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ENVIRONMENTAL

EAST STAFFORDSHIRE BOROUGH
COUNCIL
THE DOVE WAY (AREAS A & B)
UTTOXETER

PHASE 2 GEO-ENVIRONMENTAL
FACTUAL REPORT



Integrated Engineering and Environmental Consultants

environmental | water | transportation | civil | structural | highways | infrastructure

BWB
CONSULTING

ENVIRONMENTAL

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FACTUAL REPORT

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1.0 INTRODUCTION

Instruction

- 1.1 BWB Consulting (BWB) was instructed by Paul Shanley on behalf of East Staffordshire Borough Council (the Client) to carry out a Phase 2 Factual Report at the site at The Dove Way (Areas A & B), Uttoxeter, Staffordshire. Details of the project brief are included in BWB proposal reference IDN/RC/NTE285 R1 dated January 2010.

Limitations

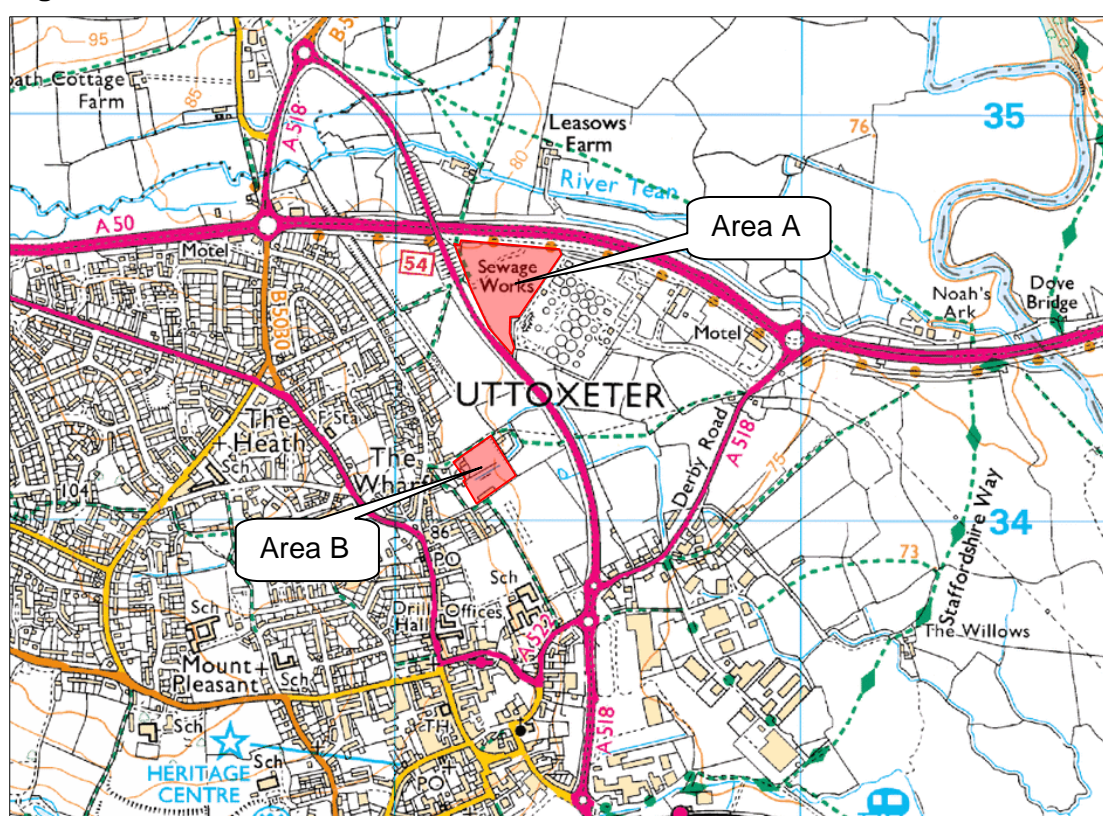
- 1.2 The assessments and interpretation have been made in line with legislation and guidelines in force at the time of writing, representing best practice at that time.
- 1.3 All of the comments and opinions contained in this report, including any conclusions, are based on the information obtained by BWB during our investigations.
- 1.4 There may be other conditions prevailing on the site which have not been disclosed by this investigation and which have not been taken into account by this report. Responsibility cannot be accepted for conditions not revealed by the investigation.
- 1.5 Any diagram or opinion of the possible configuration of the findings is conjectural and given for guidance only and confirmation of intermediate ground conditions should be considered if deemed necessary.
- 1.6 Except as otherwise requested by the Client, BWB is not obliged and disclaims any obligation to update the report for events taking place after:
- a) the date on which this assessment was undertaken; and
 - b) the date on which the final report is delivered.
- 1.7 BWB makes no representation whatsoever concerning the legal significance of its findings or to other legal matters referred to in the following report.
- 1.8 This report has been prepared for the sole use of East Staffordshire Borough Council. No other third parties may rely upon or reproduce the contents of this report without the written permission of BWB. If any unauthorised third party comes into possession of this report they rely on it at their own risk and the authors do not owe them any Duty of Care or Skill.

2.0 SITE SETTING

Site Location

- 2.1 The site is located on the north eastern edge of Uttoxeter conurbation approximately 1km north of the town centre. The site is split into two sections situated adjacent/close to The Dove Way; an arterial relief road carrying traffic north east of Uttoxeter. The two parcels of land one to the north and one to the south west are approximately centred at national grid references 409280, 334490 and 409230, 334120 respectively. The location of the site is shown in **Figure 1**.

Figure 1 - Site Location Plan



Reproduced from the Ordnance Survey 1:25,000 scale map with the permission of the controller of Her Majesty's Stationery Office Crown Copyright Reserved. OS Licence number 100013665.

Site Description

- 2.2 The site comprises two parcels of land which are approximately triangular and square in shape respectively. These two sections of land comprise part of a wider proposed development area which connects the two parcels of the site. For the purpose of this assessment the site areas will be referred to throughout this report as follows:
- Area A – The Triangular parcel of land which is currently undeveloped open ground and forms the northern part of the site;
 - Area B – A square parcel of land comprising predominantly industrial/commercial use situated in the south eastern area of the proposed development scheme; and

- Area C – Two parcels of land either side of The Dove Way which connect Area A and Area B. This parcel of land is assessed in the BWB report ref: NTE285/02/V1 dated July 2010.

2.3 A representative of BWB undertook a site reconnaissance visit on 24th June 2010. The layout of the site with the main features is presented as **Figure 2**. Photographs from the site visit are presented in **Appendix 1**.

Area A

- 2.4 Area A comprises overgrown open land with vegetation including long grass, thistles, nettles and shrubs. The vegetation tentatively identified included small areas of Japanese Knotweed. However, it should be noted that BWB is not a specialised ecologist and it is therefore recommended that a specialist ecologist is commissioned to undertake a survey.
- 2.5 The site boundaries comprise fencing and mature shrubs with access to the site available under a bridge on a public footpath on the western boundary of the site, or through a gate (which was padlocked at the time of the visit) on the south western boundary of the site; only the former is suitable for vehicular access.
- 2.6 A small footpath runs through the vegetation within the site boundary roughly parallel to the western site boundary. A circular footpath is also present running roughly parallel to the site boundaries in the northern two thirds of the site.
- 2.7 The site lies at approximately 80m above ordnance datum (AOD) and is approximately flat. However there is a small drop in elevation of around 1.5m in the north western area of the site and a small mound of approximately 2.0m in height is present close to the south eastern boundary of the site. The site slopes away steeply at the southern edge of the site with a drop of approximately 3.0m.
- 2.8 Beyond the boundaries of the site The Dove Way forms the western site boundary. The road and the site are at approximately the same elevation at the southern end of the site with the road rising to approximately 10.0m above the site towards the northern edge of the site where the site and road are separated by a steep vegetated slope. Beyond The Dove Way to the west is pasture and park land. To the north of the site is the A50 dual carriageway with farmland beyond. To the south east of the site is a large sewage treatment works.

Area B

- 2.9 This parcel of the site comprises a waste recycling facility and a small industrial estate dissected by a stream running within a small valley. The site lies at approximately 80m AOD and falls in height by approximately 3m from the western boundary to the eastern boundary. The northern area is roughly flat which indicates that significant quantities of made ground may be present. The southern area slopes steadily away towards the east with a fall of approximately 3m.
- 2.10 The north eastern section of Area B is occupied by the waste recycling facility. No access was available to the facility on the day of the visit although an inspection was undertaken from the perimeter and photographs taken. The recycling facility comprised predominantly asphalt hardstand with a small grass verge around the site perimeter. The site boundary was formed by approximately 2.5m high palisade

fencing with access provided on the northern side of the site. Bushes indicative of Japanese Knotweed (an invasive plant species) were tentatively identified adjacent to the entrance to the site. A small cabin was situated in the northern area with the main waste disposal area situated centrally. Large waste disposal skips in this area included garden waste, non recyclable household waste, small appliances, non recyclable bulky waste items, cardboard, chipboard and wood and timber. Smaller recycling bank bins in this area comprised paper, books, cloths and textiles, glass, printer ink and cartons. Further waste disposal skips and bins were present along the eastern boundary of the site including hard core and rubble and large kitchen appliances as well as used cooking oil and waste oil tanks. The waste oil tank comprised steel above ground storage tank (AST) of approximately 3,000l in capacity and was positioned within a small steel bund. There were no obvious signs of spillages or leaks from the viewing position. The recycling facility was considered to be well kept and in a tidy condition with no visual signs of impact or odours.

- 2.11 The southern section of Area B is occupied by Hawksworth (Graphics, Prints and Signs) and Dovebank Motors. The site comprises predominantly asphalt hard stand and vegetation in the eastern area with a small industrial unit in the southern area and small toilet block in the central area. Both the unit and toilet block are of single storey brick construction with corrugated cement (possibly asbestos containing) roof. Hawksworth occupied approximately the western two thirds of the unit with Dovebank Motors present in the eastern third.
- 2.12 Adjacent to the unit in the Dovebank Motors area was an AST possibly used as a waste oil tank. The tank was of self banded double skin plastic construction and approximately 2,000l in capacity. No visual or olfactory evidence of contamination was observed within the vicinity of the AST. Adjacent to the AST was a bin for waste oil filters, an empty antifreeze barrel, an old vehicle radiator and a rear axle of a car. A surface water drain was located adjacent to this area with surface staining indicating that contaminants have been washed into the drain. Two ASTs were noted further to the east of the unit which were indicated to be no longer in use. The smaller of the two ASTs was considered to be approximately 1,200l in capacity was of steel construction positioned on breeze block stilts; this AST did not have a bund. The larger AST was considered to be approximately 10,000l in capacity and also of steel construction the tank was situated within a bund with concrete base and brick walls with no product present in the bottom. This tank was housed within a small timber shack with corrugated sheet cement (possibly asbestos containing) sides and roof. No visual or olfactory evidence of contamination was noted in the vicinity of these two ASTs.
- 2.13 The western section of the small industrial estate was overgrown with grass, nettles, thistles and other vegetation including a raised bank indicating potential made ground. Numerous tyres were present in this area and were laid out in a manner which indicated the area was formerly used as a go-kart track. A metal storage drum circa 350l capacity was present in this area which was indicated to have been used to burn waste. Grey ash and burnt items including the remains of aerosol cans and batteries were noted on the ground surrounding the drum. Two large steel storage containers were also situated within this area.
- 2.14 A small brook flows through from west to east through the central area of the site and is culverted at the eastern and western boundaries of the site. The brook flows along a straight artificial concrete channel within a small valley though the slope of the

northern bank becomes more significant towards the eastern extents. The banks are predominantly vegetated and largely overgrown, with potential invasive Japanese Knotweed bushes tentatively identified on the northern bank adjacent to the recycling facility. Flow within the channel was noted to be very low through debris within grills along the channel indicate that much more significant flow along the channel does take place. A discharge point was noted toward the western extent of the open channel with a steady constant flow. The water channel was noted to have a frothy surface in this area with a stale/stagnant water type odour noted.

- 2.15 The site is bound to the north by a park and playing fields and to the east by pasture land. To the south of the site is playing fields associated with a nearby school and to the west is residential properties and a small skip hire facility (or similar); though no waste disposal was indicated to take place at the premises. To the north west of Area B, was a small industrial unit of steel frame construction with brick walls and metal cladding on the roof and upper walls. A large shutter was present to the front of the unit. The use for the unit was not ascertained during the visit though was

Published Ground Conditions

- 2.16 The site (both Area A and Area B) is indicated to be underlain by solid geology comprising Mercia Mudstone Group. Drift deposits are indicated to directly underlie the entire site area. Area A is indicated to be underlain by Alluvium (clay, silt, sand and gravel) drift deposits with Glaciofluvial Deposits (sand and gravel) along the western fringe of the site. Area B is indicated to be wholly underlain by Glaciofluvial Deposits. Given the landfill sites indicated at the site it is likely that a significant thickness of made ground can also be expected.
- 2.17 Both the Alluvium and Glaciofluvial Deposits indicated at the site are classified by the Environment Agency (EA) as Secondary A Aquifers. The Mercia Mudstone Group solid geology at the site is classified by the EA as a Secondary B Aquifer. The principal migration pathway and receptor is therefore considered to be groundwater in the drift deposits.
- 2.18 The Wharf Brook is present at the site which flows through Area B in a west to east direction. The flow during the BWB site visit was observed to be low. The stream through the site area was observed to flow through an artificial channel which is likely to provide some protection from the groundwater in this area. However, off site to the east the stream has been observed to flow along its natural path and groundwater beneath Area B is therefore likely to flow towards this stream.
- 2.19 The River Tean is situated approximately 150m north of Area A with The Wharf Brook which flows through Area B present approximately 200m south of Area A. The groundwater flow direction is therefore difficult to predict beneath Area A; particularly with both these water courses flowing towards the River Dove, which at its nearest point is located approximately 1.1km east of the site.

3.0 SITE WORK

Scope of Works

3.1 The intrusive site investigation works were undertaken at the subject site and across the wider The Dove Way site area by BWB on 5th July 2010 and completed on 8th July 2010. The works undertaken across the wider site comprised the following activities:

- A utilities assessment at proposed borehole locations to identify the presence and location of buried services;
- The excavation of 37no trial pits (TP101 to TP137) by JCB 3CX to a maximum depth of 4.0m bgl;
- The advancement of 7no. boreholes (WS1 to WS7 inclusive) by Sherwood Drilling Ltd to a maximum depth of 3.0m below ground level (bgl) utilising a windowless sampling technique;
- The advancement of 9no. boreholes (BH1 to BH9 inclusive) by Premier Drilling Ltd to a maximum depth of 11.0m below ground level (bgl) utilising a cable percussive sampling technique;
- Installations comprising standpipes, gas taps and lockable covers in all 9no. cable percussive borehole locations;
- Standard penetration tests (SPTs) at frequent intervals in all cable percussive boreholes
- Collection of soil samples from borehole locations and logging of the soil strata encountered.

3.2 Records of the borehole logs are presented as **Appendix 2** with drillers logs presented as **Appendix 3** and a site layout and exploratory hole location plan is presented as **Figure 4**. Post investigation monitoring comprised the following activities:

- Collection of groundwater samples from the installed boreholes;
- Collection of surface water samples from three positions within The Wharf Brook; and
- Three return visits (with an additional 3no visits scheduled) to record depth to groundwater, gas flow and ground gas concentrations (carbon dioxide, oxygen, methane, hydrogen sulphide and carbon monoxide).

3.3 The post investigation monitoring results are presented as **Appendix 4**.

Sampling Strategy

3.4 Three cable percussive boreholes have been positioned in each of Area A and Area B in order to triangulate the groundwater in each area and to establish general ground conditions. The window sample boreholes and trial pits have been positioned to target areas of potential contamination while also providing a good special coverage of the site.

3.5 Based on the above strategy the following justification for the position of each borehole position is provided in **Table 1** below:

Table 1 – Borehole Location Justification

Area	Borehole Location	Justification
A	TP109 to TP123	Provide spatial coverage.
A	BH1 to BH3	Triangulate the groundwater in Area A and provide information on the deeper ground conditions.
B	TP135 to TP137	Provide spatial coverage across areas without hard stand within Area B.
B	WS1 to WS7	Provide spatial coverage across Area B primarily where hardstand was present while also targeting the public refuse site (WS1 to WS3) the former gas works (WS4 to WS7) and the current and former ASTs (WS6).
B	BH7 to BH9	Triangulate the groundwater in Area B and provide information on the deeper ground conditions.

3.6 The site work was carried out in general accordance with BS5930 1999 'Code of Practice for Site Investigations' and BS10175 2001 'Code of Practice for Investigation of Potentially Contaminated Sites'.

Analytical Strategy

3.7 The Phase I identified a number of potential sources of contamination. Not all contaminants have been targeted; rather, the contaminants that are considered to pose a greater risk to the site have been targeted for sampling. The contaminants that are considered most likely to have impacted upon the site from the sites former use as a gas works in addition to the ASTs present at the site, made ground associated with landfilling and profiling works and the vehicle repair workshop are: hydrocarbons; heavy metals; PAHs; inorganic contaminants (inc cyanide); volatile organic compounds (VOCs); and semi volatile organic compounds (SVOCs).

3.8 Soil samples were collected from borehole locations, placed in cool boxes and sent to a UKAS accredited laboratory for chemical analysis. The suite of analytical testing undertaken on soil samples obtained from Areas A & B comprised:

- A total of 30 samples tested for arsenic, barium, beryllium, water soluble boron, cadmium, chromium, copper, lead, mercury, nickel, selenium, vanadium, zinc, water soluble sulphate (2:1 extract), total phenols, total cyanide, free cyanide, complex cyanide, fraction of organic carbon, pH, PAH (United States Environment Protection Agency priority 16 compounds) and Total Petroleum Hydrocarbons (TPH) C6-C40 with TPH column clean up;
- A total of 12 samples tested for TPH speciated to the UK Criteria Working Group (CWG) aliphatic and aromatic compounds;
- A total of 2 samples tested for VOCs;
- An asbestos screen in 6 samples; and
- Leachate derived from soil samples was analysed from 12 samples. The suite of analytical testing undertaken comprised: arsenic, barium, beryllium,

dissolved boron, cadmium, chromium, copper, lead, mercury, nickel, selenium, vanadium, zinc, sulphate, total cyanide and pH.

- 3.9 The results of the soil and soil leachate analytical testing are presented in the Certificate of Analysis report number 91025 and report number 91087 both dated 21st July 2010 as **Appendix 5**.
- 3.10 Groundwater samples were taken from 6 monitoring well locations (BH1 to BH3 and BH7 to BH9) and 3 surface water samples were taken from The Wharf Brook and sent to a UKAS accredited laboratory for chemical analysis. During sampling the boreholes were purged by the removal of three well volumes prior to the collection of the groundwater samples. The suite of analytical testing undertaken on all samples comprised:
- Arsenic, barium, beryllium, cadmium, chromium, copper, lead, mercury, nickel, selenium, vanadium, zinc, conductivity, soluble sulphate, sulphide, free sulphur, ammoniacal nitrogen, total phenols, total cyanide, pH, total organic carbon, PAH (US EPA priority 16 compounds) and TPH; and
 - TPH speciated to the UK CGW and BTEX based on TNRCC method 1006;
- 3.11 The results of the groundwater and surface water analytical testing are presented in the Certificate of Analysis report number 91589 dated 26th July 2010 as **Appendix 6**.

Geotechnical Strategy

- 3.12 The principal objectives for the geotechnical investigation were to determine soil parameters for use in foundation design and establish any geotechnical constraints associated with the proposed development. In-situ soil strength testing in the form of SPTs and soil laboratory testing was undertaken to allow preliminary foundation assessment for the proposed development of the site as industrial units.
- 3.13 Geotechnical laboratory testing was undertaken on samples collected from Area A & B with the analysis comprising:
- Particle size distribution on 9 samples;
 - Moisture content of clay on 8no samples; and
 - Atterberg Limits on 8no samples.
- 3.14 The results of the geotechnical analytical testing are presented as **Appendix 7**.

4.0 IN SITU TESTING

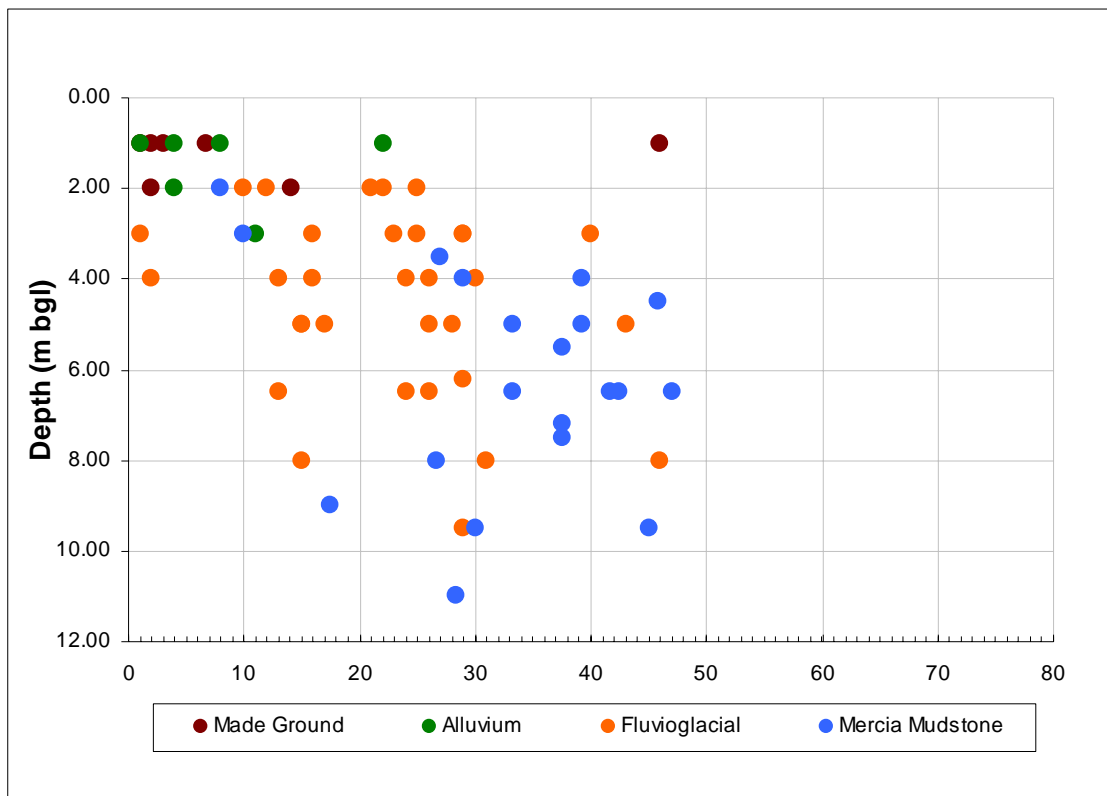
Soil Shear Strength

- 4.1 A hand shear vane was utilised within trial pits to determine the shear strength of cohesive materials encountered. The shear strength of the cohesive Alluvium strata between 2.25m bgl and 2.9m bgl range between 18kPa and 70kPa in area A; no hand shear vane testing was undertaken in Area B due to the nature of the strata encountered. The results from the hand shear vane are indicated on the borehole logs presented as **Appendix 3**.

Standard Penetration Testing

- 4.2 Standard penetration tests (SPTs) were undertaken in all cable percussive boreholes typically at 1.0m increments to 5.0m bgl and at 1.5m increments thereafter. The results of the standard penetration testing are presented on the borehole logs as **Appendix 3** and are presented graphically on **Figure 5** below.

Figure 5 – Standard Penetration Test Results



5.0 GROUND GAS MONITORING

5.1 A summary of the results of ground gas monitoring undertaken to date is presented in **Table 2** below. The results of the post investigation ground gas and groundwater monitoring is presented as **Appendix 4**.

Table 2 – Summary of Gas Monitoring Results

Borehole Ref.	Flow (%v/v)		Carbon Dioxide (%v/v)			Methane (%v/v)		
	min.	max.	min.	max.	avg.	min.	max.	avg.
BH1	<0.1	-0.2	3.1	6.5	5.3	<0.1	0.1	0.1
BH2	<0.1	0.2	2.2	12.7	9.0	<0.1	0.1	0.1
BH3	<0.1	0.2	12.8	13.9	13.4	<0.1	0.2	0.1
BH4	<0.1	<0.1	0.2	3.0	1.7	<0.1	<0.1	<0.1
BH5	<0.1	<0.1	0.3	0.7	0.4	<0.1	<0.1	<0.1
BH6	0.2	0.2	0.6	0.6	0.6	<0.1	<0.1	<0.1
BH7	<0.1	<0.1	1.9	3.1	2.3	<0.1	0.1	0.1
BH8	<0.1	0.4	<0.1	0.8	0.5	<0.1	<0.1	<0.1
BH9	<0.1	<0.1	0.9	2.7	2.1	<0.1	0.1	0.1

6.0 LABORATORY TESTING

Environmental

- 6.1 The results of soil chemical laboratory analysis are presented as **Appendix 5** with groundwater and surface water testing analytical results presented as **Appendix 6**. A summary of the chemical results is presented in **Table 3** below.

Table 3 –Chemical Results Summary

Test	Soil			Water		
	Units	Min	Max	Units	Min	Max
pH	pH Units	3.71	8.7	pH Units	7.65	8.5
Cyanide, Total	mg/kg	<1	22100	mg/l	<0.05	1.63
Cyanide, Free	mg/kg	<1	5.12			
Cyanide, Complex	mg/kg	3.77	22200			
Sulphate	g/l	0.0109	1.49	mg/l	15.3	413
Arsenic	mg/kg	2.21	50.8	µg/l	1.13	2.88
Barium	mg/kg	12.3	675	µg/l	21.7	429
Beryllium	mg/kg	0.469	7.11	µg/l	<0.07	0.091
Cadmium	mg/kg	<0.12	22.2	µg/l	<0.1	0.38
Chromium	mg/kg	7.58	104	µg/l	1.59	13.6
Copper	mg/kg	7.72	468	µg/l	0.875	6.22
Lead	mg/kg	14.4	379	µg/l	<0.02	1.98
Mercury	mg/kg	<0.14	1.82	µg/l	<0.01	<0.01
Nickel	mg/kg	3.94	69.9	µg/l	1.18	17
Selenium	mg/kg	1.02	9.95	µg/l	0.423	8.05
Vanadium	mg/kg	14.3	47.4	µg/l	2.14	4.28
Zinc	mg/kg	29.6	542	µg/l	1.02	25.1
Boron, water soluble	mg/kg	<1	6.71	µg/l	31.5	1540
Phenols, Total monohydric	mg/kg	<0.22	2.1	mg/l	<0.015	<0.015
TPH >C6-C40	mg/kg	<10	13800			
EPH Range >C10 - C40 (aq)				µg/l	52.3	1880

	Soil			Water		
BTEX, Total	µg/kg	<10	741	µg/l	<10	<10
Total Aliphatics & Aromatics >C5-35	µg/kg	49200	20000000	µg/l	<10	964
Polyaromatic hydrocarbons, Total USEPA 16	µg/kg	<0.118	1030000	µg/l	<0.1	82.8

Geotechnical

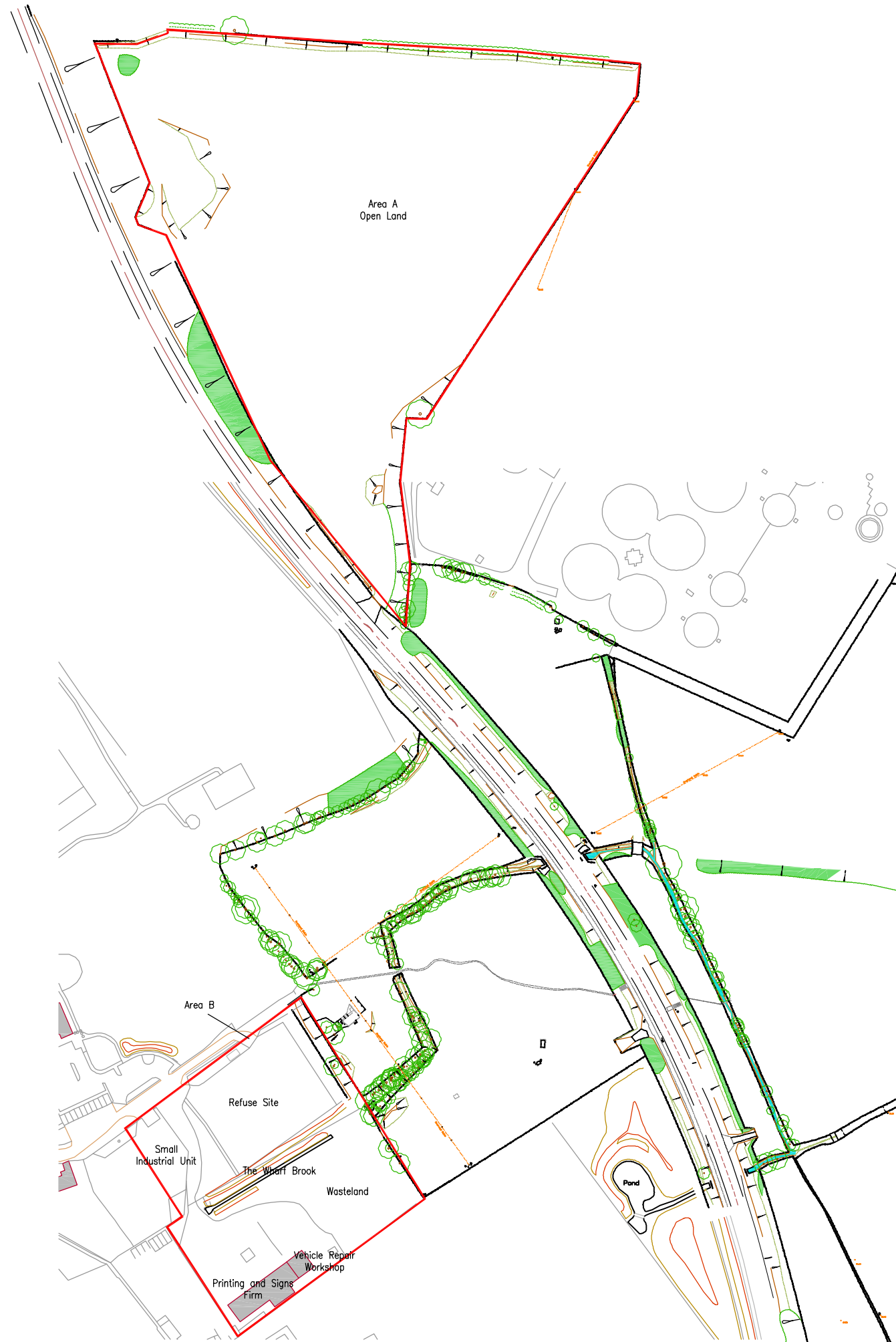
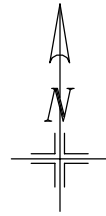
- 6.2 The results of geotechnical testing are presented as **Appendix 7**. A summary of the moisture content and plasticity index results are presented in **Table 4** below.

Table 4 – Plasticity Index Results Summary

Hole Location	Depth (m)	Strata	Moisture Content (%)	Liquid Limit (%)	Plastic Limit (%)	Plasticity Index (%)	Passing 0.425mm (%)
BH1	1.8	Alluvium	25	43	24	19	80
BH2	8.9	Mercia Mudstone	15	32	18	14	100
BH3	2.6	Alluvium	34	56	26	30	100
BH3	8.4	Mercia Mudstone	17	32	19	13	100
BH4	0.9	Alluvium	28	55	27	28	100
BH4	5.4	Mercia Mudstone	18	30	17	13	96
BH5	3	Mercia Mudstone	20	34	20	14	100
BH6	0.5	Alluvium	22	29	17	12	95
BH6	6.7	Mercia Mudstone	24	34	20	14	100
BH7	4.6	Mercia Mudstone	18	32	20	12	98
BH8	6	Mercia Mudstone	21	31	19	12	84
BH9	2.5	Alluvium	12	27	15	12	81
BH9	4.5	Mercia Mudstone	17	28	17	11	80
TP101	0.5	Alluvium	34	53	26	27	100


FIGURES

FIGURE 2
SITE LAYOUT PLAN



NOTES

- 1. DO NOT SCALE THIS DRAWING. ALL DIMENSIONS MUST BE CHECKED/ VERIFIED ON SITE. IF IN DOUBT ASK.
- 2. THIS DRAWING IS TO BE READ IN CONJUNCTION WITH ALL RELEVANT ARCHITECTS, ENGINEERS AND SPECIALISTS DRAWINGS AND SPECIFICATIONS.
- 3. ALL DIMENSIONS IN MILLIMETRES UNLESS NOTED OTHERWISE. ALL LEVELS IN METRES UNLESS NOTED OTHERWISE.
- 4. ANY DISCREPANCIES NOTED ON SITE ARE TO BE REPORTED TO THE ENGINEER IMMEDIATELY.

