To evaluate

Eluate Analysis

			10:1	10:1	Limit values for compliance leaching test using BS EN 12457-2 at L/S 10 l/kg		
			mg/l	mg/kg			
Arsenic		N	0.007	0.07	0.5	2	25
Barium		N	0.010	0.10	20	100	300
Cadmium		N	< 0.001	< 0.01	0.04	1	5
Chromium		N	0.007	0.07	0.5	10	70
Copper		N	0.007	0.07	2	50	100
Mercury		N	< 0.005	< 0.01	0.01	0.2	2
Molybdenum		N	0.008	0.08	0.5	10	30
Nickel		N	0.005	0.05	0.4	10	40
Lead		N	0.004	< 0.05	0.5	10	50
Antimony		N	< 0.005	< 0.05	0.06	0.7	5
Selenium		N	< 0.005	< 0.05	0.1	0.5	7
Zinc		N	0.010	0.10	4	50	200
Chloride		N	< 5	< 50	800	15000	25000
Fluoride		N	< 5	< 10	10	150	500
Sulphate		N	7	65.10	1000	20000	50000
Total Dissolved Solids		N	180	1800.00	4000	60000	100000
Phenol Index		N	< 0.01	< 0.10	1	-	-
Dissolved Organic Carbon		N	15.800	158.00	500	800	1000

Leach Test Information

pH		N	8.0				
Conductivity (uS/cm)		N	161				
Dry mass of test portion (g)			102.000				
Dry Matter (%)			73				
Moisture (%)			37				
Eluent Volume (ml)			950				

Results are expressed on a dry weight basis, after correction for moisture content where applicable

Stated limits are for guidance only and ELAB cannot be held responsible for any discrepancies with current legislation

Results Summary

Report No.: 16-05431

2683

WAC Analysis

Elab Ref:	51849					Landfill Waste Acceptance Criteria Limits		
Sample Date:	21/01/2016					Inert Waste Landfill	Stable Non-reactive Hazardous waste in non-hazardous Landfill	Hazardous Waste Landfill
Sample ID:	WS1 ES2							
Depth (m)	0.5							
Site:	7 Greville Place, London, NW6 5JP							
Determinand		Code	Units					
Total Organic Carbon		N	%		0.38	3	5	6
Loss on Ignition		M	%		2.7	--	--	10
Total BTEX		M	mg/kg		< 0.01	6	--	--
Total PCBs (7 congeners)		M	mg/kg		< 0.03	1	--	--
TPH Total WAC		M	mg/kg		< 5	500	--	--
Total (of 17) PAHs		N	mg/kg		8.0	100	--	--
pH		M			8.4	--	>6	--
Acid Neutralisation Capacity		N	mol/kg		< 0.1	--	To evaluate	To evaluate

Eluate Analysis

			10:1	10:1	Limit values for compliance leaching test using BS EN 12457-2 at L/S 10 l/kg		
			mg/l	mg/kg			
Arsenic		N	0.006	0.06	0.5	2	25
Barium		N	0.015	0.15	20	100	300
Cadmium		N	< 0.001	< 0.01	0.04	1	5
Chromium		N	0.009	0.09	0.5	10	70
Copper		N	< 0.005	< 0.05	2	50	100
Mercury		N	< 0.005	< 0.01	0.01	0.2	2
Molybdenum		N	< 0.005	< 0.05	0.5	10	30
Nickel		N	0.003	< 0.05	0.4	10	40
Lead		N	0.012	0.12	0.5	10	50
Antimony		N	< 0.005	< 0.05	0.06	0.7	5
Selenium		N	< 0.005	< 0.05	0.1	0.5	7
Zinc		N	< 0.005	< 0.05	4	50	200
Chloride		N	< 5	< 50	800	15000	25000
Fluoride		N	< 5	< 10	10	150	500
Sulphate		N	13	129.00	1000	20000	50000
Total Dissolved Solids		N	160	1600.00	4000	60000	100000
Phenol Index		N	< 0.01	< 0.10	1	-	-
Dissolved Organic Carbon		N	14.700	147.00	500	800	1000