 LINETYPE DENOTES LOCATION OF SITE BOUNDARY

Rev	Date	Description	Drawn	Auth'd
AMENDMENTS				



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Client
East Staffordshire Borough Council

Project Title
The Dove Way Uttoxeter

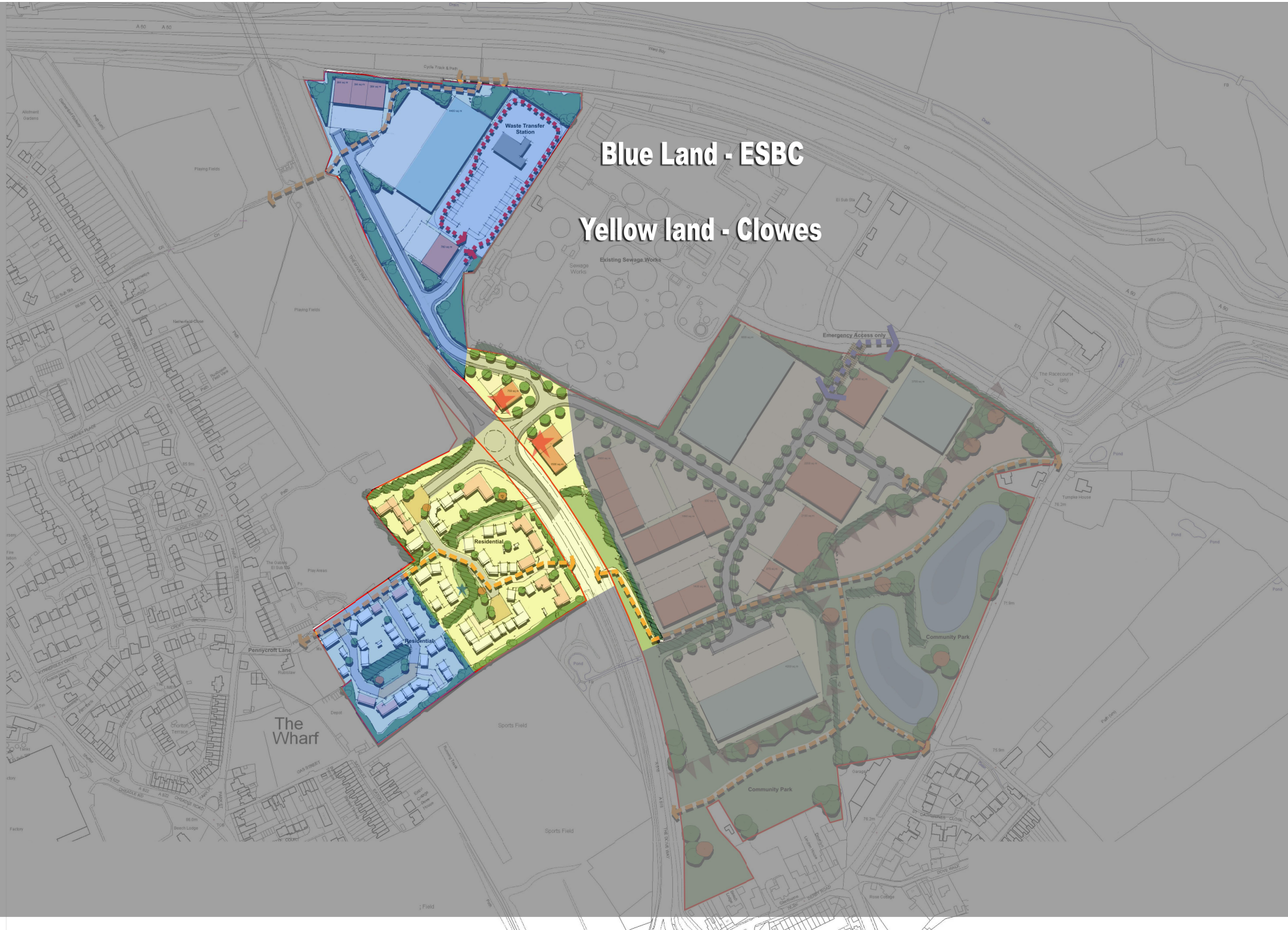
Drawing Title
Site Layout Plan

Scale	Date	Drawn	Authorised
1:2,500	30.06.2010	RTR	DRW

Drawing Status
FINAL

Drawing No:	Revision
NTE285/01/02	—

FIGURE 3
SITE DEVELOPMENT MASTERPLAN



Blue Land - ESBC
Yellow land - Clowes

Key

- Development Area
- Residential
- Formal residential
- Employment B1
- Employment B2 B8
- Gateway offices buildings
- Waste transfer station
- New community park
- Emergency access only
- Sustainable drainage system
- Proposed indicative planting
- Existing planting
- Footpath / cycleway routes
- Vehicular access
- Primary vehicle route
- Secondary vehicle route
- Square
- Extent of indicative flood plain
- Sewage treatment plant
- Pennycroft Well retained in landscaping
- Employment expansion subject to further flood study

Schedule

	Residential	3.89 ha
	Total units (1.89 ha x 62.9% x 50 dph)	73
	Employment East	9.15 ha
	Coverage	28455 sq m
	Employment West	4.30 ha
	Coverage (exclusive of flood area)	7082 sq m

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Revisions
 (A) General amendments

27 February 2009

The Dove Way, Uttoxeter, Staffordshire - Illustrative Layout

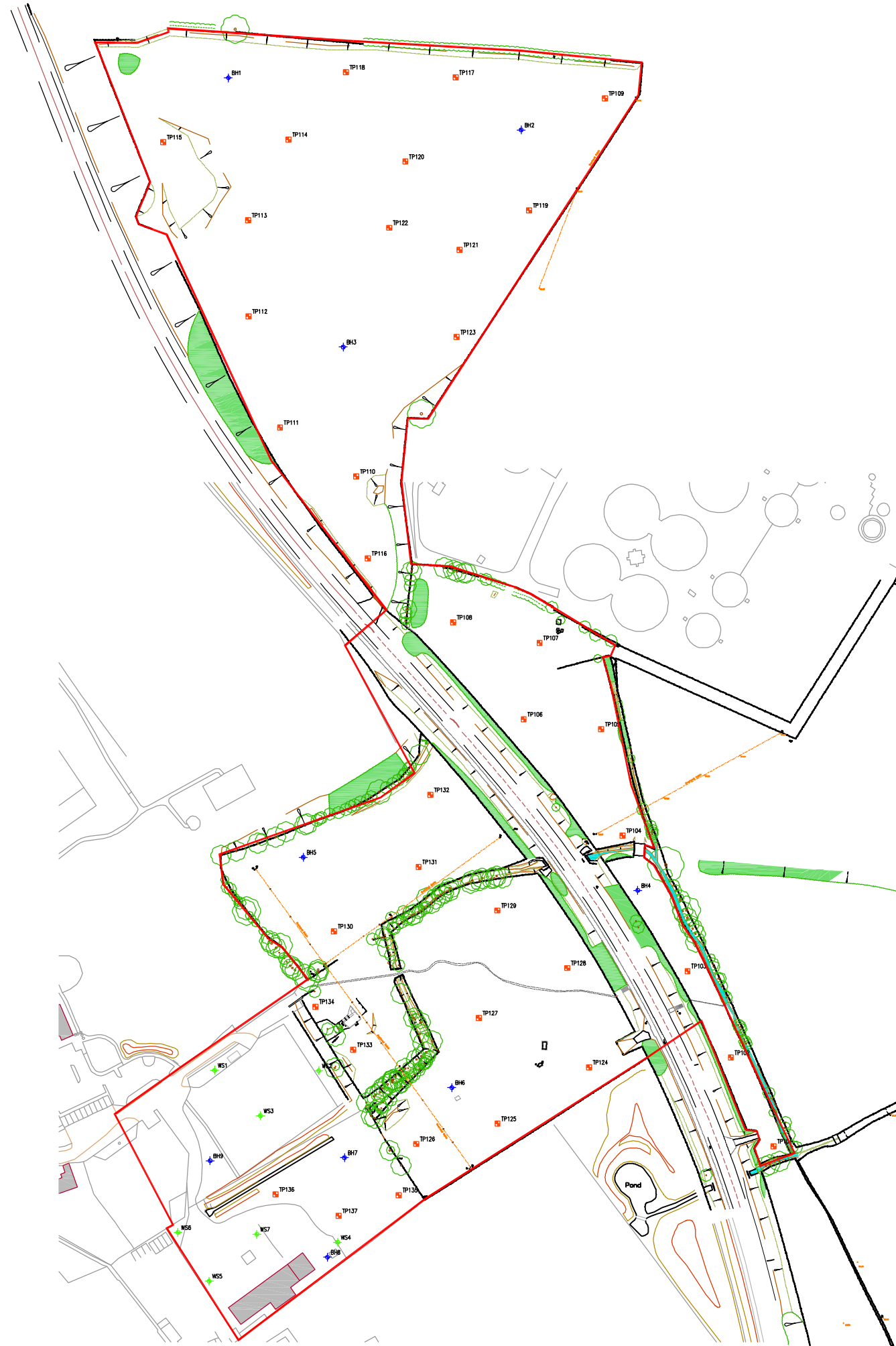
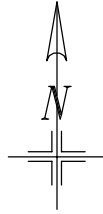
T 01509 670806 | F 01509 672247 | www.ppg-llp.co.uk | Team PS/ | 09 February 2009 | Scale 1:1250 @ A0 | dwg. EMS.1685-01-02-A | client Conder Developments

North

0m 100m



FIGURE 4
EXPLORATORY HOLE LOCATION PLAN



NOTES

- 1. DO NOT SCALE THIS DRAWING. ALL DIMENSIONS MUST BE CHECKED/ VERIFIED ON SITE. IF IN DOUBT ASK.
- 2. THIS DRAWING IS TO BE READ IN CONJUNCTION WITH ALL RELEVANT ARCHITECTS, ENGINEERS AND SPECIALISTS DRAWINGS AND SPECIFICATIONS.
- 3. ALL DIMENSIONS IN MILLIMETRES UNLESS NOTED OTHERWISE. ALL LEVELS IN METRES UNLESS NOTED OTHERWISE.
- 4. ANY DISCREPANCIES NOTED ON SITE ARE TO BE REPORTED TO THE ENGINEER IMMEDIATELY.

	LINETYPE DENOTES LOCATION OF SITE BOUNDARY
	WS** DENOTES LOCATION OF CABLE PERCUSSIVE BOREHOLE
	BH** DENOTES LOCATION OF WINDOW SAMPLE HOLE
	TP** DENOTES LOCATION OF TRAIL PIT

Rev	Date	Description	Drawn	Auth'd
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AMENDMENTS



Integrated Engineering and Environmental Consultants

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environmental | water | transportation | civil | structural | highways | infrastructure

Client
Clowes Securites (West Midlands) LLP & East Staffordshire Borough Council

Project Title
The Dove Way Uttoxeter

Drawing Title
Proposed Exploratory Hole Locations

Scale	Date	Drawn	Authorised
1:2,500	04.08.2010	RTR	DRW

Drawing Status
FINAL

Drawing No:	Revision
NTE285/03/01	-

APPENDICES

APPENDIX 1
SITE PHOTOGRAPHS



Access Gate to Area A off The Dove Way



Mound towards the southern area of Area A with potential Japanese Knotweed clumps.



View South across Area A



View north across Area A



Tunnel under The Dove Way at the western edge of the site



Clump of potential Japanese Knotweed in the northern section of Area A



View east from The Dove Way to the sewage treatment works



Land to the west of Area A and The Dove Way



Unit in the north western section of Area B



Area B—Exit of the Refuse site.



Skips and bins in the central area of the refuse



Waste oil AST in the eastern area of the refuse site.



Potential Japanese Knotweed by the entrance to the refuse site



Entrance to the industrial estate in the south of Area B



Industrial Buildings in the south of Area B



ASTs adjacent to the vehicle repair works



AST, old oil filter bin and other items including evidence of potential contamination migrating into the drainage system.



Former fire and drum with ash and other debris around the area



The Wharf Brook at the discharge point and end of the culvert in the western section of the site



Looking down stream—The Wharf Brook



Potential Japanese Knotweed on the northern bank of The Wharf Brook



Waste land in the south eastern section of Area B



Depot to the west of Area B



Parkland to the north of Area B




School to the south of Area B



Overgrown fields to the east of Area B

APPENDIX 2
EXPLORATORY HOLE LOGS

Project Title					The Dove Way, Uttoxeter					Hole Ref.		BH1	
Client					Clowes Securities & ESBC					Project No.		NTE285	
Plant used					Dando Rig					Start Date		End Date	
										06/07/2010		07/07/2010	
Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples			In-situ Testing				
Strike	Well					Type	Depth From	Depth To	Depth (m) (SPT Type)	Result			
		0.50	Long grass over TOPSOIL with abundant rootlets. - Interpolated from Driller's description	80.10		B	0.50	1.00					
			MADE GROUND: Very loose gravel fill with ash and pottery. (Landfill Material) - Interpolated from Driller's description			D			1.00 (C)	N=2 (1,0/0,1,1,0)			
		1.80	Firm grey mottled brown CLAY with occasional gravel. (Alluvium) - Interpolated from Driller's description	78.80		D	1.80		2.00 (C)	N=21 (2,2/6,7,4,4)			
		2.00	Medium dense grey and brown fine to coarse grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. (Fluvioglacial Deposits) - Interpolated from Driller's description	78.60		D	3.00	3.00 (C)		N=23 (4,3/5,6,5,7)			
						B	4.00	4.50	4.00 (C)	N=26 (4,4/4,6,8,8)			
									5.00 (C)	N=28 (6,5/9,9,5,5)			
									6.50 (C)	N=24 (4,5/10,5,4,5)			
			Occasional stiff red brown clay.			B	6.90	7.40					
									8.00 (C)	N=15 (2,3/3,5,4,3)			
									9.50 (C)	N=29 (3,5/6,7,7,9)			
<i>Continued next sheet</i>													
REMARKS 1. Groundwater depth recorded at 4.2m bgl on borehole completion. 2. No visual or olfactory evidence of contamination. 3. Hole cased to 5.0m bgl. 4. Water added between 2.0m bgl and 5.0m bgl. 5. Hole installed with 53mm HDPE Standpiepe with gas tap and raised cover. Response zone between 1.0m bgl and 11.0m bgl. 6. Hole position determined from the site topographical survey plan. 7. Hole level determined from an optical levelling survey.				SOIL SAMPLE TYPE D - 500g to 1kg Disturbed B - 5kg to 20kg Disturbed U - 100mm dia. Undisturbed J - 250ml Amber Glass Jar V - Glass Vial		IN-SITU TESTS SV - Hand Shear Vane HP - Hand Penetrometer N = SPT blows over 300mm S = Split Spoon Sampler C = Solid Cone PID - Photo Ionisation Detector (ppm)		GROUNDWATER ∇ Groundwater strike ▼ Standing groundwater level		 Environmental Division 3-4 Kayes Walk The Lace Market Nottingham NG1 1PY Tel : 0115 9241100 Fax : 0115 9503966			
				EASTING		NORTHING		GROUND LEVEL					
				409202.00		334669.00		80.60					
				LOGGED BY		SCALE		SHEET					
RTR		1:50		Sheet 1 of 2									

Project Title The Dove Way, Uttoxeter **Hole Ref.** BH1

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used Dando Rig **Start Date** 06/07/2010 **End Date** 07/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
		10.40 11.00	Medium dense grey and brown fine to coarse grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. (Fluvioglacial Deposits) - Interpolated from Driller's description Moderately weak red brown MUDSTONE. (Mercia Mudstone Formation) - Interpolated from Driller description. <i>End of hole at 11.00 m</i>	70.20 69.60				11.00 (S)	50 (8,11/18,21,11 for 20mm)

REMARKS
 1. Groundwater depth recorded at 4.2m bgl on borehole completion.
 2. No visual or olfactory evidence of contamination.
 3. Hole cased to 5.0m bgl.
 4. Water added between 2.0m bgl and 5.0m bgl.
 5. Hole installed with 53mm HDPE Standpiepe with gas tap and raised cover. Response zone between 1.0m bgl and 11.0m bgl.
 6. Hole position determined from the site topographical survey plan.
 7. Hole level determined from an optical levelling survey.

SOIL SAMPLE TYPE D - 500g to 1kg Disturbed B - 5kg to 20kg Disturbed U - 100mm dia. Undisturbed J - 250ml Amber Glass Jar V - Glass Vial	IN-SITU TESTS SV - Hand Shear Vane HP - Hand Penetrometer N = SPT blows over 300mm S = Split Spoon Sampler C = Solid Cone PID - Photo Ionisation Detector (ppm)	GROUNDWATER ☒ Groundwater strike ☑ Standing groundwater level
EASTING 409202.00	NORTHING 334669.00	GROUND LEVEL 80.60
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 2 of 2

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Project Title					The Dove Way, Uttoxeter					Hole Ref.		BH2	
Client					Clowes Securities & ESBC					Project No.		NTE285	
Plant used					Dando Rig					Start Date		End Date	
										07/07/2010		07/07/2010	
Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing					
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result				
		0.60	Long grass over TOPSOIL with abundant rootlets - Interpolated from Driller's description.	79.74									
		1.80	MADE GROUND: Very loose soil fill with ash, metal fragments, glass and pottery. (Landfill Material) - Interpolated from Driller's description	78.54		D	1.00	1.00 (C)	N=1 (1,0,0,0,1,0)				
		2.20	Firm grey mottled brown CLAY with occasional gravel. (Alluvium) - Interpolated from Driller's description	78.14		D	1.80	2.00 (S)	N=12 (1,1/1,3,4,4)				
		2.40	Medium dense grey and brown clayey sub rounded to rounded quartz GRAVEL. (Fluvioglacial Deposits) - Interpolated from Driller's description	77.94		B	3.00	3.50	3.00 (C)	N=40 (7,8/10,9,10,11)			
			Medium dense becoming dense from 8.0m grey and brown fine to coarse grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. (Fluvioglacial Deposits) - Interpolated from Driller's description						4.00 (C)	N=24 (3,5/6,7,6,5)			
									5.00 (C)	N=15 (2,3/3,4,4,4)			
						B	6.50	7.00	6.50 (C)	N=13 (3,3/3,3,4,3)			
		8.90	Moderately weak red brown MUDSTONE. (Mercia Mudstone Formation) - Interpolated from Driller description.	71.44		D	8.90	9.50	8.00 (C)	N=46 (9,9/11,12,12,11)			
		9.50	End of hole at 9.50 m	70.84		B	9.00		9.50 (S)	53 (7,10/12,13,15,13 for 30mm)			
REMARKS 1. Groundwater encountered at approximately 4.5m bgl. 2. No visual or olfactory evidence of contamination. 3. Hole cased throughout. 4. Water added between 2.4m bgl and 4.5m bgl. 5. Hole installed with 53mm HDPE Standpiepe with gas tap and raised cover. Response zone between 2.0m bgl and 9.5m bgl. 6. Hole position determined from the site topographical survey plan. 7. Hole level determined from an optical levelling survey.				SOIL SAMPLE TYPE D - 500g to 1kg Disturbed B - 5kg to 20kg Disturbed U - 100mm dia. Undisturbed J - 250ml Amber Glass Jar V - Glass Vial		IN-SITU TESTS SV - Hand Shear Vane HP - Hand Penetrometer N = SPT blows over 300mm S = Split Spoon Sampler C = Solid Cone PID - Photo Ionisation Detector (ppm)		GROUNDWATER ∇ Groundwater strike ▼ Standing groundwater level		 Environmental Division 3-4 Kayes Walk The Lace Market Nottingham NG1 1PY Tel : 0115 9241100 Fax : 0115 9503966			
EASTING		NORTHING		GROUND LEVEL									
409359.00		334639.00		80.34									
LOGGED BY		SCALE		SHEET									
RTR		1:50		Sheet 1 of 1									

Project Title					The Dove Way, Uttoxeter		Hole Ref.		BH3	
Client					Clowes Securities & ESBC		Project No.		NTE285	
Plant used					Dando Rig		Start Date		End Date	
					08/07/2010		08/07/2010			
Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing		
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result	
		0.10	Long grass over TOPSOIL with abundant rootlets - Interpolated from Driller's description.	80.46						
		0.40	MADE GROUND: Brown silty clayey topsoil with frequent bricks and concrete cobbles - Interpolated from Driller's description MADE GROUND: Concrete MADE GROUND: Very loose brown soil fill with ash, metal fragments and bottles. (Landfill Material) - Interpolated from Driller's description	80.16	[Cross-hatched pattern]	D	0.60	1.00 (C)	N=3 (1,0,0,1,1,1)	
		0.55		80.01						
		2.60	Firm grey mottled brown silty sandy CLAY. (Alluvium) - Interpolated from Driller's description	77.96	[Cross-hatched pattern]	D	2.60	3.00 (S)	N=11 (2,2,2,3,3,3)	
		3.40	Medium dense grey and brown fine to coarse grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. (Fluvioglacial Deposits) - Interpolated from Driller's description	77.16	[Stippled pattern]	B	4.00 4.50	4.00 (C)	N=13 (2,2,3,3,3,4)	
								5.00 (C)	N=15 (2,3,3,4,3,5)	
								6.50 (C)	N=26 (3,5,7,7,6,6)	
								8.00 (C)	N=31 (4,6,9,7,7,8)	
		8.40	Moderately weak red brown MUDSTONE. (Mercia Mudstone Formation) - Interpolated from Driller description.	72.16	[Horizontal lines pattern]	D	8.40			
		9.50	End of hole at 9.50 m	71.06				9.50 (S)	50 (7,11/15,18,17 for 30mm)	

REMARKS

- Groundwater encountered at approximately 5.6m bgl.
- No visual or olfactory evidence of contamination.
- Hole cased to 8.8m bgl.
- Hole installed with 53mm HDPE Standpiepe with gas tap and raised cover. Response zone between 2.0m bgl and 9.5m bgl.
- Hole position determined from the site topographical survey plan.
- Hole level determined from an optical levelling survey.

SOIL SAMPLE TYPE D - 500g to 1kg Disturbed B - 5kg to 20kg Disturbed U - 100mm dia. Undisturbed J - 250ml Amber Glass Jar V - Glass Vial		IN-SITU TESTS SV - Hand Shear Vane HP - Hand Penetrometer N = SPT blows over 300mm S = Split Spoon Sampler C = Solid Cone PID - Photo Ionisation Detector (ppm)		GROUNDWATER ∇ Groundwater strike ▼ Standing groundwater level	
EASTING 409258.00	NORTHING 334514.00	GROUND LEVEL 80.56			
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1			

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Project Title					The Dove Way, Uttoxeter		Hole Ref.		BH7		
Client					Clowes Securities & ESBC		Project No.		NTE285		
Plant used					Dando Rig		Start Date		End Date		
							07/07/2010		07/07/2010		
Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing			
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result		
			MADE GROUND: Dense brick fill - Interpolated from Driller's description.			B	0.20	0.70			
						D	0.50				
		1.70	Medium dense grey and brown fine grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. (Fluvioglacial Deposits) - Interpolated from Driller's description	83.04		D	1.80		1.00 (C)	N=46 (12,12/10,11,12,13)	
						B	2.00	2.50	2.00 (C)	N=25 (8,5/5,7,7,6)	
									3.00 (C)	N=25 (6,6/7,6,6,6)	
									4.00 (C)	N=30 (8,7/7,8,8,7)	
			Stiff red brown clay.			B	4.50	5.00			
						D	4.60		5.00 (C)	N=26 (6,5/6,6,8,6)	
									6.20 (S)	N=29 (5,7/8,7,7,7)	
		7.20	Weak red brown MUDSTONE. (Mercia Mudstone Formation) - Interpolated from Driller's description.	77.54					7.20 (S)	50 (25/14,16,14,6 for 0mm)	
						B	8.00	8.50			
		9.00	End of hole at 9.00 m	75.74					9.00 (S)	50 (25 for 10mm/32,18 for 30mm)	
REMARKS 1. Groundwater encountered at approximately 6.2m bgl. 2. No visual or olfactory evidence of contamination. 3. Hole cased to 8.5m bgl. 4. Hole installed with 53mm HDPE Standpipe with gas tap and raised cover. Response zone between 1.0m bgl and 8.5m bgl. 5. Hole position determined from the site topographical survey plan. 6. Hole level determined from an optical levelling survey.				SOIL SAMPLE TYPE D - 500g to 1kg Disturbed B - 5kg to 20kg Disturbed U - 100mm dia. Undisturbed J - 250ml Amber Glass Jar V - Glass Vial		IN-SITU TESTS SV - Hand Shear Vane HP - Hand Penetrometer N = SPT blows over 300mm S = Split Spoon Sampler C = Solid Cone PID - Photo Ionisation Detector (ppm)		GROUNDWATER Groundwater strike Standing groundwater level		 Environmental Division 3-4 Kayes Walk The Lace Market Nottingham NG1 1PY Tel : 0115 9241100 Fax : 0115 9503966	
EASTING		NORTHING		GROUND LEVEL							
409200.00		334125.00		84.74							
LOGGED BY		SCALE		SHEET							
RTR		1:50		Sheet 1 of 1							

Project Title						The Dove Way, Uttoxeter		Hole Ref.		BH8	
Client						Clowes Securities & ESBC		Project No.		NTE285	
Plant used						Dando Rig		Start Date		End Date	
						08/07/2010		08/07/2010			
Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing			
Strike	Well					Type	Depth From	Depth To	Depth (m) (SPT Type)	Result	
		0.30	MADE GROUND: Brick fill - Interpolated from Driller's description.	83.01		B	0.50	1.00			
			MADE GROUND: Fill including frequent concrete boulders - Interpolated from Driller's description.			D			1.00 (C)	50 (25 for 20mm/50 for 40mm)	
		2.30	Medium dense grey and brown fine grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. (Fluvioglacial Deposits) - Interpolated from Driller's description	81.01		B	3.00	3.50	3.00 (C)	N=29 (7,8,7,7,8)	
						D			2.00 (C)	50 (25 for 0mm/43.7 for 10mm)	
		4.10	Weak red brown MUDSTONE. (Mercia Mudstone Formation) - Interpolated from Driller's description.	79.21		B	5.00	5.50	4.00 (C)	N=29 (6,8/6,8,8,7)	
						D	6.00		5.00 (S)	50 (25/18,17,15 for 50mm)	
		6.50	End of hole at 6.50 m	76.81					6.50 (S)	50 (25/16,15,19 for 50mm)	
REMARKS			SOIL SAMPLE TYPE		IN-SITU TESTS		GROUNDWATER				
<ol style="list-style-type: none"> Groundwater encountered at approximately 4.1m bgl. Slight solvent odour noted between 0.3m bgl and 2.3m bgl. Hole cased to 5.0m bgl. Hole installed with 53mm HDPE Standpipe with gas tap and raised cover. Response zone between 1.0m bgl and 6.0m bgl. Hole position determined from the site topographical survey plan. Hole level determined from an optical levelling survey. 			D - 500g to 1kg Disturbed		SV - Hand Shear Vane		∇ Groundwater strike				
			B - 5kg to 20kg Disturbed		HP - Hand Penetrometer		▼ Standing groundwater level				
			U - 100mm dia. Undisturbed		N = SPT blows over 300mm						
			J - 250ml Amber Glass Jar		C = Solid Cone						
			V - Glass Vial		PID - Photo Ionisation Detector (ppm)						
			EASTING		NORTHING		GROUND LEVEL				
409258.00		334080.00		83.31							
LOGGED BY		SCALE		SHEET							
RTR		1:50		Sheet 1 of 1							



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Project Title					The Dove Way, Uttoxeter					Hole Ref.		BH9	
Client					Clowes Securities & ESBC					Project No.		NTE285	
Plant used					Dando Rig					Start Date		End Date	
										07/07/2010		08/07/2010	
Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing					
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result				
		0.30	MADE GROUND: Fine to coarse angular road stone GRAVEL - Interpolated from Driller's description	80.87		B	0.50	1.00					
		0.50	MADE GROUND: Fine to coarse angular brick GRAVEL fill - Interpolated from Driller's description.	80.67		D			1.00 (C) N=1 (1,0,0,0,1,0)				
			Very soft to firm CLAY. (Alluvium) - Interpolated from Driller's description.										
		2.20	Firm sandy gravelly CLAY. Gravel is rounded fine to coarse quartz. (Alluvium) - interpolated from Driller's description.	78.97		B	2.50	3.00	2.00 (C) N=10 (1,0,2,3,3,2)				
						D			3.00 (C) N=16 (2,2/3,3,4,6)				
		3.30	Weak red brown MUDSTONE. (Mercia Mudstone Formation) - Interpolated from Driller's description.	77.87					3.50 (S) N=27 (7,6/7,7,6,7)				
						D	4.50	4.50	4.50 (S) 50 (10,10/13,13,12,12 for 50mm)				
						B	5.00	5.50					
		5.30	End of hole at 5.30 m	75.87					5.50 (S) 50 (25 for 60mm/17,14,14,5 for 0m)				

REMARKS

1. Groundwater encountered at approximately 3.3m bgl
2. No visual or olfactory evidence of contamination.
3. Hole cased to 4.5m bgl.
4. Hole installed with 53mm HDPE Standpiepe with gas tap and raised cover. Response zone between 1.0m bgl and 4.5m bgl.
5. Hole position determined from the site topographical survey plan.
6. Hole level determined from an optical levelling survey.

SOIL SAMPLE TYPE

- D - 500g to 1kg Disturbed
- B - 5kg to 20kg Disturbed
- U - 100mm dia. Undisturbed
- J - 250ml Amber Glass Jar
- V - Glass Vial

IN-SITU TESTS

- SV - Hand Shear Vane
- HP - Hand Penetrometer
- N = SPT blows over 300mm
- S = Split Spoon Sampler
- C = Solid Cone
- PID - Photo Ionisation Detector (ppm)

GROUNDWATER

- ∇ Groundwater strike
- ▼ Standing groundwater level

EASTING 409274.00	NORTHING 334135.00	GROUND LEVEL 81.17
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1


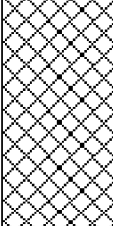
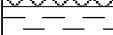
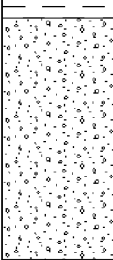


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Project Title The Dove Way, Uttoxeter **Hole Ref.** TP109

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used JCB 3CX **Start Date** 08/07/2010 **End Date** 08/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
		0.20	MADE GROUND: Grass over firm to stiff brown CLAY with abundant roots.	79.68					
			MADE GROUND: Brown grey ashy gravelly SAND and CLAY in a matrix with frequent glass, bottles, plastics, metals fragments, wood, textiles and pottery. Localised hydrocarbon odours and staining noted. (Landfill Material)			DJV	0.90		
		1.90	Firm grey brown CLAY. (Alluvium)	77.98					
		2.20	Grey and brown fine to coarse grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. Slight hydrocarbon odours and staining noted. (Fluvioglacial Deposits)	77.68		DJV	2.50		
		3.80	End of hole at 3.80 m	76.08					



REMARKS

- No significant groundwater strike though sand and gravel strata noted to be damp.
- Localised hydrocarbon odours and staining noted throughout.
- Hole backfilled with arisings on completion.
- Granular strata very unstable.
- Hole terminated to hole instability.
- Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE
 D - 500g to 1kg Disturbed
 B - 5kg to 20kg Disturbed
 U - 100mm dia. Undisturbed
 J - 250ml Amber Glass Jar
 V - Glass Vial

IN-SITU TESTS
 SV - Hand Shear Vane
 HP - Hand Penetrometer
 N = SPT blows over 300mm
 S = Split Spoon Sampler
 C = Solid Cone

PID - Photo Ionisation Detector (ppm)

GROUNDWATER
 Groundwater strike
 Standing groundwater level

EASTING 409389.00	NORTHING 334648.00	GROUND LEVEL 79.88
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1







Environmental Division
 3-4 Kayes Walk
 The Lace Market
 Nottingham
 NG1 1PY
 Tel : 0115 9241100
 Fax : 0115 9503966

Project Title The Dove Way, Uttoxeter **Hole Ref.** TP110

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used JCB 3CX **Start Date** 07/07/2010 **End Date** 07/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
		0.10	MADE GROUND: Brick, rubble and plastics.	80.10		DJV	0.40		
		0.40	MADE GROUND: Soft brown sandy gravelly CLAY. Gravel is brick plastics and medium quartz cobbles	79.80		DJV	0.80		
		1.80	MADE GROUND: Medium brown to black sandy gravelly CLAY landfill of plastics, glass, wire, machinery, wood, paper.	78.40		DB DJV	2.50	2.50	SV = 60 kN/m2
		2.80	Soft orange brown to pinkish grey slightly gravelly slightly sandy CLAY. Gravel is fine coal and fibrous organic matter.	77.40					
			End of hole at 2.80 m						



REMARKS

- No significant groundwater strike though sand and gravel strata noted to be damp.
- No visual or olfactory evidence of contamination.
- Hole backfilled with arisings on completion.
- Granular strata very unstable.
- Hole terminated to hole instability.
- Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE
 D - 500g to 1kg Disturbed
 B - 5kg to 20kg Disturbed
 U - 100mm dia. Undisturbed
 J - 250ml Amber Glass Jar
 V - Glass Vial

IN-SITU TESTS
 SV - Hand Shear Vane
 HP - Hand Penetrometer
 N = SPT blows over 300mm
 S = Split Spoon Sampler
 C = Solid Cone

PID - Photo Ionisation Detector (ppm)

GROUNDWATER
 Groundwater strike
 Standing groundwater level

EASTING 409271.00	NORTHING 334466.00	GROUND LEVEL 80.20
LOGGED BY AM	SCALE 1:50	SHEET Sheet 1 of 1








Environmental Division
 3-4 Kayes Walk
 The Lace Market
 Nottingham
 NG1 1PY
 Tel : 0115 9241100
 Fax : 0115 9503966

Project Title The Dove Way, Uttoxeter **Hole Ref.** TP111

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used JCB 3CX **Start Date** 07/07/2010 **End Date** 07/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
		0.10	MADE GROUND: Brick and rubble.	80.55		DJV	0.40		
		0.50	MADE GROUND: soft brown sandy cobbly CLAY. Cobbles of quartz, glass, tile and brick.	80.15					
			MADE GROUND: Black slightly sandy gravelly cobbly CLAY containing landfill of plastic bags, metal wire, glass, brick, paper, wood, flooring, shoes, bones and occasional quartz sub-rounded quartz.						
		2.50	Soft light orange brown mottled grey slightly gravelly slightly sandy CLAY. Gravel is sub rounded quartz. Contains organic matter and roots. (Alluvium)	78.15		DJV	2.80		
		3.00	End of hole at 3.00 m	77.65					



REMARKS

1. No significant groundwater strike though sand and gravel strata noted to be damp.
2. No visual or olfactory evidence of contamination.
3. Hole backfilled with arisings on completion.
4. Granular strata very unstable.
5. Hole terminated to hole instability.
6. Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE
 D - 500g to 1kg Disturbed
 B - 5kg to 20kg Disturbed
 U - 100mm dia. Undisturbed
 J - 250ml Amber Glass Jar
 V - Glass Vial

IN-SITU TESTS
 SV - Hand Shear Vane
 HP - Hand Penetrometer
 N = SPT blows over 300mm
 S = Split Spoon Sampler
 C = Solid Cone

PID - Photo Ionisation Detector (ppm)

GROUNDWATER
 Groundwater strike
 Standing groundwater level

EASTING 409240.00	NORTHING 334491.00	GROUND LEVEL 80.65
LOGGED BY AM	SCALE 1:50	SHEET Sheet 1 of 1



Environmental Division
 3-4 Kayes Walk
 The Lace Market
 Nottingham
 NG1 1PY
 Tel : 0115 9241100
 Fax : 0115 9503966

Project Title The Dove Way, Uttoxeter **Hole Ref.** TP112

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used JCB 3CX **Start Date** 07/07/2010 **End Date** 07/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
		0.30 0.40	MADE GROUND: Brown sandy gravelly CLAY. Gravel is sub-angular to sub-rounded quartz and brick, glass and tile.	80.68 80.58		DJV	0.80		
			MADE GROUND: Black fine to coarse compacted sand						
		1.50	MADE GROUND: Dark brown to black sandy CLAY landfill with, metal bar, lump hammer, cement, yellow plastic, metal machinery, glass.	79.48		DJV	2.80		
		2.40	MADE GROUND: Black soft slightly clayey gravelly cobbly SAND with domestic landfill containing, bottles, glass, domestic waste, brick and paper (1967-68).	78.58					
		2.80 2.90	Soft orange brown to pinkish grey slightly gravelly slightly sandy CLAY. Gravel is fine coal and fibrous organic matter.	78.18 78.08		DJV	2.80		
			Grey and brown fine to coarse grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. (Fluvioglacial Deposits)						
			<i>End of hole at 2.90 m</i>						

- REMARKS**
1. No significant groundwater strike though sand and gravel strata noted to be damp.
 2. No visual or olfactory evidence of contamination.
 3. Hole backfilled with arisings on completion.
 4. Granular strata very unstable.
 5. Hole terminated to hole instability.
 6. Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE D - 500g to 1kg Disturbed B - 5kg to 20kg Disturbed U - 100mm dia. Undisturbed J - 250ml Amber Glass Jar V - Glass Vial	IN-SITU TESTS SV - Hand Shear Vane HP - Hand Penetrometer N = SPT blows over 300mm S = Split Spoon Sampler C = Solid Cone PID - Photo Ionisation Detector (ppm)	GROUNDWATER ▽ Groundwater strike ▼ Standing groundwater level
EASTING 409223.00	NORTHING 334536.00	GROUND LEVEL 80.98
LOGGED BY AM	SCALE 1:50	SHEET Sheet 1 of 1



Environmental Division
3-4 Kayes Walk
The Lace Market
Nottingham
NG1 1PY
Tel : 0115 9241100
Fax : 0115 9503966

Project Title The Dove Way, Uttoxeter						Hole Ref. TP113						
Client Clowes Securities & ESBC						Project No. NTE285						
Plant used JCB 3CX						Start Date 07/07/2010	End Date 07/07/2010					
Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing				
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result			
		0.05	MADE GROUND: Brick and Rubble	80.76		DJV	3.00					
		0.40	MADE GROUND: Soft medium brown slightly cobbly slightly sandy CLAY. Cobbles are medium sub-rounded to sub-angular brick and quartzite.	80.41								
		1.00	MADE GROUND: Black slightly gravelly SAND. Gravel is white and artificially made.	79.81								
		2.00	MADE GROUND: Soft medium brown and orange sandy gravelly CLAY with domestic and industrial landfill.	78.81							2.25	SV = 40 kN/m2
		2.50	Soft orange brown to pinkish grey slightly gravelly slightly sandy CLAY. Gravel is fine coal with fibrous organic matter.	78.31							2.80	SV = 45 kN/m2
		2.90	Firm light brown mottled orange brown slightly sandy slightly gravelly CLAY. Gravel is angular fine coal and occasional fine to coarse rounded quartz.	77.91								
		3.10	Firm light brown mottled orange brown slightly sandy slightly gravelly CLAY. Gravel is angular fine coal and occasional fine to coarse rounded quartz.	77.71								
			Grey and brown fine to coarse grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. (Fluvioglacial Deposits)									
			End of hole at 3.10 m									
REMARKS 1. Groundwater strike noted at approximately 3.1m bgl. 2. No visual or olfactory evidence of contamination. 3. Hole backfilled with arisings on completion. 4. Granular strata very unstable. 5. Hole terminated to hole instability. 6. Hole position and elevation determined from the site topographical survey plan.			SOIL SAMPLE TYPE D - 500g to 1kg Disturbed B - 5kg to 20kg Disturbed U - 100mm dia. Undisturbed J - 250ml Amber Glass Jar V - Glass Vial		IN-SITU TESTS SV - Hand Shear Vane HP - Hand Penetrometer N = SPT blows over 300mm S = Split Spoon Sampler C = Solid Cone PID - Photo Ionisation Detector (ppm)		GROUNDWATER ∇ Groundwater strike ▼ Standing groundwater level		 Environmental Division 3-4 Kayes Walk The Lace Market Nottingham NG1 1PY Tel : 0115 9241100 Fax : 0115 9503966			
			EASTING 409223.00	NORTHING 334590.00	GROUND LEVEL 80.81							
			LOGGED BY AM	SCALE 1:50	SHEET Sheet 1 of 1							

Project Title The Dove Way, Uttoxeter						Hole Ref. TP114					
Client Clowes Securities & ESBC						Project No. NTE285					
Plant used JCB 3CX						Start Date 07/07/2010	End Date 07/07/2010				
Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing			
Strike	Well					Type	Depth From	To	Depth (m) (SPT Type)	Result	
		0.45	MADE GROUND: Long grass over brown silty sandy TOPSOIL	80.43		DJV	0.50				
		0.80	MADE GROUND: Soft slightly sandy slightly gravelly CLAY. Contains fibrous organic material.	80.08							
		1.60	MADE GROUND: Soft yellowy brown to orange sandy gravelly CLAY. Contains medium sub-angular brick cobbles and domestic waste.	79.28							
		2.10	MADE GROUND: Black gravelly slightly clayey SAND. Gravel is fine to medium sub-rounded quartz and brick fragments. Contains landfill	78.78							
		2.60	predominantly plastics.	78.28							2.50 SV = 45 kN/m2
		3.10	Firm green and brown grey slightly sandy CLAY. Contains coal fragments and fibrous organic material. (Alluvium)	77.78							2.90 SV = 50 kN/m2
			Firm light brown mottled orange sandy CLAY. Contains coal fragments and fibrous organic material. (Fluvioglacial Deposits)								
			End of hole at 3.10 m								
REMARKS			SOIL SAMPLE TYPE		IN-SITU TESTS		GROUNDWATER				
1. No significant groundwater strike though sand and gravel strata noted to be damp. 2. No visual or olfactory evidence of contamination. 3. Hole backfilled with arisings on completion. 4. Granular strata very unstable. 5. Hole terminated to hole instability. 6. Hole position and elevation determined from the site topographical survey plan.			D - 500g to 1kg Disturbed		SV - Hand Shear Vane		∇ Groundwater strike				
			B - 5kg to 20kg Disturbed		HP - Hand Penetrometer		▼ Standing groundwater level				
			U - 100mm dia. Undisturbed		N = SPT blows over 300mm						
			J - 250ml Amber Glass Jar		C = Solid Cone						
			V - Glass Vial		PID - Photo Ionisation Detector (ppm)						
			EASTING	NORTHING	GROUND LEVEL		 Environmental Division 3-4 Kayes Walk The Lace Market Nottingham NG1 1PY Tel : 0115 9241100 Fax : 0115 9503966				
			409237.00	334634.00	80.88						
			LOGGED BY	SCALE	SHEET						
			AM	1:50	Sheet 1 of 1						

Project Title The Dove Way, Uttoxeter **Hole Ref.** TP115

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used JCB 3CX **Start Date** 07/07/2010 **End Date** 07/07/2010






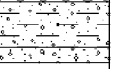
Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
		0.10	MADE GROUND: Long grass over brown silty sandy TOPSOIL	79.54		DJV	0.60		
		0.70	MADE GROUND: Soft slightly sandy CLAY. Contains occasional medium sub-rounded quartz cobbles and tile.	78.94					
		1.20	Soft orangey brown slightly sandy CLAY. Contains coal fragments and fibrous organic material. (Alluvium)	78.44					
∇	2.00	2.50	Brown orangey red clayey SAND and GRAVEL. Gravel is medium to coarse sub rounded quartz. Sand occurs in pockets and content increases with depth. (Fluvioglacial Deposits)	77.14					
		2.90	Soft red and grey slightly gravelly CLAY. Gravel is fine rounded quartz. (Fluvioglacial Deposits)	76.74					
			End of hole at 2.90 m					2.80	SV = 20 kN/m2
								2.90	SV = 30 kN/m2




- REMARKS**
- No significant groundwater strike though sand and gravel strata noted to be damp.
 - No visual or olfactory evidence of contamination.
 - Hole backfilled with arisings on completion.
 - Granular strata very unstable.
 - Hole terminated to hole instability.
 - Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE D - 500g to 1kg Disturbed B - 5kg to 20kg Disturbed U - 100mm dia. Undisturbed J - 250ml Amber Glass Jar V - Glass Vial		IN-SITU TESTS SV - Hand Shear Vane HP - Hand Penetrometer N = SPT blows over 300mm S = Split Spoon Sampler C = Solid Cone PID - Photo Ionisation Detector (ppm)		GROUNDWATER ∇ Groundwater strike ▼ Standing groundwater level	
EASTING 409171.00	NORTHING 334656.00	GROUND LEVEL 79.64			
LOGGED BY AM	SCALE 1:50	SHEET Sheet 1 of 1			



Environmental Division
3-4 Kayes Walk
The Lace Market
Nottingham
NG1 1PY
Tel : 0115 9241100
Fax : 0115 9503966

Project Title					The Dove Way, Uttoxeter		Hole Ref.		TP116	
Client					Clowes Securities & ESBC		Project No.		NTE285	
Plant used					JCB 3CX		Start Date		End Date	
					07/07/2010		07/07/2010			
Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing		
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result	
		0.30	MADE GROUND: Brick and rubble over a black canvas membrane layer.	80.02		DJV	0.20			
		0.50	MADE GROUND: Brown sandy slightly gravelly CLAY. Gravel is medium to coarse sub-angular brick and medium sub-rounded quartz.	79.82						
		1.70	MADE GROUND: Black slightly clayey gravelly SAND. Gravel is fine and sub-angular. Contains glass, wire, brick, fibrous material (clothing and paper) metal. (Ashy fill)	78.62		DJV	1.80			
		2.30	MADE GROUND: Soft medium brown to black slightly sandy slightly gravelly CLAY. Landfill with glass, paper, plastic bags, pots, metal and ash.	78.02						
		2.60		77.72						
		2.70		77.62						
			Soft brown slightly sandy slightly gravelly CLAY. Gravel is medium sub rounded quartz. Contains occasional fine angular coal fragments with fibrous organic material. (Alluvium)							
			Grey and brown fine to coarse grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. (Fluvioglacial Deposits)							
			End of hole at 2.70 m							

REMARKS 1. No significant groundwater strike though sand and gravel strata noted to be damp. 2. No visual or olfactory evidence of contamination. 3. Hole backfilled with arisings on completion. 4. Granular strata very unstable. 5. Hole terminated to hole instability. 6. Hole position and elevation determined from the site topographical survey plan.	SOIL SAMPLE TYPE D - 500g to 1kg Disturbed B - 5kg to 20kg Disturbed U - 100mm dia. Undisturbed J - 250ml Amber Glass Jar V - Glass Vial	IN-SITU TESTS SV - Hand Shear Vane HP - Hand Penetrometer N = SPT blows over 300mm S = Split Spoon Sampler C = Solid Cone PID - Photo Ionisation Detector (ppm)	GROUNDWATER  Groundwater strike  Standing groundwater level	 Environmental Division 3-4 Kayes Walk The Lace Market Nottingham NG1 1PY Tel : 0115 9241100 Fax : 0115 9503966
	EASTING 409279.00	NORTHING 334418.00	GROUND LEVEL 80.32	
	LOGGED BY AM	SCALE 1:50	SHEET Sheet 1 of 1	

Project Title The Dove Way, Uttoxeter **Hole Ref.** TP117

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used JCB 3CX **Start Date** 08/07/2010 **End Date** 08/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
			Long grass and vegetation over firm friable orange brown slightly gravelly very sandy CLAY. (Alluvium)			DJV	0.50		
		1.50	Soft grey brown slightly gravelly CLAY. Gravel is rounded fine to coarse quartz. (Alluvium)	78.80		DJV	1.80		
		1.90	Grey and brown fine to coarse grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. (Fluvioglacial Deposits)	78.40					
		3.40	End of hole at 3.40 m	76.90					

REMARKS

1. No significant groundwater strike though sand and gravel strata noted to be damp.
2. No visual or olfactory evidence of contamination.
3. Hole backfilled with arisings on completion.
4. Granular strata very unstable.
5. Hole terminated to hole instability.
6. Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE

D - 500g to 1kg Disturbed
 B - 5kg to 20kg Disturbed
 U - 100mm dia. Undisturbed
 J - 250ml Amber Glass Jar
 V - Glass Vial

IN-SITU TESTS

SV - Hand Shear Vane
 HP - Hand Penetrometer
 N = SPT blows over 300mm
 S = Split Spoon Sampler
 C = Solid Cone

PID - Photo Ionisation Detector (ppm)

GROUNDWATER

∇ Groundwater strike
 ▼ Standing groundwater level

EASTING 409335.00	NORTHING 334667.00	GROUND LEVEL 80.30
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1



Environmental Division
 3-4 Kayes Walk
 The Lace Market
 Nottingham
 NG1 1PY
 Tel : 0115 9241100
 Fax : 0115 9503966

Project Title The Dove Way, Uttoxeter **Hole Ref.** TP118

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used JCB 3CX **Start Date** 08/07/2010 **End Date** 08/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
		0.30	Long grass and vegetation over brown silty sandy organic TOPSOIL with abundant rootlets	80.15					
		1.60	MADE GROUND: Soft brown CLAY and gravelly SAND combined in a matrix with ash, wood, metal fragments, glass, wood shavings, textiles and plastics. Gravel is fine to coarse angular to rounded quartz, concrete and brick. Localised hydrocarbon odours and staining noted. (Landfill Material)	78.85		DJV	0.90		
		1.90	Soft grey brown CLAY. (Alluvium)	78.55					
		3.60	Grey and brown fine to coarse grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. (Fluvioglacial Deposits)	76.85		DJV	3.00		
		3.60	End of hole at 3.60 m						

REMARKS

- No significant groundwater strike though sand and gravel strata noted to be damp.
- Localised hydrocarbon odours and staining noted between 0.3m bgl and 1.6m bgl.
- Hole backfilled with arisings on completion.
- Granular strata very unstable.
- Hole terminated to hole instability.
- Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE
 D - 500g to 1kg Disturbed
 B - 5kg to 20kg Disturbed
 U - 100mm dia. Undisturbed
 J - 250ml Amber Glass Jar
 V - Glass Vial

IN-SITU TESTS
 SV - Hand Shear Vane
 HP - Hand Penetrometer
 N = SPT blows over 300mm
 S = Split Spoon Sampler
 C = Solid Cone

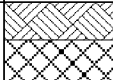
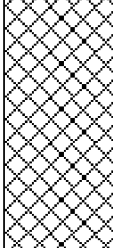

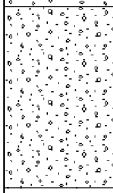

PID - Photo Ionisation Detector (ppm)

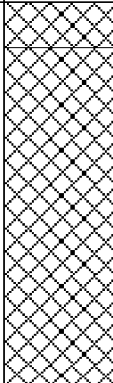
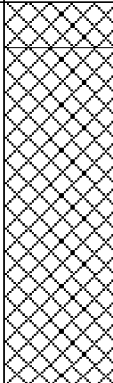
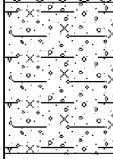

GROUNDWATER
 Groundwater strike
 Standing groundwater level

EASTING 409255.00	NORTHING 334669.00	GROUND LEVEL 80.45
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1



Environmental Division
 3-4 Kayes Walk
 The Lace Market
 Nottingham
 NG1 1PY
 Tel : 0115 9241100
 Fax : 0115 9503966

Project Title The Dove Way, Uttoxeter						Hole Ref. TP119			
Client Clowes Securities & ESBC						Project No. NTE285			
Plant used JCB 3CX						Start Date 08/07/2010	End Date 08/07/2010		
Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
		0.25	Long grass over brown silty sandy organic TOPSOIL with abundant rootlets.	80.23		DJV	0.50		
		2.20	MADE GROUND: Dark brown ashy gravelly SAND with frequent whole bricks, concrete cobbles and boulders, plastics, bottles, metal fragments, wood and textiles with localised organic/hydrocarbon odours and staining. (Landfill Material)	78.28					
		2.70	Firm to stiff orange brown and grey gravelly CLAY. Gravel is rounded fine to medium quartz. (Alluvium)	77.78					
		3.90	Grey and brown fine to coarse grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. Slight hydrocarbon/organic odours and staining noted. (Fluvioglacial Deposits)	76.58		DJV	3.20		
			End of hole at 3.90 m						
REMARKS			SOIL SAMPLE TYPE		IN-SITU TESTS		GROUNDWATER		
<ol style="list-style-type: none"> No significant groundwater strike though sand and gravel strata noted to be damp. Localised hydrocarbon odours and staining noted between 0.25m bgl and 2.2m bgl and between 2.7m bgl and 3.9m bgl. Hole backfilled with arisings on completion. Granular strata very unstable. Hole terminated to hole instability. Hole position and elevation determined from the site topographical survey plan. 			D - 500g to 1kg Disturbed		SV - Hand Shear Vane		∇ Groundwater strike		
			B - 5kg to 20kg Disturbed		HP - Hand Penetrometer		▼ Standing groundwater level		
			U - 100mm dia. Undisturbed		N = SPT blows over 300mm				
			J - 250ml Amber Glass Jar		S = Split Spoon Sampler				
			V - Glass Vial		C = Solid Cone				
					PID - Photo Ionisation Detector (ppm)				
EASTING		NORTHING		GROUND LEVEL			 Environmental Division 3-4 Kayes Walk The Lace Market Nottingham NG1 1PY Tel : 0115 9241100 Fax : 0115 9503966		
409361.00		334612.00		80.48					
LOGGED BY		SCALE		SHEET					
RTR		1:50		Sheet 1 of 1					

Project Title The Dove Way, Uttoxeter						Hole Ref. TP120			
Client Clowes Securities & ESBC						Project No. NTE285			
Plant used JCB 3CX						Start Date 08/07/2010	End Date 08/07/2010		
Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
		0.30	MADE GROUND: Grass over brown grey sandy angular to rounded fine to coarse brick, quartz and concrete GRAVEL with occasional cobbles.	80.36		DJV	0.80		
		2.60	MADE GROUND: Brown ashy gravelly fine to coarse grained SAND with frequent metal fragments, cable, glass, plastics, textiles, bottles, newspaper and bitumen. Gravel is angular to rounded fine to coarse brick, concrete and quartz. Hydrocarbon odours noted associated with the bitumen material. (Landfill Material)	78.06		DJV	3.00		
		3.60	Orange brown and occasionally grey clayey silty sandy cobbly rounded fine to coarse GRAVEL. (Fluvioglacial Deposits)	77.06					
			End of hole at 3.60 m						
REMARKS			SOIL SAMPLE TYPE	IN-SITU TESTS	GROUNDWATER				
1. No significant groundwater strike though sand and gravel strata noted to be damp.			D - 500g to 1kg Disturbed	SV - Hand Shear Vane	∇ Groundwater strike				
2. Hydrocarbon odours associated with bitumen noted between 0.3m and 2.6m bgl.			B - 5kg to 20kg Disturbed	HP - Hand Penetrometer	▼ Standing groundwater level				
3. Hole backfilled with arisings on completion.			U - 100mm dia. Undisturbed	N = SPT blows over 300mm					
4. Granular strata very unstable.			J - 250ml Amber Glass Jar	S = Split Spoon Sampler					
5. Hole terminated to hole instability.			V - Glass Vial	C = Solid Cone					
6. Hole position and elevation determined from the site topographical survey plan.				PID - Photo Ionisation Detector (ppm)					
			EASTING	NORTHING	GROUND LEVEL				
			409309.00	334631.00	80.66				
			LOGGED BY	SCALE	SHEET				
			RTR	1:50	Sheet 1 of 1				
									
						Environmental Division 3-4 Kayes Walk The Lace Market Nottingham NG1 1PY Tel : 0115 9241100 Fax : 0115 9503966			

Project Title The Dove Way, Uttoxeter **Hole Ref.** TP121

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used JCB 3CX **Start Date** 08/07/2010 **End Date** 08/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
		0.30	MADE GROUND: Long grass over brown silty sandy TOPSOIL	80.64					
		0.50	MADE GROUND: Soft medium brown slightly sandy gravelly CLAY. Gravel is coarse sub-rounded to sub-angular brick and quartz.	80.44		DJV	0.90		
		1.06		79.88		DJV	1.10		
		2.20	MADE GROUND: Dark brown with occasional orange and black organic gravelly sandy CLAY. Contains landfill including plastic bags, various plastics, wire, syringes and general rubble. (Landfill Material)	78.74		DJV	1.50		
		2.30		78.64					2.30
		3.10	MADE GROUND: Black organic sandy gravelly CLAY. Gravel is fine to medium and sub-angular quartz. Contains plastics, glass and industrial waste. Hydrocarbon odour noted. (Landfill Material)	77.84					
									2.50
			Firm brown dappled orange slightly gravelly sandy CLAY. Gravel is fine sub-rounded to sub-angular organic material (coal) and quartz. (Alluvium)						
			Soft light brown and grey sandy CLAY. Sand is grey and occurs in pockets. (Alluvium)						
			Concrete obstruction encountered						
			End of hole at 2.50 m						






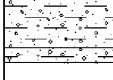

REMARKS

1. No significant groundwater strike though sand and gravel strata noted to be damp.
2. Hydrocarbon odours noted between 1.0m bgl and 2.2m bgl
3. Hole backfilled with arisings on completion.
4. Granular strata very unstable.
5. Hole terminated to hole instability.
6. Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE D - 500g to 1kg Disturbed B - 5kg to 20kg Disturbed U - 100mm dia. Undisturbed J - 250ml Amber Glass Jar V - Glass Vial		IN-SITU TESTS SV - Hand Shear Vane HP - Hand Penetrometer N = SPT blows over 300mm S = Split Spoon Sampler C = Solid Cone PID - Photo Ionisation Detector (ppm)		GROUNDWATER ∇ Groundwater strike ▼ Standing groundwater level	
EASTING 409330.00	NORTHING 334604.00	GROUND LEVEL 80.94			
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1			



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Project Title					The Dove Way, Uttoxeter		Hole Ref.		TP122	
Client					Clowes Securities & ESBC		Project No.		NTE285	
Plant used					JCB 3CX		Start Date		End Date	
							07/07/2010		07/07/2010	
Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing		
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result	
		0.10	MADE GROUND: Long grass over brown silty sandy TOPSOIL.	80.55						
		0.60	MADE GROUND: Soft medium brown slightly sandy slightly cobbly CLAY with brick, glass and plastics. Cobbles are sub-rounded to sub-angular quartz and brick. (Landfill Material)	80.05						
			MADE GROUND: Soft brown black organic sandy gravelly CLAY with glass bottles, wire, plastics, paper, general industrial waste. Hydrocarbon odour noted. (Landfill Material)			DJV	1.50			
		2.40	Firm grey light brown slightly sandy slightly gravelly CLAY. Gravel is fine to medium angular coal fragments. (Alluvium)	78.25						
		2.90		77.75						
		3.00	Brown and orange clayey SAND and GRAVEL. Gravel is medium to coarse sub rounded quartz. (Fluvioglacial Deposits)	77.65		DB	3.00			
			End of hole at 3.00 m							
REMARKS			SOIL SAMPLE TYPE			IN-SITU TESTS			GROUNDWATER	
<ol style="list-style-type: none"> No significant groundwater strike though sand and gravel strata noted to be damp. Hydrocarbon odours noted between 1.4m bgl and 2.9m bgl. Hole backfilled with arisings on completion. Granular strata very unstable. Hole terminated to hole instability. Hole position and elevation determined from the site topographical survey plan. 			D - 500g to 1kg Disturbed B - 5kg to 20kg Disturbed U - 100mm dia. Undisturbed J - 250ml Amber Glass Jar V - Glass Vial			SV - Hand Shear Vane HP - Hand Penetrometer N = SPT blows over 300mm S = Split Spoon Sampler C = Solid Cone PID - Photo Ionisation Detector (ppm)			∇ Groundwater strike ▼ Standing groundwater level	
			EASTING		NORTHING		GROUND LEVEL			
			409273.00		334597.00		80.65			
			LOGGED BY		SCALE		SHEET			
			AM		1:50		Sheet 1 of 1			
										
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Project Title The Dove Way, Uttoxeter **Hole Ref.** TP123

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used JCB 3CX **Start Date** 07/07/2010 **End Date** 07/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
		0.20	MADE GROUND: Vegetation over dark brown silty gravelly sandy TOPSOIL. Gravel is fine to medium angular brick. Contains roots.	79.90		DJV	0.30		
		0.40		79.70					
		0.90	MADE GROUND: Soft orange brown slightly sandy gravelly CLAY. Gravel is medium sub-rounded quartz.	79.20		DJV	2.00		
		1.50	MADE GROUND: Soft dark brown and orange sandy gravelly CLAY containing some landfill material	78.60					
		1.90	MADE GROUND: Soft black sandy gravelly CLAY with high landfill content, includes clothes, plastics, plywood, bags, wire and paper.	78.20					
		2.20		77.90					
		3.00	MADE GROUND: Firm dark brown sandy CLAY.	77.10					
			Firm light brown slightly sandy slightly gravelly CLAY. Gravel is angular fine coal. (Alluvium)						
			Grey and brown fine to coarse grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. Occasional decomposed wood fragments. (Fluvioglacial Deposits)						
			End of hole at 3.00 m						

REMARKS

- Groundwater noted at approximately 3.0m bgl.
- No visual or olfactory evidence of contamination.
- Hole backfilled with arisings on completion.
- Granular strata very unstable.
- Hole terminated to hole instability.
- Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE D - 500g to 1kg Disturbed B - 5kg to 20kg Disturbed U - 100mm dia. Undisturbed J - 250ml Amber Glass Jar V - Glass Vial		IN-SITU TESTS SV - Hand Shear Vane HP - Hand Penetrometer N = SPT blows over 300mm S = Split Spoon Sampler C = Solid Cone PID - Photo Ionisation Detector (ppm)		GROUNDWATER ∇ Groundwater strike ▼ Standing groundwater level	
EASTING 409316.00	NORTHING 334543.00	GROUND LEVEL 80.10			
LOGGED BY AM	SCALE 1:50	SHEET Sheet 1 of 1			



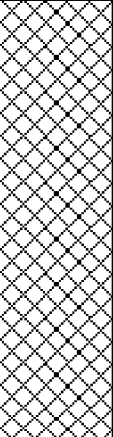

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Project Title The Dove Way, Uttoxeter **Hole Ref.** TP135

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used JCB 3CX **Start Date** 08/07/2010 **End Date** 08/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
			MADE GROUND: Dense vegetation and long grass over dark brown ashy sandy angular to rounded fine to coarse brick, asphalt, concrete, quartz and clinker GRAVEL with roots to 0.5m. Frequent cans, plastics, metal fragments and barbed wire.			DJV	0.90		
		2.90	Soft grey becoming red brown slightly gravelly CLAY. Gravel is rounded fine to coarse quartz. (Fluvioglacial Deposits)	80.30		DJV	3.10		
		3.50	<i>End of hole at 3.50 m</i>	79.70					

REMARKS

1. No groundwater encountered.
2. No visual or olfactory evidence of contamination.
3. Hole backfilled with arisings on completion.
4. Granular strata very unstable.
5. Hole terminated to hole instability.
6. Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE
 D - 500g to 1kg Disturbed
 B - 5kg to 20kg Disturbed
 U - 100mm dia. Undisturbed
 J - 250ml Amber Glass Jar
 V - Glass Vial

IN-SITU TESTS
 SV - Hand Shear Vane
 HP - Hand Penetrometer
 N = SPT blows over 300mm
 S = Split Spoon Sampler
 C = Solid Cone

PID - Photo Ionisation Detector (ppm)

GROUNDWATER
 ∇ Groundwater strike
 ▼ Standing groundwater level

EASTING 409294.00	NORTHING 334112.00	GROUND LEVEL 83.20
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1

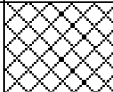
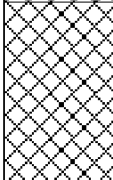
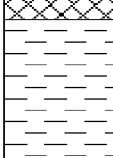
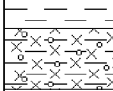



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Project Title The Dove Way, Uttoxeter **Hole Ref.** TP136

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used JCB 3CX **Start Date** 08/07/2010 **End Date** 08/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
		0.60	MADE GROUND: Vegetation over brown sandy angular to rounded fine to coarse limestone, brick and quartz GRAVEL.	81.80		DJV	0.50		
		1.90	MADE GROUND: Brown black sandy angular fine to medium clinker GRAVEL with occasional glass and wood.			DJV	1.00		
		3.00	Soft grey brown CLAY. (Alluvium)	80.50					
		3.40	Orange brown slightly sandy cobblely very gravelly CLAY. Gravel is rounded fine to coarse quartz. (Fluvioglacial Deposits)	79.40					
			End of hole at 3.40 m	79.00					

REMARKS
 1. No groundwater encountered.
 2. No visual or olfactory evidence of contamination.
 3. Hole backfilled with arisings on completion.
 4. Granular strata very unstable.
 5. Hole terminated to hole instability.
 6. Hole position and elevation determined from the site topographical survey plan.