Leach Test Information

pH		N	8.0				
Conductivity (uS/cm)		N	159				
Dry mass of test portion (g)			101.000				
Dry Matter (%)			74				
Moisture (%)			36				
Eluent Volume (ml)			939				

Results are expressed on a dry weight basis, after correction for moisture content where applicable

Stated limits are for guidance only and ELAB cannot be held responsible for any discrepancies with current legislation

Method Summary

Report No.: 16-05431

Parameter	Codes	Analysis Undertaken On	Date Tested	Method Number	Technique
Soil					
Hexavalent chromium	N	As submitted sample	29/01/2016	110	Colorimetry
Acid Soluble Sulphate	U	Air dried sample	01/02/2016	115	Ion Chromatography
Aqua regia extractable metals	M	Air dried sample	29/01/2016	118	ICPMS
Phenols in solids	M	As submitted sample	28/01/2016	121	HPLC
PAH (GC-FID)	M	As submitted sample	28/01/2016	133	GC-FID
Water soluble anions	M	Air dried sample	29/01/2016	172	Ion Chromatography
Water soluble boron	N	Air dried sample	29/01/2016	202	Colorimetry
Total cyanide	M	As submitted sample	29/01/2016	204	Colorimetry
Basic carbon banding in soil	N	As submitted sample	28/01/2016	218	GC-FID
Leachate					
Arsenic*	N		01/02/2016	101	ICPMS
Cadmium*	N		01/02/2016	101	ICPMS
Chromium*	N		01/02/2016	101	ICPMS
Lead*	N		01/02/2016	101	ICPMS
Nickel*	N		01/02/2016	101	ICPMS
Copper*	N		01/02/2016	101	ICPMS
Zinc*	N		01/02/2016	101	ICPMS
Mercury*	N		01/02/2016	101	ICPMS
Selenium*	N		01/02/2016	101	ICPMS
Antimony	N		01/02/2016	101	ICPMS
Barium*	N		01/02/2016	101	ICPMS
Molybdenum*	N		01/02/2016	101	ICPMS
pH Value*	N		01/02/2016	113	Electrometric
Electrical Conductivity*	N		01/02/2016	136	Probe
Dissolved Organic Carbon	N		01/02/2016	102	TOC analyser
Chloride*	N		01/02/2016	131	Ion Chromatography
Fluoride*	N		01/02/2016	131	Ion Chromatography
Sulphate*	N		01/02/2016	131	Ion Chromatography
Total Dissolved Solids	N		01/02/2016	144	Gravimetric
Phenol index	N		01/02/2016	121	HPLC
WAC Solids analysis					
pH Value**	M	Air dried sample	29/01/2016	113	Electrometric
Total Organic Carbon	N	Air dried sample	29/01/2016	210	IR
Loss on Ignition**	M	Air dried sample	02/02/2016	129	Gravimetric
Acid Neutralization Capacity to pH 7	N	Air dried sample	29/01/2016	NEN 737	Electrometric
Total BTEX**	M	As submitted sample	29/01/2016	181	GCMS
Mineral Oil**	U	As submitted sample	28/01/2016	117	GCFID
Total PCBs (7 congeners)	M	Air dried sample	28/01/2016	120	GCMS
Total PAH (17)**	N	As submitted sample	29/01/2016	133	GCFID

Tests marked N are not UKAS accredited



LABORATORY REPORT



4043

Contract Number: PSL16/0397

Report Date: 03 February 2016
Client's Reference: J779
Client Name: Jomas Associates
1 Furzeground Way
Lakeside House
Stockley Park
UB11 1BD

For the attention of: Roni Savage

Contract Title: 7 Greville Place, London, NW6 5JP
Date Received: 29/1/2016
Date Commenced: 29/1/2016
Date Completed: 3/2/2016

Notes: Opinions and Interpretations are outside the UKAS Accreditation

A copy of the Laboratory Schedule of accredited tests as issued by UKAS is attached to this report. This certificate is issued in accordance with the accreditation requirements of the United Kingdom Accreditation Service. The results reported herein relate only to the material supplied to the laboratory. This certificate shall not be reproduced in full, without the prior written approval of the laboratory.