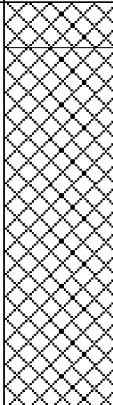
SOIL SAMPLE TYPE D - 500g to 1kg Disturbed B - 5kg to 20kg Disturbed U - 100mm dia. Undisturbed J - 250ml Amber Glass Jar V - Glass Vial	IN-SITU TESTS SV - Hand Shear Vane HP - Hand Penetrometer N = SPT blows over 300mm S = Split Spoon Sampler C = Solid Cone PID - Photo Ionisation Detector (ppm)	GROUNDWATER ∇ Groundwater strike ▼ Standing groundwater level
EASTING 409264.00	NORTHING 334099.00	GROUND LEVEL 82.40
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1

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Project Title The Dove Way, Uttoxeter **Hole Ref.** TP137

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used JCB 3CX **Start Date** 08/07/2010 **End Date** 08/07/2010



Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From To	Depth (m) (SPT Type)	Result
		0.30	MADE GROUND: Grass and vegetation over light grey brown sandy sub angular to angular fine to coarse limestone GRAVEL.	83.20		DJV	0.70		
			MADE GROUND: Brown grey gravelly cobblely fine to coarse grained SAND with ash and clinker in a matrix with occasional very soft blue grey silty clay (blue Billy). Gravel is angular fine to coarse brick, limestone, slag and concrete including large boulder sized slabs. Slight solvent like odour noted.			DJV	2.00		
		2.69	MADE GROUND: Concrete slab.	80.81					
		2.70	End of hole at 2.70 m	80.80					

REMARKS
 1. No groundwater encountered.
 2. Slight solvent odours and blue billy noted throughout.
 3. Hole backfilled with arisings on completion.
 4. Granular strata very unstable.
 5. Hole terminated to hole instability.
 6. Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE
 D - 500g to 1kg Disturbed
 B - 5kg to 20kg Disturbed
 U - 100mm dia. Undisturbed
 J - 250ml Amber Glass Jar
 V - Glass Vial

IN-SITU TESTS
 SV - Hand Shear Vane
 HP - Hand Penetrometer
 N = SPT blows over 300mm
 S = Split Spoon Sampler
 C = Solid Cone

PID - Photo Ionisation Detector (ppm)

GROUNDWATER
 Groundwater strike
 Standing groundwater level

EASTING 409234.00	NORTHING 334114.00	GROUND LEVEL 83.50
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1

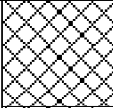
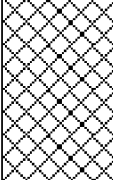
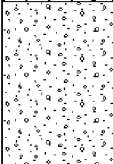


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Project Title The Dove Way, Uttoxeter **Hole Ref.** WS1

Client Clowes Securities & ESBC **Project No.** NTE285



Plant used GeoTool Window Sampler **Start Date** 07/07/2010 **End Date** 07/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From	Depth To	Depth (m) (SPT Type)
		0.70	MADE GROUND: Grass over brown slightly clayey gravelly SAND including fragments of plastic and glass. Gravel is angular to rounded fine to medium brick and quartz.	85.30		DJV	0.10	0.70	
		1.90	MADE GROUND: Firm to stiff brown slightly sandy gravelly CLAY. Gravel is angular to rounded fine to medium coal, sandstone and quartz.	84.10		DJV	1.20	1.60	
		3.00	Grey and brown fine to coarse grained SAND and sub rounded to rounded quartz GRAVEL with occasional cobbles. (Fluvioglacial Deposits)	83.00					
			<i>End of hole at 3.00 m</i>						

REMARKS
 1. No groundwater encountered.
 2. No visual or olfactory evidence of contamination.
 3. Hole backfilled with arisings on completion.
 4. Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE
 D - 500g to 1kg Disturbed
 B - 5kg to 20kg Disturbed
 U - 100mm dia. Undisturbed
 J - 250ml Amber Glass Jar
 V - Glass Vial

IN-SITU TESTS
 SV - Hand Shear Vane
 HP - Hand Penetrometer
 N = SPT blows over 300mm
 S = Split Spoon Sampler
 C = Solid Cone
 PID - Photo Ionisation Detector (ppm)

GROUNDWATER
 Groundwater strike
 Standing groundwater level

EASTING 409202.00	NORTHING 334174.00	GROUND LEVEL 86.00
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1

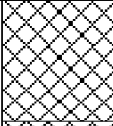
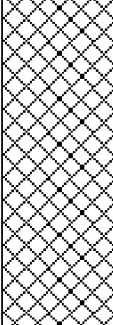


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Project Title The Dove Way, Uttoxeter **Hole Ref.** WS2

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used GeoTool Window Sampler **Start Date** 07/07/2010 **End Date** 07/07/2010



Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From	Depth To	Depth (m) (SPT Type)
		0.80	MADE GROUND: Grass over brown slightly clayey gravelly SAND including fragments of glass. Gravel is angular to rounded fine to medium brick, concrete and quartz.	85.20		DJV	0.10	0.80	
			MADE GROUND: Firm locally soft brown slightly sandy gravelly CLAY. Gravel is angular to rounded fine to coarse brick and quartz. No recovery			DJV	1.10	1.50	
		3.00	End of hole at 3.00 m		83.00				

REMARKS
 1. No groundwater encountered.
 2. No visual or olfactory evidence of contamination.
 3. Hole backfilled with arisings on completion.
 4. Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE
 D - 500g to 1kg Disturbed
 B - 5kg to 20kg Disturbed
 U - 100mm dia. Undisturbed
 J - 250ml Amber Glass Jar
 V - Glass Vial

IN-SITU TESTS
 SV - Hand Shear Vane
 HP - Hand Penetrometer
 N = SPT blows over 300mm
 S = Split Spoon Sampler
 C = Solid Cone

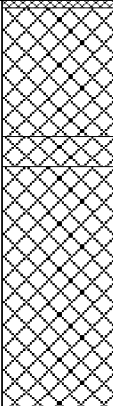
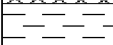

PID - Photo Ionisation Detector (ppm)

GROUNDWATER
 Groundwater strike
 Standing groundwater level

EASTING 409250.00	NORTHING 334180.00	GROUND LEVEL 86.00
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1

BWB CONSULTING


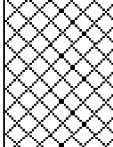
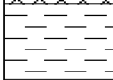
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Project Title					Hole Ref.						
Client					Project No.						
Plant used					Start Date		End Date				
Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing			
Strike	Well					Type	Depth From	Depth To	Depth (m) (SPT Type)	Result	
		0.05	MADE GROUND: Asphalt.	85.95		DJV	0.10	0.90			
		0.90	MADE GROUND: Brown and grey sandy angular fine to coarse concrete and brick GRAVEL.	85.10							
		1.10	MADE GROUND: Dark brown and grey gravelly fine to coarse grained SAND. Gravel is angular to rounded fine to coarse quartz and concrete with asphalt fragments.	84.90			DJV	1.20	2.00		
		2.70	MADE GROUND: Firm brown sandy gravelly CLAY. Gravel is angular to rounded fine to medium brick and quartz.	83.30							
		3.00	Stiff red brown CLAY. (Mercia Mudstone Formation)	83.00							
			<i>End of hole at 3.00 m</i>								
REMARKS			SOIL SAMPLE TYPE			IN-SITU TESTS			GROUNDWATER		
1. No groundwater encountered.			D - 500g to 1kg Disturbed			SV - Hand Shear Vane			☒ Groundwater strike		
2.No visual or olfactory evidence of contamination.			B - 5kg to 20kg Disturbed			HP - Hand Penetrometer			☑ Standing groundwater level		
3.Hole backfilled with arisings on completion.			U - 100mm dia. Undisturbed			N = SPT blows over 300mm					
4.Hole position and elevation determined from the site topographical survey plan.			J - 250ml Amber Glass Jar			S = Split Spoon Sampler					
			V - Glass Vial			C = Solid Cone					
			PID - Photo Ionisation Detector (ppm)								
			EASTING		NORTHING		GROUND LEVEL				
			409226.00		334151.00		86.00				
			LOGGED BY		SCALE		SHEET				
			RTR		1:50		Sheet 1 of 1				
											
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Project Title The Dove Way, Uttoxeter **Hole Ref.** WS4

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used GeoTool Window Sampler **Start Date** 07/07/2010 **End Date** 07/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From	To	Depth (m) (SPT Type)
		0.50	MADE GROUND: Short grass and moss over dark brown sandy angular to rounded fine to coarse concrete, limestone and clinker GRAVEL with ash.	84.50		DJV	0.10	0.50	
		1.50	MADE GROUND: Soft to firm brown sandy gravelly CLAY. Gravel is angular to rounded fine to coarse slag and quartz. Slight hydrocarbon odour noted.	83.50		DJV	1.00	1.50	
		2.00	Soft to firm red brown CLAY. (Mercia Mudstone Formation)	83.00					
			End of hole at 2.00 m						

REMARKS
 1. No groundwater encountered.
 2. Slight hydrocarbon odour noted between 0.5m bgl and 1.5m bgl.
 3. Hole backfilled with arisings on completion.
 4. Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE
 D - 500g to 1kg Disturbed
 B - 5kg to 20kg Disturbed
 U - 100mm dia. Undisturbed
 J - 250ml Amber Glass Jar
 V - Glass Vial

IN-SITU TESTS
 SV - Hand Shear Vane
 HP - Hand Penetrometer
 N = SPT blows over 300mm
 S = Split Spoon Sampler
 C = Solid Cone

GROUNDWATER
 ∇ Groundwater strike
 ▼ Standing groundwater level

PID - Photo Ionisation Detector (ppm)



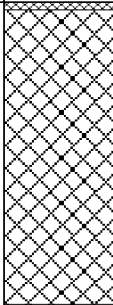
EASTING 409199.00	NORTHING 334064.00	GROUND LEVEL 85.00
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1

Environmental Division
 3-4 Kayes Walk
 The Lace Market
 Nottingham
 NG1 1PY
 Tel : 0115 9241100
 Fax : 0115 9503966

Project Title The Dove Way, Uttoxeter **Hole Ref.** WS5

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used GeoTool Window Sampler **Start Date** 07/07/2010 **End Date** 07/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing		
Strike	Well					Type	Depth From	To	Depth (m) (SPT Type)	Result
		0.05	MADE GROUND: Asphalt.	84.45		DJV	0.10	1.00		
		2.00	MADE GROUND: Dark brown clayey sandy angular to rounded fine to coarse brick, slag and quartz	82.50						
			End of hole at 2.00 m							

REMARKS
 1. No groundwater encountered.
 2. No visual or olfactory evidence of contamination.
 3. Hole backfilled with arisings on completion.
 4. Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE
 D - 500g to 1kg Disturbed
 B - 5kg to 20kg Disturbed
 U - 100mm dia. Undisturbed
 J - 250ml Amber Glass Jar
 V - Glass Vial

IN-SITU TESTS
 SV - Hand Shear Vane
 HP - Hand Penetrometer
 N = SPT blows over 300mm
 S = Split Spoon Sampler
 C = Solid Cone

GROUNDWATER
 ∇ Groundwater strike
 ▼ Standing groundwater level

PID - Photo Ionisation Detector (ppm)

EASTING 409223.00	NORTHING 334095.00	GROUND LEVEL 84.50
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1

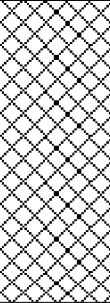


Environmental Division
 3-4 Kayes Walk
 The Lace Market
 Nottingham
 NG1 1PY
 Tel : 0115 9241100
 Fax : 0115 9503966

Project Title The Dove Way, Uttoxeter **Hole Ref.** WS6

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used GeoTool Window Sampler **Start Date** 07/07/2010 **End Date** 07/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From	Depth To	Depth (m) (SPT Type)
			MADE GROUND: Short grass and moss over dark brown and dark grey sandy angular to rounded fine to coarse quartz, brick, slag and clinker GRAVEL with ash.			DJV	0.30	1.00	
		2.00	End of hole at 2.00 m	81.50					

REMARKS
 1. No groundwater encountered.
 2. No visual or olfactory evidence of contamination.
 3. Hole backfilled with arisings on completion.
 4. Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE
 D - 500g to 1kg Disturbed
 B - 5kg to 20kg Disturbed
 U - 100mm dia. Undisturbed
 J - 250ml Amber Glass Jar
 V - Glass Vial

IN-SITU TESTS
 SV - Hand Shear Vane
 HP - Hand Penetrometer
 N = SPT blows over 300mm
 S = Split Spoon Sampler
 C = Solid Cone

PID - Photo Ionisation Detector (ppm)

GROUNDWATER
 ∇ Groundwater strike
 ▼ Standing groundwater level

EASTING 409262.00	NORTHING 334088.00	GROUND LEVEL 83.50
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1

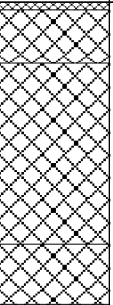


Environmental Division
 3-4 Kayes Walk
 The Lace Market
 Nottingham
 NG1 1PY
 Tel : 0115 9241100
 Fax : 0115 9503966

Project Title The Dove Way, Uttoxeter **Hole Ref.** WS7

Client Clowes Securities & ESBC **Project No.** NTE285

Plant used GeoTool Window Sampler **Start Date** 07/07/2010 **End Date** 07/07/2010

Groundwater		Depth (m)	Description of Strata	Level (mAOD)	Legend	Samples		In-situ Testing	
Strike	Well					Type	Depth From	Depth To	Depth (m) (SPT Type)
		0.05	MADE GROUND: Asphalt.	84.85		DJV	1.60	2.00	
		0.40	MADE GROUND: BROWN sandy angular to sub angular fine to coarse granite and concrete GRAVEL.	84.50					
			MADE GROUND: Red brown sandy angular fine to coarse brick GRAVEL.						
		1.60	MADE GROUND: Brown clayey angular fine to coarse quartz GRAVEL.	83.30					
		2.00	End of hole at 2.00 m	82.90					

REMARKS
 1. No groundwater encountered.
 2. No visual or olfactory evidence of contamination.
 3. Hole backfilled with arisings on completion.
 4. Hole position and elevation determined from the site topographical survey plan.

SOIL SAMPLE TYPE D - 500g to 1kg Disturbed B - 5kg to 20kg Disturbed U - 100mm dia. Undisturbed J - 250ml Amber Glass Jar V - Glass Vial	IN-SITU TESTS SV - Hand Shear Vane HP - Hand Penetrometer N = SPT blows over 300mm S = Split Spoon Sampler C = Solid Cone PID - Photo Ionisation Detector (ppm)	GROUNDWATER ∇ Groundwater strike ▼ Standing groundwater level
EASTING 409234.00	NORTHING 334114.00	GROUND LEVEL 84.90
LOGGED BY RTR	SCALE 1:50	SHEET Sheet 1 of 1

BWB CONSULTING

Environmental Division
 3-4 Kayes Walk
 The Lace Market
 Nottingham
 NG1 1PY
 Tel : 0115 9241100
 Fax : 0115 9503966

APPENDIX 3
DRILLERS LOGS

Standpipe Installation

site

UTTOXETER

date

7/7/10

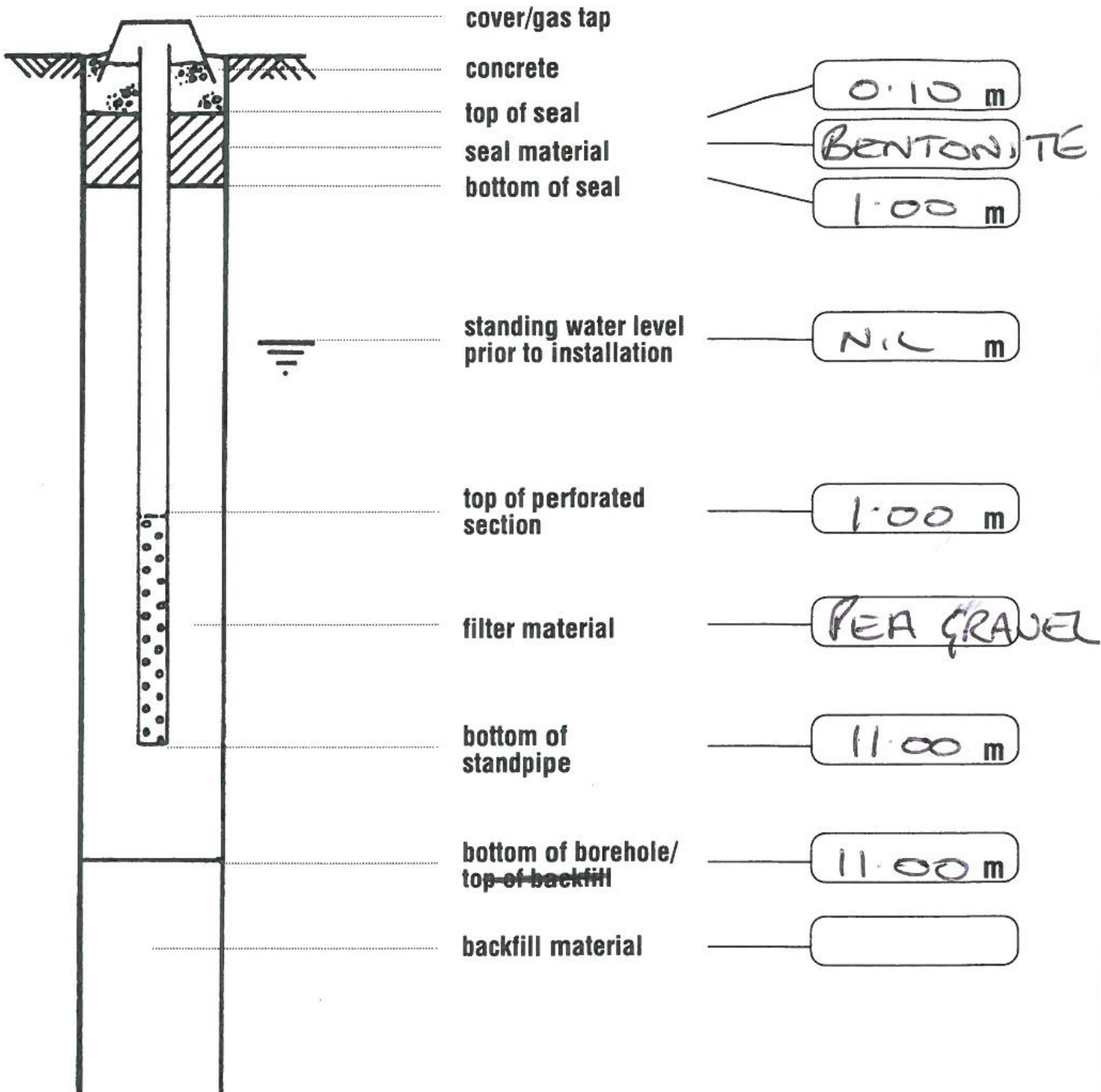
driller

A. CLARK

job no.

borehole

1



comments

Standpipe Installation

site

UTTOMETER

date

7/7/10

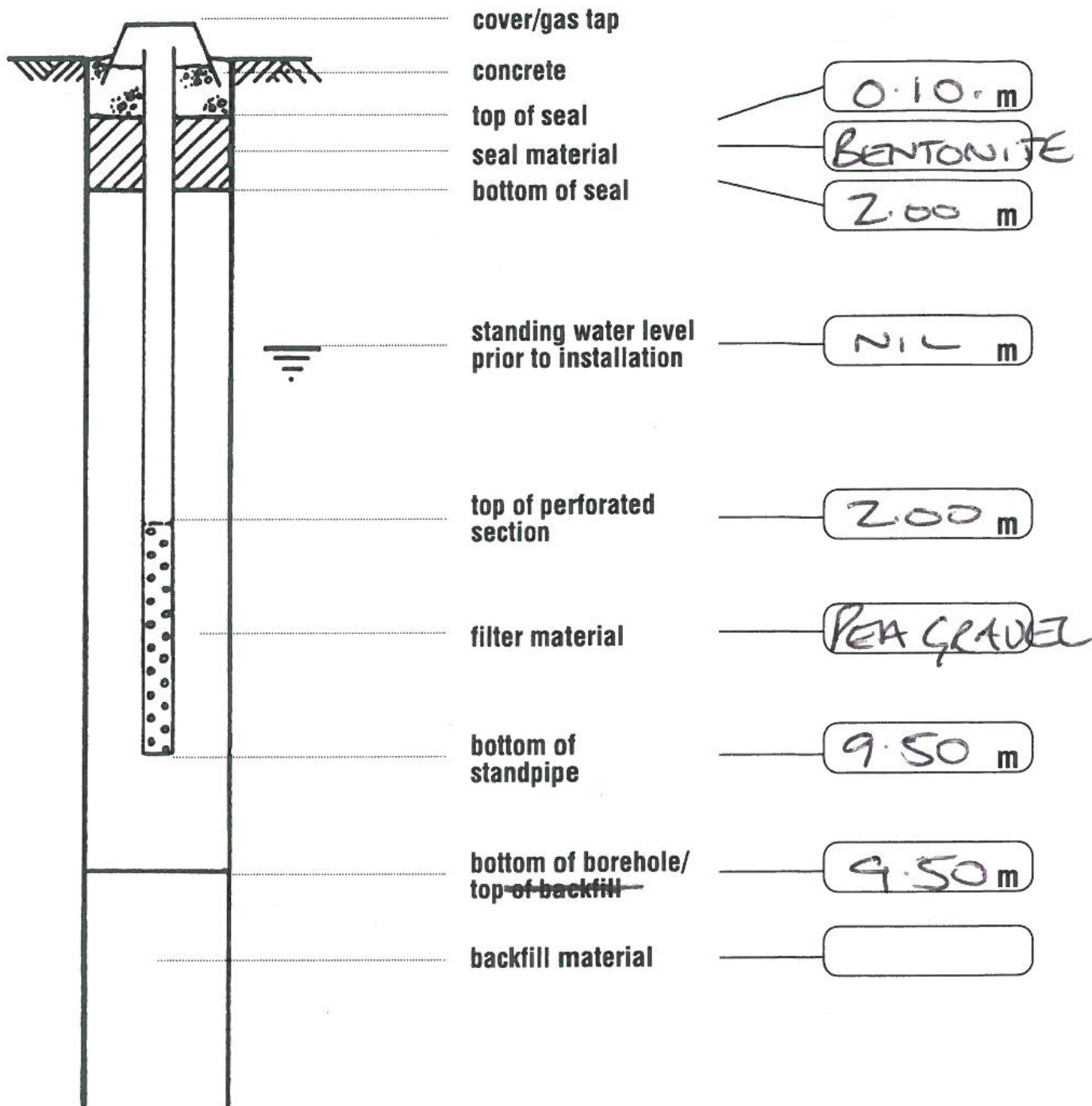
driller

A. CLARK.

job no.

borehole

2



comments

Standpipe Installation

site

UTTOXETER

date

8/7/10

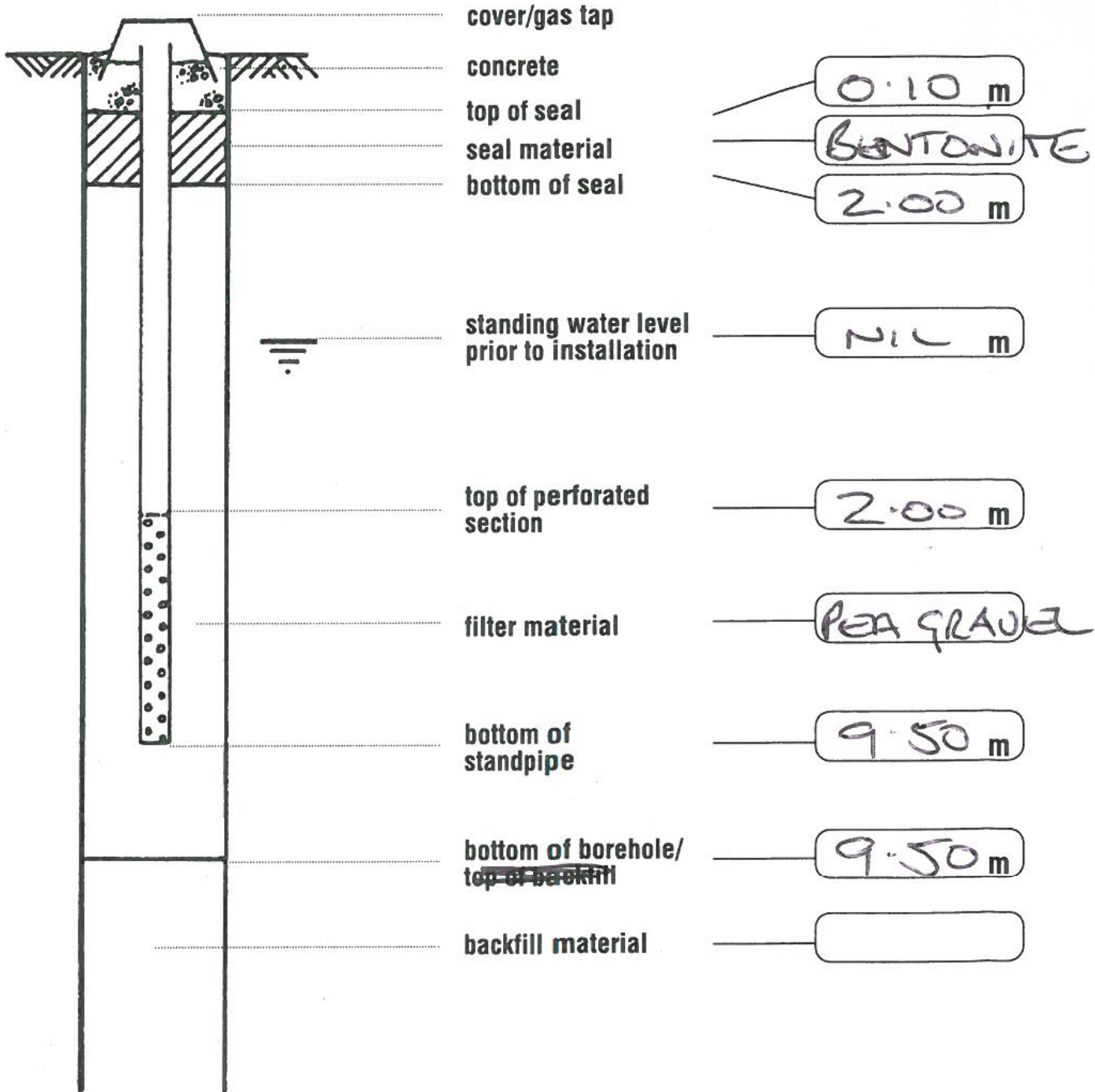
driller

A. CARL

job no.

borehole

3



comments

date	site	job no	borehole
06/07/2010	UTTOXETER		1

from	to	consistency or density/colour/type
G/L	0.50	Topsoil
0.50	1.80	Ash pottery stone soil fill
1.80	2.00	Mottled grey alluvium with occasional gravel
2.00	5.00	Sand and gravel with occasional large cobbles

disturbed samples				undisturbed samples				penetration tests									
no.	depth.	no.	depth.	no.	depth.	casing depth	length	blows	no.	depth.	casing depth	water level	150 seating	75	75	75	75
D1	0.50	D16		U1					C1	1.0	Nil	Nil	1	0	1	1	0
D2	1.80	D17		U2					C2	2.0	2.0	Nil	4	6	7	4	4
D3	3.00	D18		U3					C3	3.0	3.0	2.1	7	5	6	5	7
D4		D19		U4					C4	4.0	4.0	3.8	8	4	6	8	8
D5		D20		U5					C5								
D6		D21		U6					S6								
D7		D22		U7					S7								
D8		D23		U8					S8								
D9		D24		U9					S9								
D10		D25		U10					S10								
D11		D26		U11					S11								
D12		D27		U12					S12								
D13		D28		U13					S13								
D14		D29		U14					S/C 14								
D15		D30		U15					S/C 15								

bulk samples					
no.	from	to	no.	from	to
B1	0.5	1.0	B11		
B2	4.0	4.5	B12		
B3			B13		
B4			B14		
B5			B15		
B6			B16		
B7			B17		
B8			B18		
B9			B19		
B10			B20		

ground water			
depth struck			
casing depth			
inflow rate			
rose to 5 min.			
rose to 10 min.			
rose to 15 min.			
sealed out at			
sample no.		w	w
sample depth			
water level at start of boring			NIL
water level at finish of boring			4.2
water level when casing removed			

water added			
from	2.0		
to	5.0		
litres	150		

		pit	chisel
depth	from		
	to		
time	hours		

borehole complete?	No	
depth of borehole cased	5.00	
standpipe depth		
gastap - cover		

Remarks

Driller
Andy Clark

date	site	job no	borehole
07/07/2010	UTTOXETER		1

from	to	consistency or density/colour/type
5.00	6.90	Sand and gravel with occasional large cobbles
6.90	7.80	Mixture of gravel and mercia mudstone
7.80	10.40	Sand and gravel with occasional large cobbles
10.40	11.00	Mercia mudstone

disturbed samples				undisturbed samples				penetration tests									
no.	depth.	no.	depth.	no.	depth.	casing depth	length	blows	no.	depth.	casing depth	water level	150 seating	75	75	75	75
D1		D16		U1					S1								
D2		D17		U2					C2								
D3		D18		U3					C3								
D4		D19		U4					C4								
D5		D20		U5					C5	5.0	5.0	4.6	11	9	9	5	5
D6		D21		U6					C6	6.5	6.5	5.9	9	10	5	4	5
D7		D22		U7					C7	8.0	8.0	4.8	5	3	5	4	3
D8		D23		U8					C8	9.5	9.5	4.9	8	6	7	7	9
D9		D24		U9					S9	11.0	10.5	Nil	19	18	21	11/20m	
D10		D25		U10					S10								
D11		D26		U11					S11								
D12		D27		U12					S12								
D13		D28		U13					S13								
D14		D29		U14					S/C 14								
D15		D30		U15					S/C 15								

bulk samples					
no.	from	to	no.	from	to
B1			B11		
B2			B12		
B3	6.9	7.4	B13		
B4			B14		
B5			B15		
B6			B16		
B7			B17		
B8			B18		
B9			B19		
B10			B20		

ground water			
depth struck	7.8		
casing depth	7.8		
inflow rate	Med		
rose to 5 min.			
rose to 10 min.			
rose to 15 min.	4.6		
sealed out at	10.4		
sample no.		w	w
sample depth			
water level at start of boring		4.6	
water level at finish of boring		Nil	
water level when casing removed			

water added			
from	5.0		
to	7.8		
litres	150		

		pit	chisel
depth	from		
	to		
time	hours		

borehole complete?	Yes	
depth of borehole cased	10.50	
standpipe depth	11.0	
gastap - cover		

Remarks

Driller
Andy Clark

date	site	job no	borehole
07/07/2010	UTTOXETER		2

from	to	consistency or density/colour/type
G/L	0.60	Topsoil
0.60	1.80	Ash soil pottery metal glass fill
1.80	2.20	Mottled brown alluvium
2.20	2.40	Clayey gravel
2.40	8.90	Sand and gravel with occasional large cobbles
8.90	9.50	Mercia mudstone

disturbed samples				undisturbed samples				penetration tests									
no.	depth.	no.	depth.	no.	depth.	casing depth	length	blows	no.	depth.	casing depth	water level	150 seating	75	75	75	75
D1	1.00	D16		U1					C1	1.0	Nil	Nil	1	0	0	1	0
D2	1.80	D17		U2					S2	2.0	1.5	Nil	2	1	3	4	4
D3	8.90	D18		U3					C3	3.0	3.0	2.7	15	10	9	10	11
D4		D19		U4					C4	4.0	4.0	3.4	8	6	7	6	5
D5		D20		U5					C5	5.0	5.0	4.1	5	3	4	4	4
D6		D21		U6					C6	6.5	6.5	4.3	6	3	3	4	3
D7		D22		U7					C7	8.0	8.0	4.3	18	11	12	12	11
D8		D23		U8					S8	9.5	9.0	Nil	17	12	13	15	13/30m
D9		D24		U9					S9								
D10		D25		U10					S10								
D11		D26		U11					S11								
D12		D27		U12					S12								
D13		D28		U13					S13								
D14		D29		U14					S/C 14								
D15		D30		U15					S/C 15								

bulk samples					
no.	from	to	no.	from	to
B1	3.0	3.5	B11		
B2	6.5	7.0	B12		
B3	9.0	9.5	B13		
B4			B14		
B5			B15		
B6			B16		
B7			B17		
B8			B18		
B9			B19		
B10			B20		

ground water			
depth struck	4.5		
casing depth	4.5		
inflow rate	Slow		
rose to 5 min.			
rose to 10 min.			
rose to 15 min.			
sealed out at	8.9		
sample no.		w	w
sample depth			
water level at start of boring			Nil
water level at finish of boring			Nil
water level when casing removed			

water added			
from	2.4		
to	4.5		
litres	150		

		pit		chisel	
depth	from				
	to				
time	hours				

borehole complete?	Yes	
depth of borehole cased	9.50	
standpipe depth	9.5	
gastap - cover		

Remarks

Driller
Andy Clark

date	site	job no	borehole
08/07/2010	UTTOXETER		3

from	to	consistency or density/colour/type
G/L	0.10	Topsoil
0.10	0.40	Made ground
0.40	0.55	Concrete slab
0.55	2.60	Bottles ash soil metal fill
2.60	3.40	Mottled brown silty sandy clay
3.40	8.40	Sand and gravel with occasional large cobbles
8.40	9.50	Mercia mudstone

disturbed samples				undisturbed samples				penetration tests									
no.	depth.	no.	depth.	no.	depth.	casing depth	length	blows	no.	depth.	casing depth	water level	150 seating	75	75	75	75
D1	0.60	D16		U1					C1	1.0	1.0	Nil	1	0	1	1	1
D2	2.60	D17		U2					C2	2.0	1.5	Nil	1	1	0	0	1
D3	8.40	D18		U3					S3	3.0	3.0	Nil	4	2	3	3	3
D4		D19		U4					C4	4.0	4.0	Nil	4	3	3	3	4
D5		D20		U5					C5	5.0	5.0	Nil	5	3	4	3	5
D6		D21		U6					C6	6.5	6.5	5.4	8	7	7	6	6
D7		D22		U7					C7	8.0	8.0	5.7	10	9	7	7	8
D8		D23		U8					S8	9.5	8.8	Nil	18	15	18	17/30m	
D9		D24		U9					S9								
D10		D25		U10					S10								
D11		D26		U11					S11								
D12		D27		U12					S12								
D13		D28		U13					S13								
D14		D29		U14					S/C 14								
D15		D30		U15					S/C 15								

bulk samples					
no.	from	to	no.	from	to
B1	2.0	2.5	B11		
B2	4.0	4.5	B12		
B3	6.5	7.0	B13		
B4			B14		
B5			B15		
B6			B16		
B7			B17		
B8			B18		
B9			B19		
B10			B20		

ground water			
depth struck	5.6		
casing depth	4.5		
inflow rate	Slow		
rose to 5 min.			
rose to 10 min.			
rose to 15 min.	5.1		
sealed out at	8.4		
sample no.		w	w
sample depth			
water level at start of boring			Nil
water level at finish of boring			Nil
water level when casing removed			

water added			
from			
to			
litres			

		pit	chisel
depth	from		
	to		
time	hours		

borehole complete?	Yes	
depth of borehole cased	8.80	
standpipe depth	9.5	
gastap - cover		

Remarks

0.5hrs daywork while JCB digs out concrete slab.

Driller

Andy Clark

from	to	consistency or density/colour/type
GL	1.70	HARD MADE GROUND BRICK FILL
1.70	4.50	DENSE SAND AND GRAVEL
4.50	6.20	REDDY BROWN MARK MUDSTONE
6.20	7.20	COBBLY GRAVEL
7.20	9.00	REDDY BROWN MARK MUDSTONE

1.00m PLAIN PIPE
BENTONITE SURROUND
7.50m SLOTTED
PIPE GRAVEL
SURROUND

Daily Site Report (1)

disturbed samples				undisturbed samples				penetration tests									
no.	depth	no.	depth	no.	depth	casing depth	length	blows	type/no	depth	casing depth	water level	150 seating	75	75	75	75
D 1	0.50	D 16		U 1					S/C 1	1.00	1.00	DRY	12/12	10	11	12	13
D 2	1.80	D 17		U 2					S/C 2	2.00	2.90	DRY	8/5	5	7	7	6
D 3	4.60	D 18		U 3					S/C 3	3.00	3.00	DRY	6/6	7	6	6	6
D 4		D 19		U 4					S/C 4	4.00	3.90	DRY	8/7	7	8	8	7
D 5		D 20		U 5					S/C 5	5.00	4.90	DRY	6/5	6	6	8	6
D 6		D 21		U 6					S/C 6	6.20	6.20	DRY	5/7	8	7	7	7
D 7		D 22		U 7					S/C 7	7.20	7.20	DRY	25 for 120m	14	16	14	5 for 30m
D 8		D 23		U 8					S/C 8	9.00	8.50	DRY	25 for 100m	32	18	for	30m
D 9		D 24		U 9					S/C 9								
D 10		D 25		U 10					S/C 10								
D 11		D 26		U 11					S/C 11								
D 12		D 27		U 12					S/C 12								
D 13		D 28		U 13					S/C 13								
D 14		D 29		U 14					S/C 14								
D 15		D 30		U 15					S/C 15								

bulk samples					
no.	from	to	no.	from	to
B 1	0.20	0.70	B 11		
B 2	2.00	2.50	B 12		
B 3	4.50	5.00	B 13		
B 4	8.00	8.50	B 14		
B 5			B 15		
B 6			B 16		
B 7			B 17		
B 8			B 18		
B 9			B 19		
B 10			B 20		

ground water			
depth struck	6.20		
casing depth			
inflow rate	FAST		
rose to 5 min.			
rose to 10 min.			
rose to 15 min.	4.00		
sealed out at			
sample no.	W	W	W
sample depth			
water level at start of boring		DRY	
water level at finish of boring		DRY	
water level when casing removed		—	

water added			
from			
to			
litres			

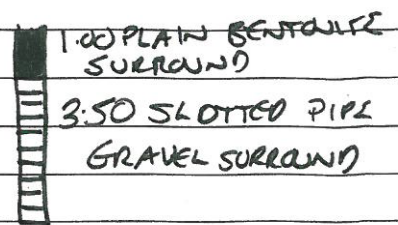
chisel or pits			
depth	from		
	to		
time	from		
	to		
	hours		

borehole complete?	Yes	No
depth of borehole cased	8.50	
standpipe depth	8.50	
piezotip	gastap	cover

remarks

driller
J. HORNBY

from	to	consistency or density/colour/type
GL	0.30	TYPE 1 ROAD STONE
0.30	0.50	MADE GROUND BRICK FILL
0.50	2.20	ALLUVIUM FILL
2.20	3.30	GRAVELLY SANDY CLAY
3.30	5.50	REDDY BROWN MERICAN MUDSTONE



disturbed samples				undisturbed samples				penetration tests									
no.	depth	no.	depth	no.	depth	casing depth	length	blows	type/no	depth	casing depth	water level	150 seating	75	75	75	75
D 1	0.50	D 16		U 1					S/C 1	1.00	1.00	DRY	1-	-	-	1	-
D 2	2.50	D 17		U 2					S/C 2	2.00	1.90	DRY	1-	2	3	3	2
D 3	4.50	D 18		U 3					S/C 3	3.00	3.00	DRY	2/2	3	3	4	6
D 4		D 19		U 4					S/C 4	3.50	3.50	1.80	7/8	7	7	6	7
D 5		D 20		U 5					S/C 5	4.50	4.50	2.50	10/10	13	13	12	12 For 5m
D 6		D 21		U 6					S/C 6	5.50	4.50	2.80	2.5 for 6m	17	14	14	5 For 5m
D 7		D 22		U 7					S/C 7								
D 8		D 23		U 8					S/C 8								
D 9		D 24		U 9					S/C 9								
D 10		D 25		U 10					S/C 10								
D 11		D 26		U 11					S/C 11								
D 12		D 27		U 12					S/C 12								
D 13		D 28		U 13					S/C 13								
D 14		D 29		U 14					S/C 14								
D 15		D 30		U 15					S/C 15								

Daily Site Report (1)

no.	from	to	no.	from	to
B 1	0.50	1.00	B 11		
B 2	2.50	3.00	B 12		
B 3	5.00	5.50	B 13		
B 4			B 14		
B 5			B 15		
B 6			B 16		
B 7			B 17		
B 8			B 18		
B 9			B 19		
B 10			B 20		

ground water			
depth struck	3.30		
casing depth	3.00		
inflow rate	MED		
rose to 5 min.			
rose to 10 min.			
rose to 15 min.	1.80		
sealed out at			
sample no.	W	W	
sample depth			
water level at start of boring	DRY		
water level at finish of boring	2.80		
water level when casing removed	-		

water added			
from			
to			
litres			

chisel or pits			
depth	from		
	to		
time	from		
	to		
hours			

remarks

driller
J. HORNER

borehole complete?	Yes	No
depth of borehole cased	4.50	
standpipe depth	4.50	
piezotip	gastar	cover

APPENDIX 4
GAS AND GROUNDWATER MONITORING RESULTS

APPENDIX 5
SOIL CHEMICAL LABORATORY TESTING



BWB Consulting
3-4 Kayes Walk
The Lace Market
Nottingham
Nottinghamshire
NG1 1PY

Attention: Richard Robinson

CERTIFICATE OF ANALYSIS

Date: 21 July 2010
Customer: H_BWB_NTT-84
Sample Delivery Group (SDG): 100712-18
Your Reference:
Location: THE DOVE WAY-NTE285
Report No.: 91087

We received 34 samples on Monday July 12, 2010 and 25 of these samples were scheduled for analysis which was completed on Wednesday July 21, 2010. Accredited laboratory tests are defined within the report, but opinions, interpretations and on-site data expressed herein are outside the scope of ISO 17025 accreditation.

Should this report require incorporation into client reports, it must be used in its entirety and not simply with the data sections alone.

All chemical testing (unless subcontracted) is performed at ALcontrol Hawarden Laboratories.

Asbestos testing - we are not accredited for screening soil samples for asbestos fibres. We are only accredited to identify asbestos fibres in bulk material (ACM).

Approved By:

Iain Swinton

Operations Director - Land UK & Ireland



SDG:	100712-18	Customer:	BWB Consulting
Job:	H_BWB_NTT-84	Attention:	Richard Robinson
Client Reference:		Order No.:	NE09/616
Location:	THE DOVE WAY-NTE285	Report No:	91087

Received Sample Overview

Lab Sample No(s)	Customer Sample Ref.	Depth (m)	Sampled Date
1804927	TP109	2.50	08/07/2010
1805000	TP114	0.50	08/07/2010
1805066	TP116	3.00	08/07/2010
1805082	TP117	0.50	08/07/2010
1805100	TP117	1.80	08/07/2010
1805350	TP119	0.50	08/07/2010
1805365	TP119	3.20	08/07/2010
1805387	TP120	0.80	08/07/2010
1805433	TP120	3.00	08/07/2010
1805459	TP121	0.90	07/07/2010
1805546	TP123	2.00	07/07/2010
1805575	TP134	0.30	08/07/2010
1805596	TP135	0.90	08/07/2010
1805613	TP135	3.10	08/07/2010
1805646	TP136	0.50	08/07/2010
1805675	TP136	1.00	08/07/2010
1805701	TP137	0.70	08/07/2010
1805736	TP137	2.00	08/07/2010
1805932	WS3	0.10 - 0.90	07/07/2010
1806100	WS3	1.20 - 2.00	07/07/2010
1806152	WS4	0.10 - 0.50	07/07/2010
1806221	WS4	1.00 - 1.50	07/07/2010
1806285	WS5	0.10 - 1.00	07/07/2010
1806335	WS7	1.60 - 2.00	07/07/2010

Only received samples which have had analysis scheduled will be shown on the following pages.

SDG: 100712-18
Job: H_BWB_NTT-84
Client Reference:
Location: THE DOVE WAY-NTE285

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91087

SOLID

Results Legend	Lab Sample No(s)	Customer Sample Ref.	Depth (m)	Container
X Test	1805932	W53	0.10 - 0.90	250g Amber Jar
N No Determination Possible	1805736	TP137	2.00	11g TUB
	1805701	TP137	0.70	250g Amber Jar
	1805675	TP136	1.00	40g Tub
	1805646	TP136	0.50	250g Amber Jar
	1805613	TP135	3.10	40g Tub
	1805596	TP135	0.90	250g Amber Jar
	1805575	TP134	0.30	40g Tub
	1805546	TP123	2.00	250g Amber Jar
	1805459	TP121	0.90	40g Tub
	1805433	TP120	3.00	250g Amber Jar
	1805387	TP120	0.90	11g TUB
	1805365	TP119	3.20	250g Amber Jar
	1805350	TP119	0.50	89g VOC
	1805100	TP117	1.90	40g Tub
	1805082	TP117	0.50	250g Amber Jar
	1805066	TP116	3.00	40g Tub
	1805000	TP114	0.50	250g Amber Jar
	1804927	TP109	2.50	11g TUB
				89g VOC
				40g Tub
Anions by Kone (w)	All			
Asbestos Containing Material Screen	All			
Boron Water Soluble	All			
CEN Readings	All			
Cyanide Complex/Free/Total/Thiocyan	All			
Cyanides Complex/Free/Total/Thiocya	Cyanide, Complex			
	Cyanide, Free			
	Cyanide, Total			
Dissolved Metals by ICP-MS	All			
EPH CWG (Aliphatic) GC (S)	All			
EPH CWG (Aromatic) GC (S)	All			
GRO BTEX MTBE GC (S)	All			
Mercury Dissolved	All			
Metals by iCap-OES (Soil)	Arsenic			
	Barium			
	Beryllium			
	Cadmium			
	Chromium			
	Copper			
	Lead			
	Mercury			
	Nickel			
	Selenium			

SDG: 100712-18
Job: H_BWB_NTT-84
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Order No.: NE09/616
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Sample ID	TP	Depth (m)	Container
1805932	WS3	0.10 - 0.90	250g Amber Jar
1805736	TP137	2.00	11g TUB
1805701	TP137	0.70	250g Amber Jar
1805675	TP136	1.00	400g Tub
1805646	TP136	0.50	250g Amber Jar
1805613	TP135	3.10	400g Tub
1805596	TP135	0.90	250g Amber Jar
1805575	TP134	0.30	400g Tub
1805546	TP123	2.00	250g Amber Jar
1805459	TP121	0.90	400g Tub
1805433	TP120	3.00	250g Amber Jar
1805387	TP120	0.80	11g TUB
1805365	TP119	3.20	250g Amber Jar
1805350	TP119	0.50	400g Tub
1805100	TP117	1.80	250g Amber Jar
1805082	TP117	0.50	400g Tub
1805066	TP116	3.00	250g Amber Jar
1805000	TP114	0.50	400g Tub
1804927	TP109	2.50	11g TUB

Metals by iCap-OES (Soil)	Vanadium	Zinc
PAH by GCMS	All	All
pH	All	All
pH Value	All	All
Phenols by HPLC (S)	All	All
Sample description	All	All
Total Organic Carbon	All	All
Total Sulphur	All	All
TPH C6-C40 Value of soil	All	All
TPH CWG GC (S)	All	All
VOC MS (S)	All	All
Water Soluble Sulphate 2:1	All	All

		Total	
1806336	WS7	1.80 - 2.00	
		80g VOC	0
		40g Tub	21
		250g Amber Jar	0
1806302	WS6	0.30 - 1.00	21
		80g VOC	0
		250g Amber Jar	21
		1kg TBH	0
1806286	WS5	0.10 - 1.00	21
		40g Tub	0
		250g Amber Jar	10
		80g VOC	0
1806221	WS4	1.00 - 1.50	21
		40g Tub	0
		250g Amber Jar	25
		80g VOC	0
1806152	WS4	0.10 - 0.50	21
		40g Tub	0
		250g Amber Jar	21
		80g VOC	1
		250g Amber Jar	20
		40g Tub	0
		250g Amber Jar	21
		80g VOC	0
		250g Amber Jar	8
		40g Tub	0
		250g Amber Jar	1
		80g VOC	0
		250g Amber Jar	21

SDG: 100712-18
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Sample Descriptions

Grain Sizes:

<0.063mm very fine,
0.063mm - 0.1mm fine,
0.1mm - 2mm medium,
2mm - 10mm coarse,
>10mm very coarse

Lab Sample No(s)	Customer Sample Ref.	Depth (m)	Colour	Description	Grain size	Inclusions
1804927	TP109	2.50	Dark Brown	Sand	0.1 - 2 mm	Stones
1805000	TP114	0.50	Dark Brown	Silt Loam	0.063 - 0.1 mm	Stones
1805066	TP116	3.00	Light Brown	Sandy Clay	0.1 - 2 mm	Stones
1805082	TP117	0.50	Dark Brown	Silty Clay	0.063 - 0.1 mm	N/A
1805100	TP117	1.80	Dark Brown	Silty Clay	0.063 - 0.1 mm	Stones
1805350	TP119	0.50	Dark Brown	Sandy Loam	0.1 - 2 mm	Stones
1805365	TP119	3.20	Dark Brown	Silty Clay	0.063 - 0.1 mm	Stones
1805387	TP120	0.80	Dark Brown	Silty Clay	0.063 - 0.1 mm	Stones
1805433	TP120	3.00	Light Brown	Silty Sand	0.063 - 0.1 mm	Stones
1805459	TP121	0.90	Dark Brown	Silty Sand	0.063 - 0.1 mm	Stones
1805546	TP123	2.00	Dark Brown	Clay	<0.063 mm	N/A
1805575	TP134	0.30	Light Brown	Silty Clay	0.063 - 0.1 mm	Stones
1805596	TP135	0.90	Dark Brown	Sandy Loam	0.1 - 2 mm	Stones
1805613	TP135	3.10	Light Brown	Silty Clay	0.063 - 0.1 mm	None
1805646	TP136	0.50	Dark Brown	Sandy Clay Loam	0.1 - 2 mm	Stones
1805675	TP136	1.00	Dark Brown	Silty Sand	0.063 - 0.1 mm	Stones
1805701	TP137	0.70	Dark Brown	Sandy Loam	0.1 - 2 mm	Stones
1805736	TP137	2.00	Dark Brown	Silty Clay	0.063 - 0.1 mm	None
1805932	WS3	0.10 - 0.90	Dark Brown	Sandy Loam	0.1 - 2 mm	Stones
1806100	WS3	1.20 - 2.00	Dark Brown	Silty Clay	0.063 - 0.1 mm	Stones
1806152	WS4	0.10 - 0.50	Dark Brown	Sandy Loam	0.1 - 2 mm	Stones
1806221	WS4	1.00 - 1.50	Dark Brown	Sandy Clay	0.1 - 2 mm	Stones
1806285	WS5	0.10 - 1.00	Dark Brown	Sandy Loam	0.1 - 2 mm	Stones
1806302	WS6	0.30 - 1.00	Dark Brown	Sandy Loam	0.1 - 2 mm	Stones
1806335	WS7	1.60 - 2.00	Dark Brown	Sand	0.1 - 2 mm	Stones

These descriptions are only intended to act as a cross check if sample identities are questioned, and to provide a log of sample matrices with respect to MCERTS validation. They are not intended as full geological descriptions.

We are accredited to MCERTS for sand, clay and loam/topsoil, or any of these materials - whether these are derived from naturally occurring soil profiles, or from fill/made ground, as long as these materials constitute the major part of the sample.

Other coarse granular materials such as concrete, gravel and brick are not accredited if they comprise the major part of the sample.

SDG: 100712-18
Job: H_BWB_NTT-84
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Attention: Richard Robinson
Order No.: NE09/616
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Test Completion dates

SDG reference: 100712-18

Lab Sample No(s)	1804927	1805000	1805066	1805082	1805100	1805350	1805365	1805387	1805433	1805459	1805546	1805575
Customer Sample Ref.	TP109	TP114	TP116	TP117	TP117	TP119	TP119	TP120	TP120	TP121	TP123	TP134
Depth	2.50	0.50	3.00	0.50	1.80	0.50	3.20	0.80	3.00	0.90	2.00	0.30
Type	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID
Anions by Kone (w)					19/07/2010		20/07/2010			19/07/2010	20/07/2010	19/07/2010
Asbestos Containing Material Screen		16/07/2010				16/07/2010						16/07/2010
Boron Water Soluble		20/07/2010	20/07/2010	20/07/2010		20/07/2010	20/07/2010	20/07/2010	20/07/2010		20/07/2010	
CEN Readings					19/07/2010		20/07/2010			19/07/2010	20/07/2010	19/07/2010
Cyanide Comp/Free/Total/Thiocyanate		19/07/2010	19/07/2010	19/07/2010	20/07/2010	19/07/2010	21/07/2010	19/07/2010	19/07/2010	20/07/2010	21/07/2010	20/07/2010
Dissolved Metals by ICP-MS					21/07/2010		21/07/2010			21/07/2010	21/07/2010	21/07/2010
EPH CWG (Aliphatic) GC (S)	20/07/2010					20/07/2010		21/07/2010				
EPH CWG (Aromatic) GC (S)	20/07/2010					20/07/2010		21/07/2010				
GRO BTEX MTBE GC (S)	20/07/2010					20/07/2010		20/07/2010				
Mercury Dissolved					20/07/2010		20/07/2010			20/07/2010	20/07/2010	20/07/2010
Metals by iCap-OES (Soil)		21/07/2010	20/07/2010	19/07/2010		20/07/2010	19/07/2010	19/07/2010	19/07/2010		19/07/2010	
Moisture Meter					17/07/2010		16/07/2010			16/07/2010	16/07/2010	17/07/2010
PAH by GCMS		19/07/2010	19/07/2010	19/07/2010		19/07/2010	20/07/2010	19/07/2010	19/07/2010		19/07/2010	
pH		19/07/2010	16/07/2010	16/07/2010		19/07/2010	16/07/2010	19/07/2010	19/07/2010		16/07/2010	
pH Value					20/07/2010		20/07/2010			20/07/2010	20/07/2010	20/07/2010
Phenols by HPLC (S)		19/07/2010	19/07/2010	19/07/2010		19/07/2010	19/07/2010	21/07/2010	21/07/2010		19/07/2010	
Sample description	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010
Total Organic Carbon		19/07/2010	19/07/2010	19/07/2010		19/07/2010	19/07/2010	19/07/2010	19/07/2010		19/07/2010	
Total Sulphur		19/07/2010	19/07/2010	19/07/2010		19/07/2010	19/07/2010	19/07/2010	19/07/2010		19/07/2010	
TPH c6-40 Value of soil		20/07/2010	20/07/2010	20/07/2010		20/07/2010	20/07/2010	20/07/2010	20/07/2010		20/07/2010	
TPH CWG GC (S)	21/07/2010					21/07/2010		21/07/2010				
VOC MS (S)												
Water Soluble Sulphate 2:1		20/07/2010	20/07/2010	20/07/2010		20/07/2010	20/07/2010	20/07/2010	20/07/2010		20/07/2010	

1805596	1805613	1805646	1805675	1805701	1805736	1805932	1806100	1806152	1806221	1806285	1806302	1806335
TP135	TP135	TP136	TP136	TP137	TP137	WS3	WS3	WS4	WS4	WS5	WS6	WS7
0.90	3.10	0.50	1.00	0.70	2.00	0.10 - 0.90	1.20 - 2.00	0.10 - 0.50	1.00 - 1.50	0.10 - 1.00	0.30 - 1.00	1.60 - 2.00
SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID
	20/07/2010				19/07/2010	19/07/2010		19/07/2010			19/07/2010	
		16/07/2010				16/07/2010					16/07/2010	
20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010
	20/07/2010				19/07/2010	19/07/2010		19/07/2010			19/07/2010	
19/07/2010	21/07/2010	19/07/2010	19/07/2010	19/07/2010	20/07/2010	20/07/2010	19/07/2010	20/07/2010	19/07/2010	19/07/2010	20/07/2010	19/07/2010
	21/07/2010				21/07/2010	21/07/2010		21/07/2010			21/07/2010	
20/07/2010				20/07/2010					21/07/2010		21/07/2010	21/07/2010
20/07/2010				20/07/2010					21/07/2010		21/07/2010	21/07/2010
20/07/2010				20/07/2010					20/07/2010		20/07/2010	20/07/2010
	20/07/2010				20/07/2010	20/07/2010		20/07/2010			20/07/2010	
20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010
	16/07/2010				17/07/2010	16/07/2010		16/07/2010			16/07/2010	
19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010
16/07/2010	16/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010
	20/07/2010				20/07/2010	20/07/2010		20/07/2010			20/07/2010	
19/07/2010	20/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010	19/07/2010	21/07/2010	19/07/2010	21/07/2010	21/07/2010	19/07/2010	21/07/2010
16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010
19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010
19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010		19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010
20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010
21/07/2010				21/07/2010					21/07/2010		21/07/2010	21/07/2010
				20/07/2010								
20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010

SDG: 100712-18
Job: H_BWB_NTT-84
Client Reference:
Location: THE DOVE WAY-NTE285

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91087

Results Legend		Customer Sample Ref.	TP114	TP116	TP117	TP117	TP119	
#	ISO17025 accredited.							
M	mCERTS accredited.							
aq	Aqueous / settled sample.							
diss.filt	Dissolved / filtered sample.							
tot.unfilt	Total / unfiltered sample.							
*	subcontracted test.							
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.							
		Depth (m)	0.50	3.00	0.50	1.80	0.50	
		Sample Type	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	
		Date Sampled	08/07/2010	08/07/2010	08/07/2010	08/07/2010	08/07/2010	
		Date Received	12/07/2010	12/07/2010	12/07/2010	12/07/2010	12/07/2010	
		SDG Ref	100712-18	100712-18	100712-18	100712-18	100712-18	
		Lab Sample No.(s)	1805000	1805066	1805082	1805100	1805350	
Component	LOD/Units	Method						
Moisture	%	PM114				26.2		
Moisture content ratio	%	PM114				35.4		
Dry matter content ratio	%	PM114				73.9		
Asbestos Containing Material Screen	-	TM001	No ACM Detected				No ACM Detected	
Phenols, Total monohydric	<0.22 mg/kg	TM062 (S)	<0.22	<0.22	<0.22		<0.22	
Sulphate, 2:1 water soluble	<0.003 g/l	TM098	0.463	0.125	0.0109		1.49	
Sulphur, Total	<0.02 %	TM132	0.318	0.033	0.031		0.237	
Fraction Organic Carbon (FOC)	<0.002 -	TM132	0.147	0.00372	0.0178		0.122	
pH	1 pH Units	TM133	4.93	7.16	6.59		7.52	
Cyanide, Total	<1 mg/kg	TM153	3.51	<1	<1		<1	
Cyanide, Free	<1 mg/kg	TM153	<1	<1	<1		<1	
Cyanide, Complex	<1 mg/kg	TM153	2.89	<1	<1		<1	
TPH >C6-C40	<10 mg/kg	TM154	2370	<10	121		1970	
Arsenic	<0.6 mg/kg	TM181	22.2	6.27	9.76		42.9	
Barium	<0.6 mg/kg	TM181	675	99.2	262		251	
Beryllium	<0.01 mg/kg	TM181	1.97	0.632	1.39		5.26	
Cadmium	<0.02 mg/kg	TM181	22.2	0.333	0.618		0.991	
Chromium	<0.9 mg/kg	TM181	104	12.3	34.6		33.4	
Copper	<1.4 mg/kg	TM181	468	11.8	35.6		187	
Lead	<0.7 mg/kg	TM181	339	18.2	64.2		379	
Mercury	<0.14 mg/kg	TM181	1.82	<0.14	<0.14		<0.14	
Nickel	<0.2 mg/kg	TM181	57.1	13.1	31.5		69.9	
Selenium	<1 mg/kg	TM181	9.95	<1	1.5		1.98	
Vanadium	<0.2 mg/kg	TM181	24	16.6	36.2		41.7	
Zinc	<1.9 mg/kg	TM181	388	62	192		542	
Boron, water soluble	<1 mg/kg	TM222	4.03	1.45	<1		6.71	

SDG 100712-18
Job: H_BWB_NTT-84
Client Reference:
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Customer: BWB Consulting
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Order No.: NE09/616
Report No: 91087