Checked and Approved Signatories:

R Gunson
(Director)

A Watkins
(Director)

R Berriman
(Quality Manager)

D Lambe
(Senior Technician)

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Page 1 of

SUMMARY OF LABORATORY SOIL DESCRIPTIONS

[illegible]

PSL
Professional Soils Laboratory

Checked / Approved

Date _____

03/02/16

Contract No:

PSL16/0397

Client Ref:

J779

7 Greville Place, London NW6 5JP




SUMMARY OF SOIL CLASSIFICATION TESTS

(BS1377 : PART 2 : 1990)

Hole Number	Sample Number	Sample Type	Top Depth m	Base Depth m	Moisture Content % Clause 3.2	Linear Shrinkage % Clause 6.5	Particle Density Mg/m ³ Clause 8.2	Liquid Limit % Clause 4.3/4	Plastic Limit % Clause 5.3	Plasticity Index % Clause 5.4	Passing .425mm %	Remarks
WS1	2	B	1.00		34			75	30	45	98	Very high plasticity CV.
WS1	4	B	3.00		32			73	29	44	97	Very high plasticity CV.
WS1	6	B	5.00		35			72	28	44	100	Very high plasticity CV.
WS1	9	B	8.00		34			77	31	46	100	Very high plasticity CV.
WS2	3	B	2.00		32			71	29	42	100	Very high plasticity CV.
WS2	5	B	4.00		31			73	28	45	100	Very high plasticity CV.