PAH by GCMS

Results Legend		Customer Sample Ref.	TP114	TP116	TP117	TP119		
#	ISO17025 accredited.							
M	mCERTS accredited.							
aq	Aqueous / settled sample.							
diss.filt	Dissolved / filtered sample.							
tot.unfilt	Total / unfiltered sample.							
*	subcontracted test.							
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.							
		Depth (m)	0.50	3.00	0.50	0.50		
		Sample Type	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid		
		Date Sampled	08/07/2010	08/07/2010	08/07/2010	08/07/2010		
		Date Received	12/07/2010	12/07/2010	12/07/2010	12/07/2010		
		SDG Ref	100712-18	100712-18	100712-18	100712-18		
		Lab Sample No.(s)	1805000	1805066	1805082	1805350		
Component	LOD/Units	Method						
Naphthalene-d8 % recovery**	%	TM218	107	110	103	112		
Acenaphthene-d10 % recovery**	%	TM218	109	112	100	113		
Phenanthrene-d10 % recovery**	%	TM218	111	115	104	117		
Chrysene-d12 % recovery**	%	TM218	97.2	101	85.8	99.9		
Perylene-d12 % recovery**	%	TM218	105	115	87.4	108		
Naphthalene	<9 µg/kg	TM218	516	<9	<9	828		
Acenaphthylene	<12 µg/kg	TM218	64.4	<12	<12	204		
Acenaphthene	<8 µg/kg	TM218	21.4	<8	<8	2540		
Fluorene	<10 µg/kg	TM218	23.9	<10	<10	3120		
Phenanthrene	<15 µg/kg	TM218	580	22.7	51.5	6370		
Anthracene	<16 µg/kg	TM218	191	<16	<16	6380		
Fluoranthene	<17 µg/kg	TM218	705	42.3	89.7	28900		
Pyrene	<15 µg/kg	TM218	550	35.5	76.2	21400		
Benzo(a)anthracene	<14 µg/kg	TM218	449	31.5	54.3	8380		
Chrysene	<10 µg/kg	TM218	431	22.4	63.9	7090		
Benzo(b)fluoranthene	<15 µg/kg	TM218	1550	38.6	77.8	8880		
Benzo(k)fluoranthene	<14 µg/kg	TM218	410	15.3	29.8	3750		
Benzo(a)pyrene	<15 µg/kg	TM218	458	27.9	38.4	7310		
Indeno(1,2,3-cd)pyrene	<18 µg/kg	TM218	728	<18	33.8	3770		
Dibenzo(a,h)anthracene	<23 µg/kg	TM218	166	<23	<23	1020		
Benzo(g,h,i)perylene	<24 µg/kg	TM218	766	<24	48	4430		
Polyaromatic hydrocarbons, Total USEPA 16	<118 µg/kg	TM218	7610	236	563	114000		

SDG 100712-18
Job: H_BWB_NTT-84
Client Reference:
Location: THE DOVE WAY-NTE285

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91087

TPH CWG (S)

Results Legend		Customer Sample Ref.	TP109	TP119			
#	ISO17025 accredited.						
M	mCERTS accredited.						
aq	Aqueous / settled sample.						
diss.filt	Dissolved / filtered sample.						
tot.unfilt	Total / unfiltered sample.						
*	subcontracted test.						
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
		Depth (m)	2.50	0.50			
		Sample Type	Soil/Solid	Soil/Solid			
		Date Sampled	08/07/2010	08/07/2010			
		Date Received	12/07/2010	12/07/2010			
		SDG Ref	100712-18	100712-18			
		Lab Sample No.(s)	1804927	1805350			
Component	LOD/Units	Method					
GRO Surrogate % recovery**	%	TM089	74	68			
GRO >C5-C12	<44 µg/kg	TM089	185	716			
Benzene	<10 µg/kg	TM089	<10	<10			
Ethylbenzene	<3 µg/kg	TM089	<3	<3	M	M	
Toluene	<2 µg/kg	TM089	<2	<2	M	M	
m,p-Xylene	<6 µg/kg	TM089	<6	<6	M	M	
o-Xylene	<3 µg/kg	TM089	<3	<3	M	M	
m,p,o-Xylene	<10 µg/kg	TM089	<10	<10	M	M	
BTEX, Total	<10 µg/kg	TM089	<10	<10	M	M	
Methyl tertiary butyl ether (MTBE)	<5 µg/kg	TM089	<5	<5	#	#	
Aliphatics >C5-C6	<10 µg/kg	TM089	10.6	16.1			
Aliphatics >C6-C8	<10 µg/kg	TM089	13	22.4			
Aliphatics >C8-C10	<10 µg/kg	TM089	40.6	40.6			
Aliphatics >C10-C12	<10 µg/kg	TM089	18.6	223			
Aromatics >C6-C7	<10 µg/kg	TM089	<10	<10			
Aromatics >C7-C8	<10 µg/kg	TM089	<10	<10			
Aromatics >EC8-EC10	<10 µg/kg	TM089	60.9	60.9			
Aromatics >EC10-EC12	<10 µg/kg	TM089	27.9	335			
Total Aliphatics >C5-C12	<10 µg/kg	TM089	82.8	302			
Total Aromatics >C6-C12	<10 µg/kg	TM089	88.8	396			
Aliphatics >C12-C16	<100 µg/kg	TM173	11500	18500			
Aliphatics >C16-C21	<100 µg/kg	TM173	4610	63900			
Aliphatics >C16-C35	<100 µg/kg	TM173	207000	410000			
Aliphatics >C21-C35	<100 µg/kg	TM173	202000	346000			
Aliphatics >C35-C44	<100 µg/kg	TM173	118000	149000			
Aromatics >EC12-EC16	<100 µg/kg	TM173	3020	23200			
Aromatics >EC16-EC21	<100 µg/kg	TM173	3370	153000			
Aromatics >EC21-EC35	<100 µg/kg	TM173	24200	448000			
Aromatics >EC35-EC44	<100 µg/kg	TM173	24500	155000			
Aromatics >EC40-EC44	<100 µg/kg	TM173	12800	64000			
Total Aliphatics >C12-C44	<100 µg/kg	TM173	336000	578000			
Total Aromatics >EC12-EC44	<100 µg/kg	TM173	55100	780000			
Total Aliphatics >C5-35	<100 µg/kg	TM173	218000	429000			
Total Aliphatics >C5-C44	<100 µg/kg	TM173	336000	578000			
Total Aromatics >C5-35	<100 µg/kg	TM173	30700	625000			
Total Aromatics >C6-C44	<100 µg/kg	TM173	55200	780000			
Total Aliphatics & Aromatics >C5-35	<100 µg/kg	TM173	249000	1050000			
Total Aliphatics & Aromatics >C5-C44	<100 µg/kg	TM173	391000	1360000			

SDG: 100712-18
Job: H_BWB_NTT-84
Client Reference:
Location: THE DOVE WAY-NTE285

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
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Results Legend		Customer Sample Ref.	TP119	TP120	TP120	TP121	TP123	TP134
#	ISO17025 accredited.	Depth (m) Sample Type Date Sampled Date Received SDG Ref Lab Sample No.(s)	3.20	0.80	3.00	0.90	2.00	0.30
M	mCERTS accredited.		Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid
aq	Aqueous / settled sample.		08/07/2010	08/07/2010	08/07/2010	07/07/2010	07/07/2010	08/07/2010
diss.filt	Dissolved / filtered sample.		12/07/2010	12/07/2010	12/07/2010	12/07/2010	12/07/2010	12/07/2010
tot.unfilt	Total / unfiltered sample.		100712-18	100712-18	100712-18	100712-18	100712-18	100712-18
*	subcontracted test.		1805365	1805387	1805433	1805459	1805546	1805575
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.							
Component	LOD/Units	Method						
Moisture	%	PM114	15.3			20.7	16.2	10.1
Moisture content ratio	%	PM114	18.1			26.2	19.3	11.2
Dry matter content ratio	%	PM114	84.7			79.3	83.8	90
Asbestos Containing Material Screen	-	TM001						No ACM Detected
Phenols, Total monohydric	<0.22 mg/kg	TM062 (S)	<0.22	<0.22	2.1		<0.22	
Sulphate, 2:1 water soluble	<0.003 g/l	TM098	0.348	1.3	0.0652		0.0421	
Sulphur, Total	<0.02 %	TM132	0.078	0.931	0.02		0.02	
Fraction Organic Carbon (FOC)	<0.002 -	TM132	0.0163	0.0524	0.00223		0.00444	
pH	1 pH Units	TM133	7.41	7.69	7.79		7.21	
Cyanide, Total	<1 mg/kg	TM153	<1	<1	<1		<1	
Cyanide, Free	<1 mg/kg	TM153	<1	<1	<1		<1	
Cyanide, Complex	<1 mg/kg	TM153	<1	<1	<1		<1	
TPH >C6-C40	<10 mg/kg	TM154	275	13800	<10		<10	
Arsenic	<0.6 mg/kg	TM181	12.6	6.69	6.31		7.55	
Barium	<0.6 mg/kg	TM181	127	524	57.3		158	
Beryllium	<0.01 mg/kg	TM181	0.767	7.11	0.469		0.772	
Cadmium	<0.02 mg/kg	TM181	0.415	<0.02	0.198		0.488	
Chromium	<0.9 mg/kg	TM181	28.2	38.9	7.58		22.2	
Copper	<1.4 mg/kg	TM181	133	20.4	7.72		16.3	
Lead	<0.7 mg/kg	TM181	47.9	23.5	14.4		21.8	
Mercury	<0.14 mg/kg	TM181	<0.14	<0.14	<0.14		<0.14	
Nickel	<0.2 mg/kg	TM181	27.5	12	9.64		24	
Selenium	<1 mg/kg	TM181	<1	3.44	<1		1.58	
Vanadium	<0.2 mg/kg	TM181	19.6	39	14.3		23.5	
Zinc	<1.9 mg/kg	TM181	99.5	103	35.1		97.5	
Boron, water soluble	<1 mg/kg	TM222	1.08	3.79	1.95		3.59	

SDG: 100712-18
Job: H_BWB_NTT-84
Client Reference:
Location: THE DOVE WAY-NTE285

Customer: BWB Consulting
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PAH by GCMS

Results Legend		Customer Sample Ref.	TP119	TP120	TP120	TP123		
#	ISO17025 accredited.							
M	mCERTS accredited.							
aq	Aqueous / settled sample.	Depth (m)	3.20	0.80	3.00	2.00		
diss.filt	Dissolved / filtered sample.	Sample Type	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid		
tot.unfilt	Total / unfiltered sample.	Date Sampled	08/07/2010	08/07/2010	08/07/2010	07/07/2010		
*	subcontracted test.	Date Received	12/07/2010	12/07/2010	12/07/2010	12/07/2010		
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.	SDG Ref	100712-18	100712-18	100712-18	100712-18		
		Lab Sample No.(s)	1805365	1805387	1805433	1805546		
Component	LOD/Units	Method						
Naphthalene-d8 % recovery**	%	TM218	107	102	104	101		
Acenaphthene-d10 % recovery**	%	TM218	106	102	105	99.6		
Phenanthrene-d10 % recovery**	%	TM218	110	105	110	104		
Chrysene-d12 % recovery**	%	TM218	91.5	91.8	99.6	91.4		
Perylene-d12 % recovery**	%	TM218	97	98.9	116	104		
Naphthalene	<9 µg/kg	TM218	104	244	13.3	<9		
Acenaphthylene	<12 µg/kg	TM218	16.3	2130	23.5	<12		
Acenaphthene	<8 µg/kg	TM218	38	65500	212	<8		
Fluorene	<10 µg/kg	TM218	61.3	12100	89.3	<10		
Phenanthrene	<15 µg/kg	TM218	220	9080	877	<15		
Anthracene	<16 µg/kg	TM218	68.1	5400	165	<16		
Fluoranthene	<17 µg/kg	TM218	529	17900	1360	<17		
Pyrene	<15 µg/kg	TM218	413	13300	1110	<15		
Benzo(a)anthracene	<14 µg/kg	TM218	167	3030	472	<14		
Chrysene	<10 µg/kg	TM218	169	3100	436	<10		
Benzo(b)fluoranthene	<15 µg/kg	TM218	193	2440	523	<15		
Benzo(k)fluoranthene	<14 µg/kg	TM218	77.1	1170	182	<14		
Benzo(a)pyrene	<15 µg/kg	TM218	163	2190	507	<15		
Indeno(1,2,3-cd)pyrene	<18 µg/kg	TM218	99.2	865	239	<18		
Dibenzo(a,h)anthracene	<23 µg/kg	TM218	<23	314	57	<23		
Benzo(g,h,i)perylene	<24 µg/kg	TM218	126	1350	287	<24		
Polyaromatic hydrocarbons, Total USEPA 16	<118 µg/kg	TM218	2440	140000	6550	<118		

SDG 100712-18
Job: H_BWB_NTT-84
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Customer: BWB Consulting
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TPH CWG (S)

Results Legend		Customer Sample Ref.	TP120				
#	ISO17025 accredited.						
M	mCERTS accredited.						
aq	Aqueous / settled sample.						
diss.filt	Dissolved / filtered sample.						
tot.unfilt	Total / unfiltered sample.						
*	subcontracted test.						
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
		Depth (m)	0.80				
		Sample Type	Soil/Solid				
		Date Sampled	08/07/2010				
		Date Received	12/07/2010				
		SDG Ref	100712-18				
		Lab Sample No.(s)	1805387				
Component	LOD/Units	Method					
GRO Surrogate % recovery**	%	TM089	17				
GRO >C5-C12	<44 µg/kg	TM089	812				
Benzene	<10 µg/kg	TM089	<10				
Ethylbenzene	<3 µg/kg	TM089	<3				
Toluene	<2 µg/kg	TM089	<2				
m,p-Xylene	<6 µg/kg	TM089	<6				
o-Xylene	<3 µg/kg	TM089	<3				
m,p,o-Xylene	<10 µg/kg	TM089	<10				
BTEX, Total	<10 µg/kg	TM089	<10				
Methyl tertiary butyl ether (MTBE)	<5 µg/kg	TM089	<5				
Aliphatics >C5-C6	<10 µg/kg	TM089	11.8				
Aliphatics >C6-C8	<10 µg/kg	TM089	<10				
Aliphatics >C8-C10	<10 µg/kg	TM089	154				
Aliphatics >C10-C12	<10 µg/kg	TM089	157				
Aromatics >C6-C7	<10 µg/kg	TM089	<10				
Aromatics >C7-C8	<10 µg/kg	TM089	<10				
Aromatics >EC8-EC10	<10 µg/kg	TM089	232				
Aromatics >EC10-EC12	<10 µg/kg	TM089	236				
Total Aliphatics >C5-C12	<10 µg/kg	TM089	323				
Total Aromatics >C6-C12	<10 µg/kg	TM089	467				
Aliphatics >C12-C16	<100 µg/kg	TM173	203000				
Aliphatics >C16-C21	<100 µg/kg	TM173	200000				
Aliphatics >C16-C35	<100 µg/kg	TM173	2040000				
Aliphatics >C21-C35	<100 µg/kg	TM173	1840000				
Aliphatics >C35-C44	<100 µg/kg	TM173	1720000				
Aromatics >EC12-EC16	<100 µg/kg	TM173	206000				
Aromatics >EC16-EC21	<100 µg/kg	TM173	258000				
Aromatics >EC21-EC35	<100 µg/kg	TM173	1130000				
Aromatics >EC35-EC44	<100 µg/kg	TM173	1100000				
Aromatics >EC40-EC44	<100 µg/kg	TM173	504000				
Total Aliphatics >C12-C44	<100 µg/kg	TM173	3960000				
Total Aromatics >EC12-EC44	<100 µg/kg	TM173	2690000				
Total Aliphatics >C5-35	<100 µg/kg	TM173	2240000				
Total Aliphatics >C5-C44	<100 µg/kg	TM173	3960000				
Total Aromatics >C5-35	<100 µg/kg	TM173	1600000				
Total Aromatics >C6-C44	<100 µg/kg	TM173	2700000				
Total Aliphatics & Aromatics >C5-35	<100 µg/kg	TM173	3840000				
Total Aliphatics & Aromatics >C5-C44	<100 µg/kg	TM173	6660000				

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Results Legend		Customer Sample Ref.	TP135	TP135	TP136	TP136	TP137	TP137
#	ISO17025 accredited.	Depth (m) Sample Type Date Sampled Date Received SDG Ref Lab Sample No.(s)	0.90	3.10	0.50	1.00	0.70	2.00
M	mCERTS accredited.		Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid
aq	Aqueous / settled sample.		08/07/2010	08/07/2010	08/07/2010	08/07/2010	08/07/2010	08/07/2010
diss.filt	Dissolved / filtered sample.		12/07/2010	12/07/2010	12/07/2010	12/07/2010	12/07/2010	12/07/2010
tot.unfilt	Total / unfiltered sample.		100712-18	100712-18	100712-18	100712-18	100712-18	100712-18
*	subcontracted test.		1805596	1805613	1805646	1805675	1805701	1805736
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.							
Component	LOD/Units	Method						
Moisture	%	PM114		27.8				33.5
Moisture content ratio	%	PM114		38.5				50.4
Dry matter content ratio	%	PM114		72.2				66.5
Asbestos Containing Material Screen	-	TM001			No ACM Detected			
Phenols, Total monohydric	<0.22 mg/kg	TM062 (S)	<0.22	<0.22	<0.22	<0.22	<0.22	<0.22
Sulphate, 2:1 water soluble	<0.003 g/l	TM098	0.163	0.209	1.4	0.728	0.0309	0.357
Sulphur, Total	<0.02 %	TM132	0.105	0.052	0.234	0.568	1.07	
Fraction Organic Carbon (FOC)	<0.002 -	TM132	0.0384	0.00987	0.0497	0.233	0.341	0.169
pH	1 pH Units	TM133	7.93	5.61	7.72	5.76	8.33	3.71
Cyanide, Total	<1 mg/kg	TM153	17.2	21	162	267	17.1	22100
Cyanide, Free	<1 mg/kg	TM153	<1	<1	<1	5.12	<1	<1
Cyanide, Complex	<1 mg/kg	TM153	16.9	20.7	163	262	16.3	22200
TPH >C6-C40	<10 mg/kg	TM154	896	97	1830	1210	773	8970
Arsenic	<0.6 mg/kg	TM181	10	8.5	12.6	21.2	3.85	50.8
Barium	<0.6 mg/kg	TM181	357	183	221	251	195	12.3
Beryllium	<0.01 mg/kg	TM181	0.918	0.844	1.21	1.27	1.43	2.12
Cadmium	<0.02 mg/kg	TM181	2.95	0.146	0.419	0.181	0.547	4.11
Chromium	<0.9 mg/kg	TM181	15.8	41.6	14.5	21.1	10.5	82.2
Copper	<1.4 mg/kg	TM181	63.6	28.4	34.1	66.5	92.9	79.6
Lead	<0.7 mg/kg	TM181	94.9	48.6	81.2	128	19.4	325
Mercury	<0.14 mg/kg	TM181	<0.14	<0.14	<0.14	0.246	<0.14	0.671
Nickel	<0.2 mg/kg	TM181	14.4	30.2	19.1	25.2	21.5	53.6
Selenium	<1 mg/kg	TM181	1.62	1.77	1.02	1.74	<1	<10
Vanadium	<0.2 mg/kg	TM181	24.5	38.5	24.2	39	27.5	39.5
Zinc	<1.9 mg/kg	TM181	265	86	55.2	64.6	29.6	328
Boron, water soluble	<1 mg/kg	TM222	3.27	2.4	1.82	1.9	1.19	1.11

SDG: 100712-18
Job: H_BWB_NTT-84
Client Reference:
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PAH by GCMS

Results Legend		Customer Sample Ref.	TP135	TP135	TP136	TP136	TP137	TP137
#	ISO17025 accredited.							
M	mCERTS accredited.							
aq	Aqueous / settled sample.							
diss.filt	Dissolved / filtered sample.							
tot.unfilt	Total / unfiltered sample.							
*	subcontracted test.							
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.							
		Depth (m)	0.90	3.10	0.50	1.00	0.70	2.00
		Sample Type	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid
		Date Sampled	08/07/2010	08/07/2010	08/07/2010	08/07/2010	08/07/2010	08/07/2010
		Date Received	12/07/2010	12/07/2010	12/07/2010	12/07/2010	12/07/2010	12/07/2010
		SDG Ref	100712-18	100712-18	100712-18	100712-18	100712-18	100712-18
		Lab Sample No.(s)	1805596	1805613	1805646	1805675	1805701	1805736
Component	LOD/Units	Method						
Naphthalene-d8 % recovery**	%	TM218	107	111	107	114	110	106
Acenaphthene-d10 % recovery**	%	TM218	108	110	107	114	109	99.6
Phenanthrene-d10 % recovery**	%	TM218	109	113	111	115	110	103
Chrysene-d12 % recovery**	%	TM218	92.7	95.2	96.5	96.2	92.3	87.4
Perylene-d12 % recovery**	%	TM218	103	105	99.8	98.8	95.5	87.4
Naphthalene	<9 µg/kg	TM218	168	<9	1210	2670	592	44700
Acenaphthylene	<12 µg/kg	TM218	307	<12	3490	3350	608	6420
Acenaphthene	<8 µg/kg	TM218	60.8	<8	600	609	52.5	2170
Fluorene	<10 µg/kg	TM218	100	<10	2600	748	179	12800
Phenanthrene	<15 µg/kg	TM218	1140	<15	23700	7630	2320	193000
Anthracene	<16 µg/kg	TM218	474	<16	8220	2780	677	21400
Fluoranthene	<17 µg/kg	TM218	2950	32.4	40300	17500	5310	242000
Pyrene	<15 µg/kg	TM218	2490	28.1	32700	14800	5110	178000
Benzo(a)anthracene	<14 µg/kg	TM218	1490	28.8	20100	11100	2500	65500
Chrysene	<10 µg/kg	TM218	1290	16.3	16700	10400	2140	63200
Benzo(b)fluoranthene	<15 µg/kg	TM218	2010	26.3	23400	21300	3490	71200
Benzo(k)fluoranthene	<14 µg/kg	TM218	768	<14	8650	8090	1280	27100
Benzo(a)pyrene	<15 µg/kg	TM218	1570	<15	17000	9860	2480	31900
Indeno(1,2,3-cd)pyrene	<18 µg/kg	TM218	979	<18	9360	9900	1700	29500
Dibenzo(a,h)anthracene	<23 µg/kg	TM218	276	<23	3060	2740	440	7180
Benzo(g,h,i)perylene	<24 µg/kg	TM218	1210	<24	10000	10800	2080	31500
Polyaromatic hydrocarbons, Total USEPA 16	<118 µg/kg	TM218	17300	132	221000	134000	30900	1030000

SDG 100712-18
Job: H_BWB_NTT-84
Client Reference:
Location: THE DOVE WAY-NTE285

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91087

TPH CWG (S)

Results Legend		Customer Sample Ref.	TP135	TP137			
#	ISO17025 accredited.						
M	mCERTS accredited.						
aq	Aqueous / settled sample.						
diss.filt	Dissolved / filtered sample.						
tot.unfilt	Total / unfiltered sample.						
*	subcontracted test.						
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
		Depth (m)	0.90	0.70			
		Sample Type	Soil/Solid	Soil/Solid			
		Date Sampled	08/07/2010	08/07/2010			
		Date Received	12/07/2010	12/07/2010			
		SDG Ref	100712-18	100712-18			
		Lab Sample No.(s)	1805596	1805701			
Component	LOD/Units	Method					
GRO Surrogate % recovery**	%	TM089	53	51			
GRO >C5-C12	<44 µg/kg	TM089	107	4190			
Benzene	<10 µg/kg	TM089	<10	<10			
Ethylbenzene	<3 µg/kg	TM089	<3	24.4			
Toluene	<2 µg/kg	TM089	<2	199			
m,p-Xylene	<6 µg/kg	TM089	<6	271			
o-Xylene	<3 µg/kg	TM089	<3	248			
m,p,o-Xylene	<10 µg/kg	TM089	<10	518			
BTEX, Total	<10 µg/kg	TM089	<10	741			
Methyl tertiary butyl ether (MTBE)	<5 µg/kg	TM089	<5	<5			
Aliphatics >C5-C6	<10 µg/kg	TM089	11.4	22.7			
Aliphatics >C6-C8	<10 µg/kg	TM089	10.4	87.2			
Aliphatics >C8-C10	<10 µg/kg	TM089	15.7	309			
Aliphatics >C10-C12	<10 µg/kg	TM089	13	1030			
Aromatics >C6-C7	<10 µg/kg	TM089	<10	<10			
Aromatics >C7-C8	<10 µg/kg	TM089	<10	199			
Aromatics >EC8-EC10	<10 µg/kg	TM089	23.6	1010			
Aromatics >EC10-EC12	<10 µg/kg	TM089	19.5	1540			
Total Aliphatics >C5-C12	<10 µg/kg	TM089	50.5	1450			
Total Aromatics >C6-C12	<10 µg/kg	TM089	43	2740			
Aliphatics >C12-C16	<100 µg/kg	TM173	11900	9490			
Aliphatics >C16-C21	<100 µg/kg	TM173	20500	17900			
Aliphatics >C16-C35	<100 µg/kg	TM173	107000	47900			
Aliphatics >C21-C35	<100 µg/kg	TM173	86800	30100			
Aliphatics >C35-C44	<100 µg/kg	TM173	42600	7000			
Aromatics >EC12-EC16	<100 µg/kg	TM173	57300	11000			
Aromatics >EC16-EC21	<100 µg/kg	TM173	227000	25500			
Aromatics >EC21-EC35	<100 µg/kg	TM173	507000	53100			
Aromatics >EC35-EC44	<100 µg/kg	TM173	209000	21700			
Aromatics >EC40-EC44	<100 µg/kg	TM173	87400	9410			
Total Aliphatics >C12-C44	<100 µg/kg	TM173	162000	64400			
Total Aromatics >EC12-EC44	<100 µg/kg	TM173	1000000	111000			
Total Aliphatics >C5-35	<100 µg/kg	TM173	119000	58900			
Total Aliphatics >C5-C44	<100 µg/kg	TM173	162000	65900			
Total Aromatics >C5-35	<100 µg/kg	TM173	791000	92400			
Total Aromatics >C6-C44	<100 µg/kg	TM173	1000000	114000			
Total Aliphatics & Aromatics >C5-35	<100 µg/kg	TM173	910000	151000			
Total Aliphatics & Aromatics >C5-C44	<100 µg/kg	TM173	1160000	180000			

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VOC MS (S)

Results Legend		Customer Sample Ref.	TP137				
#	ISO17025 accredited.						
M	mCERTS accredited.						
aq	Aqueous / settled sample.						
diss.filt	Dissolved / filtered sample.						
tot.unfilt	Total / unfiltered sample.						
*	subcontracted test.						
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
		Depth (m)	0.70				
		Sample Type	Soil/Solid				
		Date Sampled	08/07/2010				
		Date Received	12/07/2010				
		SDG Ref	100712-18				
		Lab Sample No.(s)	1805701				
Component	LOD/Units	Method					
Dibromofluoromethane**	%	TM116	113				
Toluene-d8**	%	TM116	97.8				
4-Bromofluorobenzene**	%	TM116	117				
Dichlorodifluoromethane	<4 µg/kg	TM116	<4				
Chloromethane	<7 µg/kg	TM116	<7				
Vinyl Chloride	<10 µg/kg	TM116	<10				
Bromomethane	<13 µg/kg	TM116	<13				
Chloroethane	<14 µg/kg	TM116	<14				
Trichlorofluoromethane	<6 µg/kg	TM116	<6				
1.1-Dichloroethene	<10 µg/kg	TM116	<10				
Carbon Disulphide	<7 µg/kg	TM116	<7				
Dichloromethane	<10 µg/kg	TM116	<10				
Methyl Tertiary Butyl Ether	<11 µg/kg	TM116	<11				
trans-1-2-Dichloroethene	<11 µg/kg	TM116	<11				
1.1-Dichloroethane	<8 µg/kg	TM116	<8				
cis-1-2-Dichloroethene	<5 µg/kg	TM116	<5				
2.2-Dichloropropane	<12 µg/kg	TM116	<12				
Bromochloromethane	<14 µg/kg	TM116	<14				
Chloroform	<8 µg/kg	TM116	<8				
1.1.1-Trichloroethane	<7 µg/kg	TM116	<7				
1.1-Dichloropropene	<11 µg/kg	TM116	<11				
Carbontetrachloride	<14 µg/kg	TM116	<14				
1.2-Dichloroethane	<5 µg/kg	TM116	<5				
Benzene	<9 µg/kg	TM116	34.8				
Trichloroethene	<9 µg/kg	TM116	<9				
1.2-Dichloropropane	<12 µg/kg	TM116	<12				
Dibromomethane	<9 µg/kg	TM116	<9				
Bromodichloromethane	<7 µg/kg	TM116	<7				
cis-1-3-Dichloropropene	<14 µg/kg	TM116	<14				
Toluene	<5 µg/kg	TM116	634				
trans-1-3-Dichloropropene	<14 µg/kg	TM116	<14				
1.1.2-Trichloroethane	<10 µg/kg	TM116	<10				
1.3-Dichloropropane	<7 µg/kg	TM116	<7				
Tetrachloroethene	<5 µg/kg	TM116	<5				
Dibromochloromethane	<13 µg/kg	TM116	<13				
1.2-Dibromoethane	<12 µg/kg	TM116	<12				
Chorobenzene	<5 µg/kg	TM116	<5				
1.1.1.2-Tetrachloroethane	<10 µg/kg	TM116	<10				
Ethylbenzene	<4 µg/kg	TM116	69.4				

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VOC MS (S)

Results Legend		Customer Sample Ref.	TP137				
#	ISO17025 accredited.						
M	mCERTS accredited.						
aq	Aqueous / settled sample.						
diss.filt	Dissolved / filtered sample.						
tot.unfilt	Total / unfiltered sample.						
*	subcontracted test.						
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
		Depth (m)	0.70				
		Sample Type	Soil/Solid				
		Date Sampled	08/07/2010				
		Date Received	12/07/2010				
		SDG Ref	100712-18				
		Lab Sample No.(s)	1805701				
Component	LOD/Units	Method					
p/m-Xylene	<14 µg/kg	TM116	572	#			
o-Xylene	<10 µg/kg	TM116	397	M			
Styrene	<10 µg/kg	TM116	<10	M			
Bromoform	<10 µg/kg	TM116	<10	M			
Isopropylbenzene	<5 µg/kg	TM116	<5	M			
1.1.2.2-Tetrachloroethane	<10 µg/kg	TM116	<10	#			
1.2.3-Trichloropropane	<17 µg/kg	TM116	<17	M			
Bromobenzene	<10 µg/kg	TM116	<10	M			
Propylbenzene	<11 µg/kg	TM116	20.3	M			
2-Chlorotoluene	<9 µg/kg	TM116	<9	M			
1.3.5-Trimethylbenzene	<8 µg/kg	TM116	112	#			
4-Chlorotoluene	<12 µg/kg	TM116	<12	M			
tert-Butylbenzene	<12 µg/kg	TM116	<12	#			
1.2.4-Trimethylbenzene	<9 µg/kg	TM116	353	#			
sec-Butylbenzene	<10 µg/kg	TM116	<10	M			
4-Isopropyltoluene	<11 µg/kg	TM116	<11	M			
1.3-Dichlorobenzene	<6 µg/kg	TM116	<6	M			
1.4-Dichlorobenzene	<5 µg/kg	TM116	<5	M			
n-Butylbenzene	<10 µg/kg	TM116	<10	M			
1.2-Dichlorobenzene	<12 µg/kg	TM116	<12	M			
1.2-Dibromo-3-chloropropane	<14 µg/kg	TM116	<14	M			
Tert-amyl methyl ether	<15 µg/kg	TM116	<15				
1.2.4-Trichlorobenzene	<6 µg/kg	TM116	<6	#			
Hexachlorobutadiene	<12 µg/kg	TM116	<12	M			
Naphthalene	<13 µg/kg	TM116	170	M			
1.2.3-Trichlorobenzene	<6 µg/kg	TM116	<6	M			

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Results Legend		Customer Sample Ref.	WS3	WS3	WS4	WS4	WS5	WS6	
#	ISO17025 accredited.	Depth (m) Sample Type Date Sampled Date Received SDG Ref Lab Sample No.(s)	0.10 - 0.90	1.20 - 2.00	0.10 - 0.50	1.00 - 1.50	0.10 - 1.00	0.30 - 1.00	
M	mCERTS accredited.		Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	
aq	Aqueous / settled sample.		07/07/2010	07/07/2010	07/07/2010	07/07/2010	07/07/2010	07/07/2010	
diss.filt	Dissolved / filtered sample.		12/07/2010	12/07/2010	12/07/2010	12/07/2010	12/07/2010	12/07/2010	
tot.unfilt	Total / unfiltered sample.		100712-18	100712-18	100712-18	100712-18	100712-18	100712-18	
*	subcontracted test.		1805932	1806100	1806152	1806221	1806285	1806302	
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.								
Component	LOD/Units	Method							
Moisture	%	PM114	6.8		11.4			11	
Moisture content ratio	%	PM114	7.3		12.8			12.3	
Dry matter content ratio	%	PM114	93.2		88.7			89	
Asbestos Containing Material Screen	-	TM001	No ACM Detected						No ACM Detected
Phenols, Total monohydric	<0.22 mg/kg	TM062 (S)	<0.22	<0.22	<0.22	<0.22	<0.22	<0.22	
Sulphate, 2:1 water soluble	<0.003 g/l	TM098	0.0772	0.198	0.0868	0.298	0.0341	0.0922	
Sulphur, Total	<0.02 %	TM132	0.238	0.112	0.152	0.54	0.274	0.312	
Fraction Organic Carbon (FOC)	<0.002 -	TM132	0.0155	0.0211	0.0925	0.0386	0.197	0.236	
pH	1 pH Units	TM133	8.52	7.85	8.11	6.81	8.44	8.11	
Cyanide, Total	<1 mg/kg	TM153	3.74	8.06	6.9	194	10.8	17.1	
Cyanide, Free	<1 mg/kg	TM153	<1	<1	<1	<1	<1	<1	
Cyanide, Complex	<1 mg/kg	TM153	3.77	9.15	6.83	194	10.4	16.5	
TPH >C6-C40	<10 mg/kg	TM154	3710	1170	2640	1080	789	3090	
Arsenic	<0.6 mg/kg	TM181	2.21	11.4	6.28	9.33	18.9	14.2	
Barium	<0.6 mg/kg	TM181	364	182	246	212	340	247	
Beryllium	<0.01 mg/kg	TM181	3.22	0.723	0.953	1.25	1.61	3	
Cadmium	<0.02 mg/kg	TM181	0.726	0.768	2.93	0.389	0.31	0.737	
Chromium	<0.9 mg/kg	TM181	28	15.9	13.7	35.1	21.2	19.8	
Copper	<1.4 mg/kg	TM181	14.8	38	36.3	27	88.8	94.4	
Lead	<0.7 mg/kg	TM181	18.1	146	41	123	121	119	
Mercury	<0.14 mg/kg	TM181	<0.14	0.147	<0.14	<0.14	<0.14	<0.14	
Nickel	<0.2 mg/kg	TM181	3.94	14.7	19.7	33	45.6	36.6	
Selenium	<1 mg/kg	TM181	1.48	<1	<1	1.56	<10	2.01	
Vanadium	<0.2 mg/kg	TM181	45.2	24.3	28.4	33.3	47.4	45.6	
Zinc	<1.9 mg/kg	TM181	50.3	132	65.7	83.7	79.4	88.3	
Boron, water soluble	<1 mg/kg	TM222	1	2.64	<1	1.68	<1	1.37	

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Customer: BWB Consulting
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PAH by GCMS

Results Legend		Customer Sample Ref.	WS3	WS3	WS4	WS4	WS5	WS6
#	ISO17025 accredited.	Depth (m) Sample Type Date Sampled Date Received SDG Ref Lab Sample No.(s)	0.10 - 0.90 Soil/Solid 07/07/2010 12/07/2010 100712-18 1805932	1.20 - 2.00 Soil/Solid 07/07/2010 12/07/2010 100712-18 1806100	0.10 - 0.50 Soil/Solid 07/07/2010 12/07/2010 100712-18 1806152	1.00 - 1.50 Soil/Solid 07/07/2010 12/07/2010 100712-18 1806221	0.10 - 1.00 Soil/Solid 07/07/2010 12/07/2010 100712-18 1806285	0.30 - 1.00 Soil/Solid 07/07/2010 12/07/2010 100712-18 1806302
M	mCERTS accredited.							
aq	Aqueous / settled sample.							
diss.filt	Dissolved / filtered sample.							
tot.unfilt	Total / unfiltered sample.							
*	subcontracted test.							
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.							
Component	LOD/Units	Method						
Naphthalene-d8 % recovery**	%	TM218	105	111	103	110	109	55.6
Acenaphthene-d10 % recovery**	%	TM218	103	111	102	110	109	56
Phenanthrene-d10 % recovery**	%	TM218	106	114	102	113	112	58.5
Chrysene-d12 % recovery**	%	TM218	91.8	97	84.7	102	99.2	51.5
Perylene-d12 % recovery**	%	TM218	102	106	89.4	113	107	54.7
Naphthalene	<9 µg/kg	TM218	140	261	657	412	1350	3160
Acenaphthylene	<12 µg/kg	TM218	694	610	1010	1430	2860	1450
Acenaphthene	<8 µg/kg	TM218	1340	210	283	407	336	2970
Fluorene	<10 µg/kg	TM218	933	412	309	1740	696	3760
Phenanthrene	<15 µg/kg	TM218	7480	2960	5460	11000	10500	106000
Anthracene	<16 µg/kg	TM218	2710	1490	2060	4320	4400	23400
Fluoranthene	<17 µg/kg	TM218	11500	13300	16800	23300	28900	178000
Pyrene	<15 µg/kg	TM218	12500	10700	14400	18000	25400	132000
Benzo(a)anthracene	<14 µg/kg	TM218	4160	6320	7280	12400	17700	64100
Chrysene	<10 µg/kg	TM218	3760	5840	6660	8760	14600	62200
Benzo(b)fluoranthene	<15 µg/kg	TM218	12100	8740	11200	11100	24900	84600
Benzo(k)fluoranthene	<14 µg/kg	TM218	4040	3430	4340	3990	9000	29300
Benzo(a)pyrene	<15 µg/kg	TM218	11100	7090	8600	8620	19000	52100
Indeno(1,2,3-cd)pyrene	<18 µg/kg	TM218	7260	4310	6240	3470	12900	36600
Dibenzo(a,h)anthracene	<23 µg/kg	TM218	1700	1210	1550	1310	3570	8900
Benzo(g,h,i)perylene	<24 µg/kg	TM218	10500	5150	7560	3390	14100	42600
Polyaromatic hydrocarbons, Total USEPA 16	<118 µg/kg	TM218	91900	72100	94400	114000	190000	830000

SDG: 100712-18
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Customer: BWB Consulting
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TPH CWG (S)

Results Legend		Customer Sample Ref.	WS4	WS6			
#	ISO17025 accredited.						
M	mCERTS accredited.						
aq	Aqueous / settled sample.						
diss.filt	Dissolved / filtered sample.						
tot.unfilt	Total / unfiltered sample.						
*	subcontracted test.						
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
		Depth (m)	1.00 - 1.50	0.30 - 1.00			
		Sample Type	Soil/Solid	Soil/Solid			
		Date Sampled	07/07/2010	07/07/2010			
		Date Received	12/07/2010	12/07/2010			
		SDG Ref	100712-18	100712-18			
		Lab Sample No.(s)	1806221	1806302			
Component	LOD/Units	Method					
GRO Surrogate % recovery**	%	TM089	68	27			
GRO >C5-C12	<44 µg/kg	TM089	486	142			
Benzene	<10 µg/kg	TM089	12	<10			
Ethylbenzene	<3 µg/kg	TM089	<3	<3	M	M	
Toluene	<2 µg/kg	TM089	<2	<2	M	M	
m,p-Xylene	<6 µg/kg	TM089	<6	<6	M	M	
o-Xylene	<3 µg/kg	TM089	<3	<3	M	M	
m,p,o-Xylene	<10 µg/kg	TM089	<10	<10	M	M	
BTEX, Total	<10 µg/kg	TM089	12	<10	M	M	
Methyl tertiary butyl ether (MTBE)	<5 µg/kg	TM089	<5	<5	#	#	
Aliphatics >C5-C6	<10 µg/kg	TM089	16.2	13			
Aliphatics >C6-C8	<10 µg/kg	TM089	219	23.9			
Aliphatics >C8-C10	<10 µg/kg	TM089	45.3	14.9			
Aliphatics >C10-C12	<10 µg/kg	TM089	50.3	21.6			
Aromatics >C6-C7	<10 µg/kg	TM089	12	<10			
Aromatics >C7-C8	<10 µg/kg	TM089	<10	<10			
Aromatics >EC8-EC10	<10 µg/kg	TM089	67.9	22.4			
Aromatics >EC10-EC12	<10 µg/kg	TM089	75.4	32.4			
Total Aliphatics >C5-C12	<10 µg/kg	TM089	331	73.4			
Total Aromatics >C6-C12	<10 µg/kg	TM089	155	54.8			
Aliphatics >C12-C16	<100 µg/kg	TM173	19700	15900			
Aliphatics >C16-C21	<100 µg/kg	TM173	28200	25700			
Aliphatics >C16-C35	<100 µg/kg	TM173	85600	95000			
Aliphatics >C21-C35	<100 µg/kg	TM173	57400	69200			
Aliphatics >C35-C44	<100 µg/kg	TM173	23900	38800			
Aromatics >EC12-EC16	<100 µg/kg	TM173	38700	25200			
Aromatics >EC16-EC21	<100 µg/kg	TM173	345000	663000			
Aromatics >EC21-EC35	<100 µg/kg	TM173	800000	1070000			
Aromatics >EC35-EC44	<100 µg/kg	TM173	191000	279000			
Aromatics >EC40-EC44	<100 µg/kg	TM173	66400	97800			
Total Aliphatics >C12-C44	<100 µg/kg	TM173	129000	150000			
Total Aromatics >EC12-EC44	<100 µg/kg	TM173	1370000	2040000			
Total Aliphatics >C5-35	<100 µg/kg	TM173	106000	111000			
Total Aliphatics >C5-C44	<100 µg/kg	TM173	130000	150000			
Total Aromatics >C5-35	<100 µg/kg	TM173	1180000	1760000			
Total Aromatics >C6-C44	<100 µg/kg	TM173	1370000	2040000			
Total Aliphatics & Aromatics >C5-35	<100 µg/kg	TM173	1290000	1870000			
Total Aliphatics & Aromatics >C5-C44	<100 µg/kg	TM173	1500000	2190000			

SDG: 100712-18
Job: H_BWB_NTT-84
Client Reference:
Location: THE DOVE WAY-NTE285

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91087

Results Legend		Customer Sample Ref.	WS7				
#	ISO17025 accredited.						
M	mCERTS accredited.						
aq	Aqueous / settled sample.						
diss.filt	Dissolved / filtered sample.						
tot.unfilt	Total / unfiltered sample.						
*	subcontracted test.						
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
		Depth (m)	1.60 - 2.00				
		Sample Type	Soil/Solid				
		Date Sampled	07/07/2010				
		Date Received	12/07/2010				
		SDG Ref	100712-18				
		Lab Sample No.(s)	1806335				
Component	LOD/Units	Method					
Phenols, Total monohydric	<0.22 mg/kg	TM062 (S)	<0.22				M
Sulphate, 2:1 water soluble	<0.003 g/l	TM098	1.44				M
Sulphur, Total	<0.02 %	TM132	0.526				#
Fraction Organic Carbon (FOC)	<0.002 -	TM132	0.00446				#
pH	1 pH Units	TM133	7.75				M
Cyanide, Total	<1 mg/kg	TM153	18.4				M
Cyanide, Free	<1 mg/kg	TM153	<1				
Cyanide, Complex	<1 mg/kg	TM153	18.4				
TPH >C6-C40	<10 mg/kg	TM154	<10				#
Arsenic	<0.6 mg/kg	TM181	44.2				M
Barium	<0.6 mg/kg	TM181	65.3				#
Beryllium	<0.01 mg/kg	TM181	0.686				M
Cadmium	<0.02 mg/kg	TM181	0.124				M
Chromium	<0.9 mg/kg	TM181	28.4				M
Copper	<1.4 mg/kg	TM181	13.6				M
Lead	<0.7 mg/kg	TM181	32.2				M
Mercury	<0.14 mg/kg	TM181	<0.14				M
Nickel	<0.2 mg/kg	TM181	19				M
Selenium	<1 mg/kg	TM181	1.39				#
Vanadium	<0.2 mg/kg	TM181	29				#
Zinc	<1.9 mg/kg	TM181	50.2				M
Boron, water soluble	<1 mg/kg	TM222	<1				M

SDG: 100712-18
Job: H_BWB_NTT-84
Client Reference:
Location: THE DOVE WAY-NTE285

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91087

PAH by GCMS

Results Legend		Customer Sample Ref.	WS7				
#	ISO17025 accredited.						
M	mCERTS accredited.						
aq	Aqueous / settled sample.						
diss.filt	Dissolved / filtered sample.						
tot.unfilt	Total / unfiltered sample.						
*	subcontracted test.						
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
		Depth (m)	1.60 - 2.00				
		Sample Type	Soil/Solid				
		Date Sampled	07/07/2010				
		Date Received	12/07/2010				
		SDG Ref	100712-18				
		Lab Sample No.(s)	1806335				
Component	LOD/Units	Method					
Naphthalene-d8 % recovery**	%	TM218	113				
Acenaphthene-d10 % recovery**	%	TM218	113				
Phenanthrene-d10 % recovery**	%	TM218	115				
Chrysene-d12 % recovery**	%	TM218	102				
Perylene-d12 % recovery**	%	TM218	112				
Naphthalene	<9 µg/kg	TM218	12.5				
Acenaphthylene	<12 µg/kg	TM218	<12				
Acenaphthene	<8 µg/kg	TM218	<8				
Fluorene	<10 µg/kg	TM218	<10				
Phenanthrene	<15 µg/kg	TM218	58.6				
Anthracene	<16 µg/kg	TM218	<16				
Fluoranthene	<17 µg/kg	TM218	105				
Pyrene	<15 µg/kg	TM218	74.8				
Benzo(a)anthracene	<14 µg/kg	TM218	62.4				
Chrysene	<10 µg/kg	TM218	71.4				
Benzo(b)fluoranthene	<15 µg/kg	TM218	116				
Benzo(k)fluoranthene	<14 µg/kg	TM218	40.3				
Benzo(a)pyrene	<15 µg/kg	TM218	39.2				
Indeno(1,2,3-cd)pyrene	<18 µg/kg	TM218	28.9				
Dibenzo(a,h)anthracene	<23 µg/kg	TM218	<23				
Benzo(g,h,i)perylene	<24 µg/kg	TM218	33.1				
Polyaromatic hydrocarbons, Total USEPA 16	<118 µg/kg	TM218	643				

SDG 100712-18
Job: H_BWB_NTT-84
Client Reference:
Location: THE DOVE WAY-NTE285

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91087

TPH CWG (S)

Results Legend		Customer Sample Ref.	WS7				
#	ISO17025 accredited.						
M	mCERTS accredited.						
aq	Aqueous / settled sample.						
diss.filt	Dissolved / filtered sample.						
tot.unfilt	Total / unfiltered sample.						
*	subcontracted test.						
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
		Depth (m)	1.60 - 2.00				
		Sample Type	Soil/Solid				
		Date Sampled	07/07/2010				
		Date Received	12/07/2010				
		SDG Ref	100712-18				
		Lab Sample No.(s)	1806335				
Component	LOD/Units	Method					
GRO Surrogate % recovery**	%	TM089	126				
GRO >C5-C12	<44 µg/kg	TM089	<44				
Benzene	<10 µg/kg	TM089	<10				
Ethylbenzene	<3 µg/kg	TM089	<3				
Toluene	<2 µg/kg	TM089	<2				
m,p-Xylene	<6 µg/kg	TM089	<6				
o-Xylene	<3 µg/kg	TM089	<3				
m,p,o-Xylene	<10 µg/kg	TM089	<10				
BTEX, Total	<10 µg/kg	TM089	<10				
Methyl tertiary butyl ether (MTBE)	<5 µg/kg	TM089	<5				
Aliphatics >C5-C6	<10 µg/kg	TM089	<10				
Aliphatics >C6-C8	<10 µg/kg	TM089	<10				
Aliphatics >C8-C10	<10 µg/kg	TM089	<10				
Aliphatics >C10-C12	<10 µg/kg	TM089	<10				
Aromatics >C6-C7	<10 µg/kg	TM089	<10				
Aromatics >C7-C8	<10 µg/kg	TM089	<10				
Aromatics >EC8-EC10	<10 µg/kg	TM089	<10				
Aromatics >EC10-EC12	<10 µg/kg	TM089	<10				
Total Aliphatics >C5-C12	<10 µg/kg	TM089	<10				
Total Aromatics >C6-C12	<10 µg/kg	TM089	<10				
Aliphatics >C12-C16	<100 µg/kg	TM173	1410				
Aliphatics >C16-C21	<100 µg/kg	TM173	1370				
Aliphatics >C16-C35	<100 µg/kg	TM173	5180				
Aliphatics >C21-C35	<100 µg/kg	TM173	3800				
Aliphatics >C35-C44	<100 µg/kg	TM173	1670				
Aromatics >EC12-EC16	<100 µg/kg	TM173	2100				
Aromatics >EC16-EC21	<100 µg/kg	TM173	13800				
Aromatics >EC21-EC35	<100 µg/kg	TM173	26700				
Aromatics >EC35-EC44	<100 µg/kg	TM173	8900				
Aromatics >EC40-EC44	<100 µg/kg	TM173	3540				
Total Aliphatics >C12-C44	<100 µg/kg	TM173	8260				
Total Aromatics >EC12-EC44	<100 µg/kg	TM173	51500				
Total Aliphatics >C5-35	<100 µg/kg	TM173	6590				
Total Aliphatics >C5-C44	<100 µg/kg	TM173	8260				
Total Aromatics >C5-35	<100 µg/kg	TM173	42600				
Total Aromatics >C6-C44	<100 µg/kg	TM173	51500				
Total Aliphatics & Aromatics >C5-35	<100 µg/kg	TM173	49200				
Total Aliphatics & Aromatics >C5-C44	<100 µg/kg	TM173	59800				

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.237	Moisture Content Ratio (%)	35.4
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	73.9
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805100
Sampled Date	08-Jul-2010
Customer Sample Ref.	TP117
Depth (m)	1.80

Solid Waste Analysis

Total Organic Carbon (%)	-
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	-
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Conc ⁿ in 2:1 eluate C ₂	2:1 conc ⁿ leached A ₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.00176	0.00352	-	-	-
Barium	0.0487	0.0974	-	-	-
Cadmium	0.000209	0.000418	-	-	-
Chromium	0.00184	0.00368	-	-	-
Copper	0.00858	0.0172	-	-	-
Mercury Dissolved (CVAF)	<0.00001	<0.00002	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.00313	0.00626	-	-	-
Lead	0.00248	0.00496	-	-	-
Antimony	-	-	-	-	-
Selenium	0.000887	0.00177	-	-	-
Zinc	0.0121	0.0242	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	90	180	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	17-Jul-2010
pH (pH Units)	7.10
Conductivity (µS/cm)	267.00
Temperature (°C)	21.10
Volume Leachant (Litres)	0.288
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.237	Moisture Content Ratio (%)	35.4
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	73.9
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805100
Sampled Date	08-Jul-2010
Customer Sample Ref.	TP117
Depth (m)	1.80

Solid Waste Analysis

Total Organic Carbon (%)	-	-	-
Loss on Ignition (%)	-	-	-
Sum of BTEX (mg/kg)	-	-	-
Sum of 7 PCBs (mg/kg)	-	-	-
Mineral Oil (mg/kg)	-	-	-
PAH Sum of 17 (mg/kg)	-	-	-
pH (pH Units)	-	-	-
ANC to pH 6 (mol/kg)	-	-	-
ANC to pH 4 (mol/kg)	-	-	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	0.000081	0.000162	-	-	-
Boron	0.301	0.602	-	-	-
pH	7.5	15	-	-	-
Total Cyanide (W)	<0.05	<0.1	-	-	-
Vanadium	0.00182	0.00364	-	-	-

Leach Test Information

Date Prepared	17-Jul-2010
pH (pH Units)	7.10
Conductivity (µS/cm)	267.00
Temperature (°C)	21.10
Volume Leachant (Litres)	0.288
Volume of Eluate VE1 (Litres)	

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

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Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.207	Moisture Content Ratio (%)	18.1
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	84.7
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805365
Sampled Date	08-Jul-2010
Customer Sample Ref.	TP119
Depth (m)	3.20

Solid Waste Analysis

Total Organic Carbon (%)	1.63
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	7.41
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.00236	0.00472	-	-	-
Barium	0.0737	0.147	-	-	-
Cadmium	<0.0001	<0.0002	-	-	-
Chromium	0.00279	0.00558	-	-	-
Copper	0.00502	0.01	-	-	-
Mercury Dissolved (CVAF)	<0.00001	<0.00002	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.0146	0.0292	-	-	-
Lead	0.000404	0.000808	-	-	-
Antimony	-	-	-	-	-
Selenium	0.00167	0.00334	-	-	-
Zinc	0.00989	0.0198	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	1080	2160	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	7.67
Conductivity (µS/cm)	1,850.00
Temperature (°C)	20.20
Volume Leachant (Litres)	0.318
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.207	Moisture Content Ratio (%)	18.1
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	84.7
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805365
Sampled Date	08-Jul-2010
Customer Sample Ref.	TP119
Depth (m)	3.20

Solid Waste Analysis

Total Organic Carbon (%)	1.63
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	7.41
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

-	-	-
-	-	-
-	-	-
-	-	-
-	-	-
-	-	-
-	-	-
-	-	-
-	-	-

Eluate Analysis

	Conc ⁿ in 2:1 eluate C ₂	2:1 conc ⁿ leached A ₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	<0.00007	<0.00014	-	-	-
Boron	0.793	1.59	-	-	-
pH	8.1	16	-	-	-
Total Cyanide (W)	<0.05	<0.1	-	-	-
Vanadium	0.00131	0.00262	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	7.67
Conductivity (µS/cm)	1,850.00
Temperature (°C)	20.20
Volume Leachant (Litres)	0.318
Volume of Eluate VE1 (Litres)	

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

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Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.220	Moisture Content Ratio (%)	26.2
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	79.3
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805459
Sampled Date	07-Jul-2010
Customer Sample Ref.	TP121
Depth (m)	0.90

Solid Waste Analysis

Total Organic Carbon (%)	-
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	-
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.00118	0.00236	-	-	-
Barium	0.0774	0.155	-	-	-
Cadmium	0.000184	0.000368	-	-	-
Chromium	0.0117	0.0234	-	-	-
Copper	0.0172	0.0344	-	-	-
Mercury Dissolved (CVAF)	<0.00001	<0.00002	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.00375	0.0075	-	-	-
Lead	0.00103	0.00206	-	-	-
Antimony	-	-	-	-	-
Selenium	0.00101	0.00202	-	-	-
Zinc	0.0111	0.0222	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	74.4	149	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	8.13
Conductivity (µS/cm)	413.00
Temperature (°C)	20.80
Volume Leachant (Litres)	0.304
Volume of Eluate VE1 (Litres)	

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

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Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.220	Moisture Content Ratio (%)	26.2
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	79.3
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805459
Sampled Date	07-Jul-2010
Customer Sample Ref.	TP121
Depth (m)	0.90

Solid Waste Analysis

Total Organic Carbon (%)	-	-	-
Loss on Ignition (%)	-	-	-
Sum of BTEX (mg/kg)	-	-	-
Sum of 7 PCBs (mg/kg)	-	-	-
Mineral Oil (mg/kg)	-	-	-
PAH Sum of 17 (mg/kg)	-	-	-
pH (pH Units)	-	-	-
ANC to pH 6 (mol/kg)	-	-	-
ANC to pH 4 (mol/kg)	-	-	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	<0.00007	<0.00014	-	-	-
Boron	0.343	0.686	-	-	-
pH	8.4	17	-	-	-
Total Cyanide (W)	<0.05	<0.1	-	-	-
Vanadium	0.00168	0.00336	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	8.13
Conductivity (µS/cm)	413.00
Temperature (°C)	20.80
Volume Leachant (Litres)	0.304
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.209	Moisture Content Ratio (%)	19.3
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	83.8
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805546
Sampled Date	07-Jul-2010
Customer Sample Ref.	TP123
Depth (m)	2.00

Solid Waste Analysis

Total Organic Carbon (%)	0.444
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	7.21
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.00168	0.00336	-	-	-
Barium	0.0758	0.152	-	-	-
Cadmium	<0.0001	<0.0002	-	-	-
Chromium	0.00274	0.00548	-	-	-
Copper	0.00765	0.0153	-	-	-
Mercury Dissolved (CVAF)	<0.00001	<0.00002	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.00293	0.00586	-	-	-
Lead	0.000655	0.00131	-	-	-
Antimony	-	-	-	-	-
Selenium	0.00142	0.00284	-	-	-
Zinc	0.00749	0.015	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	43.2	86.4	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	7.64
Conductivity (µS/cm)	165.00
Temperature (°C)	19.60
Volume Leachant (Litres)	0.316
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.209	Moisture Content Ratio (%)	19.3
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	83.8
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805546
Sampled Date	07-Jul-2010
Customer Sample Ref.	TP123
Depth (m)	2.00

Solid Waste Analysis

Total Organic Carbon (%)	0.444
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	7.21
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	0.000092	0.000184	-	-	-
Boron	0.922	1.84	-	-	-
pH	8	16	-	-	-
Total Cyanide (W)	<0.05	<0.1	-	-	-
Vanadium	0.00331	0.00662	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	7.64
Conductivity (µS/cm)	165.00
Temperature (°C)	19.60
Volume Leachant (Litres)	0.316
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.194	Moisture Content Ratio (%)	11.2
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	90.0
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805575
Sampled Date	08-Jul-2010
Customer Sample Ref.	TP134
Depth (m)	0.30

Solid Waste Analysis

Total Organic Carbon (%)	-
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	-
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.00586	0.0117	-	-	-
Barium	0.0127	0.0254	-	-	-
Cadmium	0.000129	0.000258	-	-	-
Chromium	0.00237	0.00474	-	-	-
Copper	0.0159	0.0318	-	-	-
Mercury Dissolved (CVAF)	0.0000372	0.0000744	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.00241	0.00482	-	-	-
Lead	0.00157	0.00314	-	-	-
Antimony	-	-	-	-	-
Selenium	0.00195	0.0039	-	-	-
Zinc	0.00408	0.00816	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	<3	<6	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	8.35
Conductivity (µS/cm)	251.00
Temperature (°C)	18.20
Volume Leachant (Litres)	0.330
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.194	Moisture Content Ratio (%)	11.2
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	90.0
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805575
Sampled Date	08-Jul-2010
Customer Sample Ref.	TP134
Depth (m)	0.30

Solid Waste Analysis

Total Organic Carbon (%)	-	-	-
Loss on Ignition (%)	-	-	-
Sum of BTEX (mg/kg)	-	-	-
Sum of 7 PCBs (mg/kg)	-	-	-
Mineral Oil (mg/kg)	-	-	-
PAH Sum of 17 (mg/kg)	-	-	-
pH (pH Units)	-	-	-
ANC to pH 6 (mol/kg)	-	-	-
ANC to pH 4 (mol/kg)	-	-	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	0.000143	0.000286	-	-	-
Boron	0.0419	0.0838	-	-	-
pH	8.5	17	-	-	-
Total Cyanide (W)	<0.05	<0.1	-	-	-
Vanadium	0.00471	0.00942	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	8.35
Conductivity (µS/cm)	251.00
Temperature (°C)	18.20
Volume Leachant (Litres)	0.330
Volume of Eluate VE1 (Litres)	

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

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Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.242	Moisture Content Ratio (%)	38.5
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	72.2
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805613
Sampled Date	08-Jul-2010
Customer Sample Ref.	TP135
Depth (m)	3.10

Solid Waste Analysis

Total Organic Carbon (%)	0.987
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	5.61
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.00381	0.00762	-	-	-
Barium	0.0418	0.0836	-	-	-
Cadmium	<0.0001	<0.0002	-	-	-
Chromium	0.0024	0.0048	-	-	-
Copper	0.00658	0.0132	-	-	-
Mercury Dissolved (CVAF)	<0.00001	<0.00002	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.00226	0.00452	-	-	-
Lead	0.00254	0.00508	-	-	-
Antimony	-	-	-	-	-
Selenium	0.00188	0.00376	-	-	-
Zinc	0.0166	0.0332	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	234	468	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	6.24
Conductivity (µS/cm)	459.00
Temperature (°C)	16.60
Volume Leachant (Litres)	0.283
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.242	Moisture Content Ratio (%)	38.5
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	72.2
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805613
Sampled Date	08-Jul-2010
Customer Sample Ref.	TP135
Depth (m)	3.10

Solid Waste Analysis

Total Organic Carbon (%)	0.987
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	5.61
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	0.000083	0.000166	-	-	-
Boron	0.667	1.33	-	-	-
pH	7.3	15	-	-	-
Total Cyanide (W)	0.25	0.5	-	-	-
Vanadium	0.00164	0.00328	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	6.24
Conductivity (µS/cm)	459.00
Temperature (°C)	16.60
Volume Leachant (Litres)	0.283
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.264	Moisture Content Ratio (%)	50.4
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	66.5
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805736
Sampled Date	08-Jul-2010
Customer Sample Ref.	TP137
Depth (m)	2.00

Solid Waste Analysis

Total Organic Carbon (%)	16.9
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	3.71
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.00339	0.00678	-	-	-
Barium	0.0338	0.0676	-	-	-
Cadmium	<0.0001	<0.0002	-	-	-
Chromium	0.000715	0.00143	-	-	-
Copper	0.00594	0.0119	-	-	-
Mercury Dissolved (CVAF)	<0.00001	<0.00002	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.0014	0.0028	-	-	-
Lead	0.00155	0.0031	-	-	-
Antimony	-	-	-	-	-
Selenium	0.000833	0.00167	-	-	-
Zinc	0.0155	0.031	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	404	808	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	6.28
Conductivity (µS/cm)	803.00
Temperature (°C)	20.10
Volume Leachant (Litres)	0.262
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.264	Moisture Content Ratio (%)	50.4
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	66.5
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805736
Sampled Date	08-Jul-2010
Customer Sample Ref.	TP137
Depth (m)	2.00

Solid Waste Analysis

Total Organic Carbon (%)	16.9
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	3.71
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	<0.00007	<0.00014	-	-	-
Boron	0.104	0.208	-	-	-
pH	6.7	13	-	-	-
Total Cyanide (W)	2.36	4.72	-	-	-
Vanadium	0.000799	0.0016	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	6.28
Conductivity (µS/cm)	803.00
Temperature (°C)	20.10
Volume Leachant (Litres)	0.262
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.188	Moisture Content Ratio (%)	7.30
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	93.2
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1805932
Sampled Date	07-Jul-2010
Customer Sample Ref.	WS3
Depth (m)	0.10 - 0.90

Solid Waste Analysis

Total Organic Carbon (%)	1.55
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	8.52
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.00581	0.0116	-	-	-
Barium	0.0726	0.145	-	-	-
Cadmium	<0.0001	<0.0002	-	-	-
Chromium	0.00353	0.00706	-	-	-
Copper	0.018	0.036	-	-	-
Mercury Dissolved (CVAF)	<0.00001	<0.00002	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.00545	0.0109	-	-	-
Lead	0.000735	0.00147	-	-	-
Antimony	-	-	-	-	-
Selenium	0.00702	0.014	-	-	-
Zinc	0.00418	0.00836	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	257	514	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	7.99
Conductivity (µS/cm)	708.00
Temperature (°C)	20.00
Volume Leachant (Litres)	0.337
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference

Mass Sample taken (kg) 0.188
 Mass of dry sample (kg) 0.175
 Particle Size <4mm >95%

Client Location

Moisture Content Ratio (%) 7.30
 Dry Matter Content Ratio (%) 93.2

THE DOVE WAY-NTE285

Case

SDG 100712-18
 Lab Sample Number(s) 1805932
 Sampled Date 07-Jul-2010
 Customer Sample Ref. WS3
 Depth (m) 0.10 - 0.90

Solid Waste Analysis

Total Organic Carbon (%) 1.55
 Loss on Ignition (%) -
 Sum of BTEX (mg/kg) -
 Sum of 7 PCBs (mg/kg) -
 Mineral Oil (mg/kg) -
 PAH Sum of 17 (mg/kg) -
 pH (pH Units) 8.52
 ANC to pH 6 (mol/kg) -
 ANC to pH 4 (mol/kg) -