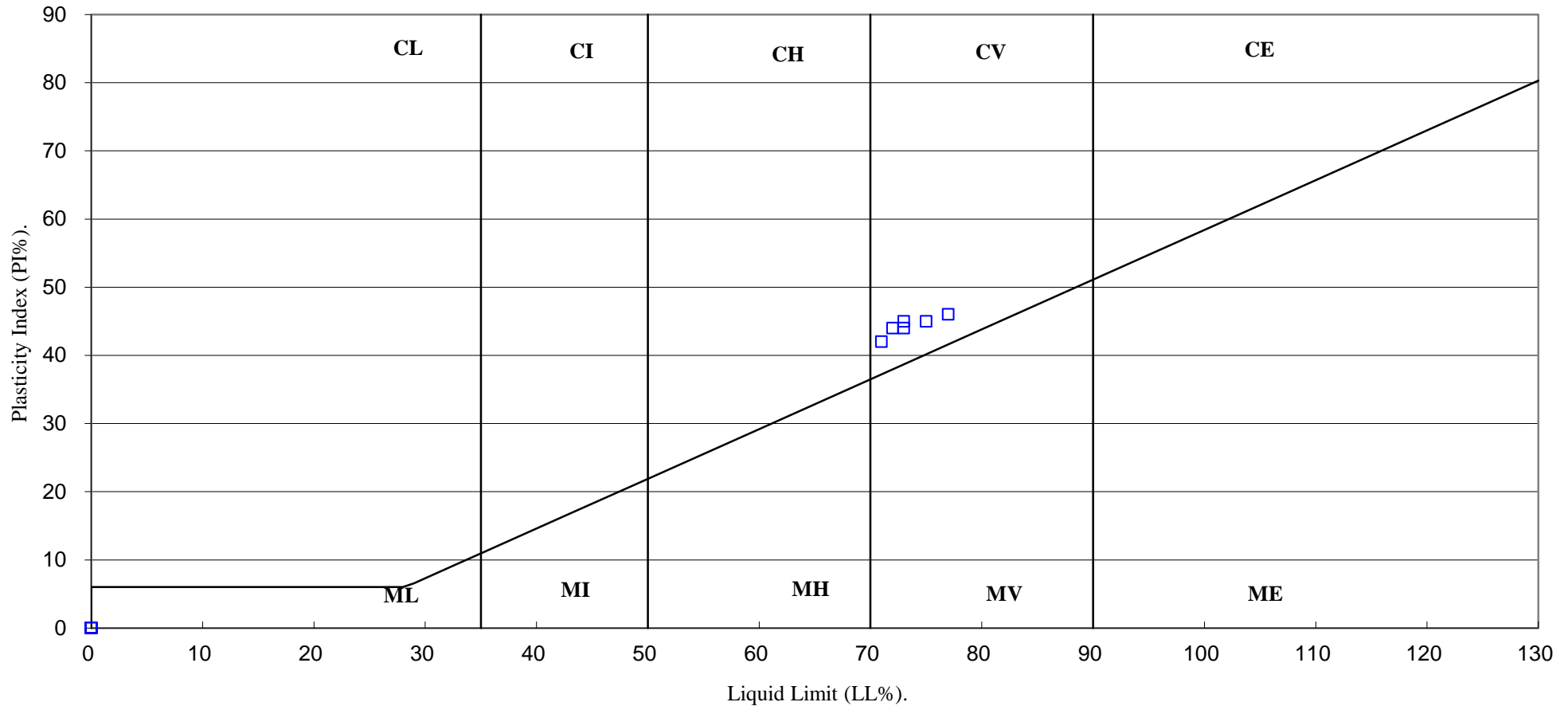
SYMBOLS : NP : Non Plastic

* : Liquid Limit and Plastic Limit Wet Sieved.

		Checked / Approved		Date	03/02/16	Contract No:
		7 Greville Place, London NW6 5JP				PSL16/0397
						Client Ref:
						J779

PLASTICITY CHART FOR CASAGRANDE CLASSIFICATION.

(BS5930 :2015)



PSL
Professional Soils Laboratory

Checked /Approved

Date

03/02/16

Contract No:

PSL16/0397

Client Ref:

J779

7 Greville Place, London NW6 5JP

GAS AND GROUNDWATER MONITORING BOREHOLE RECORD SHEET					
Site: 7 Greville Place J779	Operative(s): SB	Date: 01/02/2016	Time: 11.20	Round: 1	Page: 1
MONITORING EQUIPMENT					
Instrument Type	Instrument Make	Serial No.	Date Last Calibrated		
Analox	GA5000		19/11/2015		
PID	Phocheck tiger		26/08/2015		
Dip Meter	GeoTech				
MONITORING CONDITIONS					
Weather Conditions: Sunny		Ground Conditions: Dry		Temperature: 7°C	
Barometric Pressure (mbar): 1021		Barometric Pressure Trend (24hr): Rise then fall		Ambient Concentration: 0.0 %CH ₄ , 0.2 %CO ₂ , 20.7 %O ₂	

MONITORING RESULTS													
Monitoring Point Location	Flow		Atmospheric Pressure (mbar)	Methane %	Methane % LEL	Carbon Dioxide %	Oxygen %	VOC (ppm)		Hydrogen Sulphide (ppm)	Carbon Monoxide (ppm)	Depth to water (mbgl)	Depth to Base of well (mbgl)
	Peak	Average						Peak	Average				
WS1	+0.6	-	1021	0.0	-	0.1	20.7	0.0	-	0	0	1.82	5.10

GAS AND GROUNDWATER MONITORING BOREHOLE RECORD SHEET					
Site: 7 Greville Place J779	Operative(s): SB	Date: 04/02/2016	Time: 09.35	Round: 1	Page: 1
MONITORING EQUIPMENT					
Instrument Type	Instrument Make	Serial No.	Date Last Calibrated		
Analox	GA5000		19/11/2015		
PID	Phocheck tiger		26/08/2015		
Dip Meter	GeoTech				
MONITORING CONDITIONS					
Weather Conditions: Sunny		Ground Conditions: Dry		Temperature: 10°C	
Barometric Pressure (mbar): 1024		Barometric Pressure Trend (24hr): Steady		Ambient Concentration: 0.0 %CH ₄ , 0.2 %CO ₂ , 21.0 %O ₂	

MONITORING RESULTS													
Monitoring Point Location	Flow		Atmospheric Pressure (mbar)	Methane %	Methane % LEL	Carbon Dioxide %	Oxygen %	VOC (ppm)		Hydrogen Sulphide (ppm)	Carbon Monoxide (ppm)	Depth to water (mbgl)	Depth to Base of well (mbgl)
	Peak	Average						Peak	Average				
WS1	+0.7	-	1024	0.0	-	0.1	20.9	0.0	-	0	0	1.84	5.10