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Eluate Analysis

	Conc ⁿ in 2:1 eluate C ₂	2:1 conc ⁿ leached A ₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	<0.00007	<0.00014	-	-	-
Boron	0.396	0.792	-	-	-
pH	8.4	17	-	-	-
Total Cyanide (W)	0.09	0.18	-	-	-
Vanadium	0.013	0.026	-	-	-

Leach Test Information

Date Prepared 16-Jul-2010
 pH (pH Units) 7.99
 Conductivity (µS/cm) 708.00
 Temperature (°C) 20.00
 Volume Leachant (Litres) 0.337
 Volume of Eluate VE1 (Litres)

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.197	Moisture Content Ratio (%)	12.8
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	88.7
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1806152
Sampled Date	07-Jul-2010
Customer Sample Ref.	WS4
Depth (m)	0.10 - 0.50

Solid Waste Analysis

Total Organic Carbon (%)	9.25
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	8.11
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.00263	0.00526	-	-	-
Barium	0.0615	0.123	-	-	-
Cadmium	0.000347	0.000694	-	-	-
Chromium	0.00581	0.0116	-	-	-
Copper	0.0126	0.0252	-	-	-
Mercury Dissolved (CVAF)	<0.00001	<0.00002	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.00407	0.00814	-	-	-
Lead	0.00194	0.00388	-	-	-
Antimony	-	-	-	-	-
Selenium	0.00241	0.00482	-	-	-
Zinc	0.00236	0.00472	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	66	132	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	8.24
Conductivity (µS/cm)	341.00
Temperature (°C)	20.70
Volume Leachant (Litres)	0.328
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.197	Moisture Content Ratio (%)	12.8
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	88.7
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1806152
Sampled Date	07-Jul-2010
Customer Sample Ref.	WS4
Depth (m)	0.10 - 0.50

Solid Waste Analysis

Total Organic Carbon (%)	9.25
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	8.11
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	<0.00007	<0.00014	-	-	-
Boron	0.0531	0.106	-	-	-
pH	8.5	17	-	-	-
Total Cyanide (W)	1.24	2.48	-	-	-
Vanadium	0.0031	0.0062	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	8.24
Conductivity (µS/cm)	341.00
Temperature (°C)	20.70
Volume Leachant (Litres)	0.328
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference		Client Location	THE DOVE WAY-NTE285
Mass Sample taken (kg)	0.197	Moisture Content Ratio (%)	12.3
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	89.0
Particle Size <4mm	>95%		

Case

SDG	100712-18
Lab Sample Number(s)	1806302
Sampled Date	07-Jul-2010
Customer Sample Ref.	WS6
Depth (m)	0.30 - 1.00

Solid Waste Analysis

Total Organic Carbon (%)	23.6
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	<0.01
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	8.11
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.0011	0.0022	-	-	-
Barium	0.0336	0.0672	-	-	-
Cadmium	<0.0001	<0.0002	-	-	-
Chromium	0.00297	0.00594	-	-	-
Copper	0.00486	0.00972	-	-	-
Mercury Dissolved (CVAF)	<0.00001	<0.00002	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.00196	0.00392	-	-	-
Lead	0.000045	0.00009	-	-	-
Antimony	-	-	-	-	-
Selenium	0.0037	0.0074	-	-	-
Zinc	0.00142	0.00284	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	97.8	196	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	16-Jul-2010
pH (pH Units)	7.59
Conductivity (µS/cm)	384.00
Temperature (°C)	17.90
Volume Leachant (Litres)	0.328
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

Table of Results - Appendix

SDG Number : 100712-18

Client : BWB Consulting

Client Ref :

REPORT KEY

NDP	No Determination Possible	#	ISO 17025 Accredited	*	Subcontracted Test	M	MCERTS Accredited
NFD	No Fibres Detected	PFD	Possible Fibres Detected	»	Result previously reported (Incremental reports only)	EC	Equivalent Carbon (Aromatics C8-C35)

Note: Method detection limits are not always achievable due to various circumstances beyond our control

Method No	Reference	Description	Wet/Dry Sample ¹
PM001		Preparation of Samples for Metals Analysis	Dry
PM024	Modified BS 1377	Soil preparation including homogenisation, moisture screens of soils for Asbestos Containing Material	Wet
PM114		Leaching Procedure for CEN Two Stage Batch Test 2:1/8:1 Cumulative	
PM115		Leaching Procedure for CEN One Stage Leach Test 2:1 & 10:1 1 Step	
TM001	In - house Method	Determination of asbestos containing material by screening on solids	
TM062 (S)	National Grid Property Holdings Methods for the Collection & Analysis of Samples from National Grid Sites version 1 Sec 3.9	Determination of Phenols in Soils by HPLC	Wet
TM089	Modified: US EPA Methods 8020 & 602	Determination of Gasoline Range Hydrocarbons (GRO) and BTEX (MTBE) compounds by Headspace GC-FID (C4-C12)	
TM098	Method 4500E, AWWA/APHA, 20th Ed., 1999	Determination of Sulphate using the Kone Analyser	Dry
TM116	Modified: US EPA Method 8260, 8120, 8020, 624, 610 & 602	Determination of Volatile Organic Compounds by Headspace / GC-MS	
TM132	In - house Method	ELTRA CS800 Operators Guide	Dry
TM133	BS 1377: Part 3 1990;BS 6068-2.5	Determination of pH in Soil and Water using the GLpH pH Meter	Wet
TM152	Method 3125B, AWWA/APHA, 20th Ed., 1999	Analysis of Aqueous Samples by ICP-MS	
TM153	Method 4500A,B,C, I, M AWWA/APHA, 20th Ed., 1999	Determination of Total Cyanide, Free (Easily Liberatable) Cyanide and Thiocyanate using the "Skalar SANS+ System" Segmented Flow Analyser	Wet
TM154	In - house Method	Determination of Petroleum Hydrocarbons by EZ Flash GC-FID in the Carbon range C6- C40	Wet
TM173	Analysis of Petroleum Hydrocarbons in Environmental Media – Total Petroleum Hydrocarbon Criteria	Determination of Speciated Extractable Petroleum Hydrocarbons in Soils by GC-FID	Dry
TM181	US EPA Method 6010B	Determination of Routine Metals in Soil by iCap 6500 Duo ICP-OES	Dry
TM183	BS EN 23506:2002, (BS 6068-2.74:2002) ISBN 0 580 38924 3	Determination of Trace Level Mercury in Waters and Leachates by PSA Cold Vapour Atomic Fluorescence Spectrometry	
TM184	EPA Methods 325.1 & 325.2,	The Determination of Anions in Aqueous Matrices using the Kone Spectrophotometric Analysers	Dry
TM218	Microwave extraction – EPA method 3546	Microwave extraction - EPA method 3546	Wet
TM222	In-House Method	Determination of Hot Water Soluble Boron in Soils (10:1 Water:soil) by IRIS Emission Spectrometer	Dry
TM227	Standard methods for the examination of waters and wastewaters 20th Edition, AWWA/APHA Method 4500.	Determination of Total Cyanide, Free (Easily Liberatable) Cyanide and Thiocyanate	
TM256	The measurement of Electrical Conductivity and the Laboratory determination of pH Value of Natural, Treated and Wastewaters. HMSO, 1978. ISBN 011 751428 4.	Determination of pH in Water and Leachate using the GLpH pH Meter	

¹ Applies to Solid samples only. DRY indicates samples have been dried at 35°C. NA = not applicable.

Notification of NDPs (No determination possible)

SDG Number	100712-18	Location	THE DOVE WAY-NTE285
Client	H_BWB_NTT	Order No.	NE09/616
Client Reference		Report No.	53069-1
Attention	Richard Robinson	Date Received	12/07/2010 08:34:21

Sample No	Customer Sample Ref.	Depth (m)	Test	Comment
1805736	TP137	2.00	Total Sulphur	Sample unsuitable for analysis

APPENDIX

APPENDIX

1. Results are expressed on a dry weight basis (dried at 35°C) for all soil analyses except for the following:
NRA Leach tests, flash point, ammonium as NH₄ by the BRE method, VOC TICS, SVOC TICS, TOF-MS SCAN/SEARCH and TOF-MS TICS.
2. Samples will be run in duplicate upon request, but an additional charge may be incurred.
3. If sufficient sample is received a sub sample will be retained free of charge for 30 days after analysis is completed (e-mailed) for both soil jars, tubs and volatile jars. All waters and vials will be discarded 10 days after the analysis is completed (e-mailed). All material removed during an asbestos containing material screen and analysed for the presence of asbestos will be retained for a period of 6 months after the analysis date. All samples received and not scheduled will be disposed of one month after the date of receipt unless we are instructed to the contrary. Once the initial period has expired, a storage charge will be applied for each month or part thereof until the client cancels the request for sample storage. ALcontrol Laboratories reserve the right to charge for samples received and stored but not analysed.
4. With respect to turnaround, we will always endeavour to meet client requirements wherever possible, but turnaround times cannot be absolutely guaranteed due to so many variables beyond our control.
5. We take responsibility for any test performed by sub-contractors (marked with an asterisk). We endeavour to use UKAS/MCERTS Accredited Laboratories, who either complete a quality questionnaire or are audited by ourselves. For some determinands there are no UKAS/MCERTS Accredited Laboratories, in this instance a laboratory with a known track record will be utilised.
6. When requested, the individual sub sample scheduled will be screened in house for the presence of large asbestos containing material fragments/pieces. If no asbestos containing material is found this will be reported as 'no asbestos containing material detected'. If asbestos containing material is detected it will be removed and analysed by our documented in house method TM048 based on HSG 248 (2005), which is accredited to ISO17025. If asbestos containing material is present no further analysis will be undertaken. At no point is the fibre content of the soil sample determined.
7. If no separate volatile sample is supplied by the client, the integrity of the data may be compromised if the laboratory is required to create a sub-sample from the bulk sample – similarly, if a headspace or sediment is present in the volatile sample. This will be flagged up as an invalid VOC on the test schedule or recorded on the log sheet.
8. If appropriate preserved bottles are not received preservation will take place on receipt. However, the integrity of the data may be compromised.
9. NDP – No determination possible due to insufficient/unsuitable sample.
10. Metals in water are performed on a filtered sample, and therefore represent dissolved metals – total metals must be requested separately.
11. A table containing the date of analysis for each parameter is not routinely included with the report, but is available upon request.
12. Results relate only to the items tested
13. **Surrogate recoveries** – Most of our organic methods include surrogates, the recovery of which is monitored and reported.
For EPH, MO, PAH, GRO and VOCs on soils the result is not surrogate corrected, but a percentage recovery is quoted. Acceptable limits for most organic methods are 70 – 130 %.
14. **Product analyses** – Organic analyses on products can only be semi-quantitative due to the matrix effects and high dilution factors employed.
15. Phenols monohydric by HPLC include phenol, cresols (2-Methylphenol, 3-Methylphenol and 4-Methylphenol) and Xylenols (2,3 Dimethylphenol, 2,4 Dimethylphenol, 2,5 Dimethylphenol, 2,6 Dimethylphenol, 3,4 Dimethylphenol, 3,5 Dimethylphenol).
16. Total of 5 speciated phenols by HPLC includes Phenol, 2,3,5-Trimethyl Phenol, 2-Isopropylphenol, Cresols and Xylenols (as detailed in 14).
17. Stones/debris are not routinely removed. We always endeavour to take a representative sub sample from the received sample.
18. Our MCERTS accreditation for PAHs by GCMS applies to all product types apart from Kerosene, where naphthalene only is not accredited.
19. In certain circumstances the method detection limit may be elevated due to the sample being outside the calibration range. Other factors that may contribute to this include possible interferences. In both cases the sample would be diluted which would cause the method detection limit to be raised.
19. Mercury results quoted on soils will not include volatile mercury as the analysis is performed on a dried and crushed sample.
20. For the BSEN 12457-3 two batch process to allow the cumulative release to be calculated, the volume of the leachate produced is measured and filtered for all tests. We therefore cannot carry out any unfiltered analysis. The tests affected include volatiles GCFID/GCMS and all subcontracted analysis.
21. For all leachate preparations (NRA, DIN, TCLP, BSEN 12457-1, 2, 3) volatile loss may occur, as we do not employ zero headspace extraction.
22. We are accredited to MCERTS for sand, clay and loam/topsoil, or any of these materials – whether these are derived from naturally occurring soil profiles, or from fill/made ground, as long as these materials constitute the major part of the sample. Other coarse granular material such as concrete, gravel and brick are not accredited if they comprise the major part of the sample.
23. Analysis and identification of specific compounds using GCFID is by retention time only, and we routinely calibrate and quantify for benzene, toluene, ethylbenzenes and xylenes (BTEX). For total volatiles in the C4 – C10 range, the total area of the chromatogram is integrated and expressed as ug/kg or ug/l. Although this analysis is commonly used for the quantification of gasoline range organics (GRO), the system will also detect other compounds such as chlorinated solvents, and this may lead to a falsely high result with respect to hydrocarbons only. It is not possible to specifically identify these non-hydrocarbons, as standards are not routinely run for any other compounds, and for more definitive identification, volatiles by GCMS should be utilised.

LIQUID MATRICES EXTRACTION SUMMARY

ANALYSIS	EXTRACTION SOLVENT	EXTRACTION METHOD	ANALYSIS
PAH MS	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC MS
EPH	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC FID
EPH CWG	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC FID
MINERAL OIL	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC FID
PCB 7 CONGENERS	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC MS
PCB TOTAL	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GS MS
SVOC	DCM	LIQUID/LIQUID SHAKE	GC MS
FREE SULPHUR	DCM	SOLID PHASE EXTRACTION	HPLC
PEST OCP/OPP	DCM	LIQUID/LIQUID SHAKE	GC MS
TRIAZINE HERBS	DCM	LIQUID/LIQUID SHAKE	GC MS
PHENOLS MS	DCM	SOLID PHASE EXTRACTION	GC MS
TPH by INFRA RED (IR)	TCE	LIQUID/LIQUID EXTRACTION	HPLC
MINERAL OIL by IR	TCE	LIQUID/LIQUID EXTRACTION	HPLC
GLYCOLS	NONE	DIRECT INJECTION	GC FID

SOLID MATRICES EXTRACTION SUMMARY

ANALYSIS	D/C OR WET	EXTRACTION SOLVENT	EXTRACTION METHOD	ANALYSIS
Solvent Extractable Matter	D&C	DCM	SOX THERM	GRAVIMETRIC
Cyclohexane Ext. Matter	D&C	CYCLOHEXANE	SOX THERM	GRAVIMETRIC
Thin Layer Chromatography	D&C	DCM	SOX THERM	IATROSCAN
Elemental Sulphur	D&C	DCM	SOX THERM	HPLC
Phenols by GCMS	WET	DCM	SOX THERM	GC-MS
Herbicides	D&C	HEXANE:ACETONE	SOX THERM	GC-MS
Pesticides	D&C	HEXANE:ACETONE	SOX THERM	GC-MS
EPH (DRO)	D&C	HEXANE:ACETONE	END OVER END	GC-FID
EPH (Min oil)	D&C	HEXANE:ACETONE	END OVER END	GC-FID
EPH (Cleaned up)	D&C	HEXANE:ACETONE	END OVER END	GC-FID
EPH CWG by GC	D&C	HEXANE:ACETONE	END OVER END	GC-FID
PCB tot / PCB con	D&C	HEXANE:ACETONE	END OVER END	GC-MS
Polyaromatic Hydrocarbons (MS)	WET	HEXANE:ACETONE	Microwave TM218.	GC-MS
C8-C40 (C6-C40)EZ Flash	WET	HEXANE:ACETONE	SHAKER	GC-EZ
Polyaromatic Hydrocarbons Rapid GC	WET	HEXANE:ACETONE	SHAKER	GC-EZ
Semi Volatile Organic Compounds	WET	DCM:ACETONE	SONICATE	GC-MS

Identification of Asbestos in Bulk Materials

The results for asbestos identification for soil samples are obtained from possible Asbestos Containing Material, removed during the 'Screening of soils for Asbestos Containing Materials', which have been examined to determine the presence of asbestos fibres using Alcontrol Laboratories (Hawarden) in-house method of transmitted/polarised light microscopy and central stop dispersion staining, based on HSG 248 (2005).

Visual Estimation Of Fibre Content.

Estimation of fibre content is not permitted as part of our UKAS accredited test other than: -

Trace – Where only one or two asbestos fibres were identified.

Further guidance on typical asbestos fibre content of manufactured products can be found in MDHS 100.

The identification of asbestos containing materials falls within our schedule of tests for which we hold UKAS accreditation, however opinions, interpretations and all other information contained in the report are outside the scope of UKAS accreditation.

Asbestos Type

Common Name

Chrysotile	White Asbestos
Amosite	Brown Asbestos
Crocidolite	Blue Asbestos
Fibrous Actinolite	-
Fibrous Anthophyllite	-
Fibrous Tremolite	-



BWB Consulting
3-4 Kayes Walk
The Lace Market
Nottingham
Nottinghamshire
NG1 1PY

Attention: Richard Robinson

CERTIFICATE OF ANALYSIS

Date: 21 July 2010
Customer: H_BWB_NTT-81
Sample Delivery Group (SDG): 100708-104 **Report No.:** 91025
Your Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

We received 49 samples on Thursday July 08, 2010 and 28 of these samples were scheduled for analysis which was completed on Wednesday July 21, 2010. Accredited laboratory tests are defined within the report, but opinions, interpretations and on-site data expressed herein are outside the scope of ISO 17025 accreditation.

Should this report require incorporation into client reports, it must be used in its entirety and not simply with the data sections alone.

All chemical testing (unless subcontracted) is performed at ALcontrol Hawarden Laboratories.

Asbestos testing - we are not accredited for screening soil samples for asbestos fibres. We are only accredited to identify asbestos fibres in bulk material (ACM).

Approved By:

Iain Swinton

Operations Director - Land UK & Ireland



SDG:	100708-104	Customer:	BWB Consulting
Job:	H_BWB_NTT-81	Attention:	Richard Robinson
Client Reference:	NTE 285	Order No.:	NE09/616
Location:	THE DOVE WAY UTTOXETER	Report No.:	91025

Received Sample Overview

Lab Sample No(s)	Customer Sample Ref.	Depth (m)	Sampled Date
1795358	TP101	0.20	05/07/2010
1795377	TP101	2.00	05/07/2010
1795474	TP102	1.00	05/07/2010
1795508	TP103	0.50	05/07/2010
1795533	TP103	2.00	05/07/2010
1795553	TP104	0.60	05/07/2010
1795581	TP105	0.70	05/07/2010
1795611	TP105	2.80	05/07/2010
1795655	TP106		05/07/2010
1795636	TP106	0.20	05/07/2010
1795674	TP107	0.60	05/07/2010
1795713	TP107	1.30	05/07/2010
1795808	TP108	0.50	06/07/2010
1795815	TP108	2.20	06/07/2010
1796216	TP110	0.80	07/07/2010
1796239	TP110	2.60	07/07/2010
1796247	TP111	0.40	07/07/2010
1796796	TP111	2.80	07/07/2010
1796270	TP112	0.80	07/07/2010
1796289	TP112	2.80	07/07/2010
1796306	TP113	0.30	07/07/2010
1796353	TP113	3.00	07/07/2010
1796622	TP116	0.20	07/07/2010
1796327	TP116	1.80	07/07/2010
1795825	TP124	0.80	06/07/2010
1795821	TP124	1.80	06/07/2010
1795848	TP125	0.50	06/07/2010
1796508	TP125	1.70	06/07/2010
1796957	TP125	2.20	06/07/2010
1796053	TP126	0.30	06/07/2010
1796418	TP126	2.20	06/07/2010
1796032	TP127	1.10	06/07/2010
1796087	TP127	2.00	06/07/2010
1796743	TP128	0.40	06/07/2010
1796970	TP128	0.50	06/07/2010
1796662	TP128	1.50	06/07/2010
1796720	TP129	0.60	06/07/2010
1796809	TP129	1.80	06/07/2010
1796767	TP130	0.20	06/07/2010
1796471	TP130	1.70	06/07/2010
1796700	TP131	0.75	06/07/2010
1796382	TP131	1.50	06/07/2010
1796784	TP132	0.60	06/07/2010

SDG:	100708-104	Customer:	BWB Consulting
Job:	H_BWB_NTT-81	Attention:	Richard Robinson
Client Reference:	NTE 285	Order No.:	NE09/616
Location:	THE DOVE WAY UTTOXETER	Report No:	91025

1796587	TP133	0.60	06/07/2010
1796440	TP133	1.80	06/07/2010
1796915	WS2	0.10 - 0.80	07/07/2010
1796928	WS2	1.10 - 1.50	07/07/2010

Only received samples which have had analysis scheduled will be shown on the following pages.

SDG: 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

SOLID

Results Legend	Lab Sample No(s)	Customer Sample Ref.	Depth (m)	Container
	<p>X Test</p> <p>N No Determination Possible</p>	1796662	TP128	1.50
	1796622	TP116	0.20	250g Amber Jar 19g Tub
	1796587	TP133	0.80	250g Amber Jar 89g VOC
	1796508	TP125	1.70	250g Amber Jar 89g VOC
	1796418	TP126	2.20	250g Amber Jar 40g Tub
	1796327	TP116	1.80	250g Amber Jar 89g VOC
	1796289	TP112	2.80	250g Amber Jar 40g Tub
	1796270	TP112	0.80	250g Amber Jar 89g VOC
	1796247	TP111	0.40	250g Amber Jar 19g Tub
	1796216	TP110	0.80	250g Amber Jar 19g Tub
	1796087	TP127	2.00	250g Amber Jar 40g Tub
	1795825	TP124	0.80	250g Amber Jar 19g Tub
	1795821	TP124	1.80	250g Amber Jar 89g VOC
	1795674	TP107	0.80	250g Amber Jar 40g Tub
	1795636	TP106	0.20	250g Amber Jar 40g Tub
	1795581	TP105	0.70	250g Amber Jar 40g Tub
	1795533	TP103	2.00	250g Amber Jar 40g Tub
	1795474	TP102	1.00	250g Amber Jar 40g Tub
	1795358	TP101	0.20	250g Amber Jar 40g Tub
Anions by Kone (w)	All			
Asbestos Containing Material Screen	All			
Boron Water Soluble	All			
CEN Readings	All			
Cyanide Complex/Free/Total/Thiocyan	All			
Cyanides Complex/Free/Total/Thiocya	Cyanide, Complex			
	Cyanide, Free			
	Cyanide, Total			
Dissolved Metals by ICP-MS	All			
EPH CWG (Aliphatic) GC (S)	All			
EPH CWG (Aromatic) GC (S)	All			
GRO BTEX MTBE GC (S)	All			
Mercury Dissolved	All			
Metals by iCap-OES (Soil)	Arsenic			
	Barium			
	Beryllium			
	Cadmium			
	Chromium			
	Copper			
	Lead			
	Mercury			
	Nickel			
	Selenium			

SDG: 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

Sample ID	Depth (m)	Sample Description	1796682	1796622	1796687	1796508	1796418	1796353	1796327	1796289	1796270	1796247	1796216	1796087	1796825	1796821	1796674	1796636	1796581	1796533	1796474	1796368
Sample ID	Depth (m)	Sample Description	TP128	TP116	TP133	TP125	TP126	TP113	TP116	TP112	TP112	TP111	TP110	TP127	TP124	TP124	TP107	TP106	TP105	TP103	TP102	TP101
Sample ID	Depth (m)	Sample Description	1.50	0.20	0.80	1.70	2.20	3.00	1.80	2.80	0.80	0.40	0.80	2.00	0.80	1.80	0.80	0.20	0.70	2.00	1.00	0.20
Sample ID	Depth (m)	Sample Description	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar	250g Amber Jar
Metals by iCap-OES (Soil)	Vanadium		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
	Zinc		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
PAH by GCMS	All		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
pH	All		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
pH Value	All		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
Phenols by HPLC (S)	All		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
Sample description	All		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
Total Organic Carbon	All		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
Total Sulphur	All		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
TPH C6-C40 Value of soil	All		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
TPH CWG GC (S)	All		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
VOC MS (S)	All		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
Water Soluble Sulphate 2:1	All		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X

SDG: 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

Sample Descriptions

Grain Sizes:

<0.063mm very fine,
0.063mm - 0.1mm fine,
0.1mm - 2mm medium,
2mm - 10mm coarse,
>10mm very coarse

Lab Sample No(s)	Customer Sample Ref.	Depth (m)	Colour	Description	Grain size	Inclusions
1795358	TP101	0.20	Dark Brown	Sandy Clay	0.1 - 2 mm	Stones
1795474	TP102	1.00	Light Brown	Clay	<0.063 mm	Vegetation
1795533	TP103	2.00	Dark Brown	Sand	0.1 - 2 mm	Stones
1795581	TP105	0.70	Orange	Silty Clay	0.063 - 0.1 mm	N/A
1795636	TP106	0.20	Dark Brown	Silt Loam	0.063 - 0.1 mm	Vegetation
1795674	TP107	0.60	Light Brown	Clay Loam	<0.063 mm	None
1795821	TP124	1.80	Dark Brown	Sand	0.1 - 2 mm	Stones
1795825	TP124	0.80	Dark Brown	Silty Clay	0.063 - 0.1 mm	N/A
1796087	TP127	2.00	Light Brown	Sand	0.1 - 2 mm	Stones
1796216	TP110	0.80	Black	Silt	<0.063 mm	N/A
1796247	TP111	0.40	Dark Brown	Sandy Silt Loam	0.1 - 2 mm	Stones
1796270	TP112	0.80	Dark Brown	Silty Clay	0.063 - 0.1 mm	Stones
1796289	TP112	2.80	Dark Brown	Sandy Clay	0.1 - 2 mm	Stones
1796327	TP116	1.80	Dark Brown	Silty Clay Loam	0.063 - 0.1 mm	Stones
1796353	TP113	3.00	Light Brown	Silty Sand	0.063 - 0.1 mm	Stones
1796418	TP126	2.20	Dark Brown	Sandy Clay	0.063 - 0.1 mm	Stones
1796508	TP125	1.70	Light Brown	Silty Sand	0.063 - 0.1 mm	Stones
1796587	TP133	0.60	Orange	Sand	0.1 - 2 mm	Stones
1796622	TP116	0.20	Light Brown	Clay Loam	0.063 - 0.1 mm	Stones
1796662	TP128	1.50	Dark Brown	Loamy Sand	0.1 - 2 mm	Stones
1796720	TP129	0.60	Light Brown	Clay Loam	0.063 - 0.1 mm	Vegetation
1796743	TP128	0.40	Light Brown	Clay	<0.063 mm	N/A
1796767	TP130	0.20	Light Brown	Silty Sand	0.1 - 2 mm	Brick
1796784	TP132	0.60	Light Brown	Silty Clay	0.063 - 0.1 mm	N/A
1796796	TP111	2.80	Light Brown	Clay Loam	0.063 - 0.1 mm	Stones
1796809	TP129	1.80	Dark Brown	Silt Loam	0.063 - 0.1 mm	Stones
1796915	WS2	0.10 - 0.80	Light Brown	Sandy Silt Loam	0.063 - 0.1 mm	Stones
1796928	WS2	1.10 - 1.50	Dark Brown	Silty Clay	0.063 - 0.1 mm	Stones

SDG:	100708-104	Customer:	BWB Consulting
Job:	H_BWB_NTT-81	Attention:	Richard Robinson
Client Reference:	NTE 285	Order No.:	NE09/616
Location:	THE DOVE WAY UTTOXETER	Report No.:	91025

These descriptions are only intended to act as a cross check if sample identities are questioned, and to provide a log of sample matrices with respect to MCERTS validation. They are not intended as full geological descriptions.

We are accredited to MCERTS for sand, clay and loam/topsoil, or any of these materials - whether these are derived from naturally occurring soil profiles, or from fill/made ground, as long as these materials constitute the major part of the sample.

Other coarse granular materials such as concrete, gravel and brick are not accredited if they comprise the major part of the sample.

SDG: 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

Test Completion dates

SDG reference: 100708-104

Lab Sample No(s)	1795358	1795474	1795533	1795581	1795636	1795674	1795821	1795825	1796087	1796216	1796247	1796270
Customer Sample Ref.	TP101	TP102	TP103	TP105	TP106	TP107	TP124	TP124	TP127	TP110	TP111	TP112
Depth	0.20	1.00	2.00	0.70	0.20	0.60	1.80	0.80	2.00	0.80	0.40	0.80
Type	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID
Anions by Kone (w)			15/07/2010						15/07/2010		16/07/2010	
Asbestos Containing Material Screen										14/07/2010		
Boron Water Soluble	14/07/2010	14/07/2010		14/07/2010	15/07/2010	15/07/2010		16/07/2010		16/07/2010		
CEN Readings			16/07/2010						16/07/2010		16/07/2010	
Cyanide Comp/Free/Total/Thiocyanate	14/07/2010	15/07/2010	16/07/2010	14/07/2010	15/07/2010	15/07/2010		16/07/2010	16/07/2010	15/07/2010	16/07/2010	
Dissolved Metals by ICP-MS			16/07/2010						16/07/2010		16/07/2010	
EPH CWG (Aliphatic) GC (S)							20/07/2010					19/07/2010
EPH CWG (Aromatic) GC (S)							20/07/2010					19/07/2010
GRO BTEX MTBE GC (S)							19/07/2010					20/07/2010
Mercury Dissolved			16/07/2010						16/07/2010		16/07/2010	
Metals by iCap-OES (Soil)	15/07/2010	15/07/2010		15/07/2010	16/07/2010	15/07/2010		15/07/2010		15/07/2010		
Moisture Meter			14/07/2010						14/07/2010		14/07/2010	
PAH by GCMS	14/07/2010	14/07/2010		14/07/2010	15/07/2010	15/07/2010		15/07/2010		16/07/2010		
pH	14/07/2010	14/07/2010		14/07/2010	15/07/2010	15/07/2010		15/07/2010		14/07/2010		
pH Value			15/07/2010						15/07/2010		16/07/2010	
Phenols by HPLC (S)	14/07/2010	14/07/2010		15/07/2010	15/07/2010	15/07/2010		16/07/2010		15/07/2010		
Sample description	13/07/2010	13/07/2010	13/07/2010	13/07/2010	14/07/2010	14/07/2010	14/07/2010	14/07/2010	13/07/2010	14/07/2010	13/07/2010	14/07/2010
Total Organic Carbon	15/07/2010	15/07/2010		15/07/2010	15/07/2010	15/07/2010			19/07/2010		19/07/2010	
Total Sulphur	15/07/2010	15/07/2010		14/07/2010	15/07/2010	15/07/2010		16/07/2010		16/07/2010		
TPH c6-40 Value of soil	15/07/2010	15/07/2010		15/07/2010	16/07/2010	16/07/2010		16/07/2010		16/07/2010		
TPH CWG GC (S)							21/07/2010					20/07/2010
VOC MS (S)												20/07/2010
Water Soluble Sulphate 2:1	14/07/2010	14/07/2010		14/07/2010	15/07/2010	15/07/2010		15/07/2010		15/07/2010		

1796289	1796327	1796353	1796418	1796508	1796587	1796622	1796662	1796720	1796743	1796767	1796784	1796796	1796809	1796915
TP112	TP116	TP113	TP126	TP125	TP133	TP116	TP128	TP129	TP128	TP130	TP132	TP111	TP129	WS2
2.80	1.80	3.00	2.20	1.70	0.60	0.20	1.50	0.60	0.40	0.20	0.60	2.80	1.80	0.10 - 0.80
SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID	SOLID
16/07/2010					15/07/2010					16/07/2010				
										14/07/2010				
16/07/2010		16/07/2010	15/07/2010		15/07/2010	16/07/2010	16/07/2010		16/07/2010	15/07/2010	15/07/2010	16/07/2010	16/07/2010	16/07/2010
16/07/2010					16/07/2010					16/07/2010				
16/07/2010		15/07/2010	16/07/2010		16/07/2010	15/07/2010	15/07/2010		15/07/2010	16/07/2010	15/07/2010	16/07/2010	16/07/2010	16/07/2010
16/07/2010					16/07/2010					16/07/2010				
	16/07/2010		16/07/2010	16/07/2010	16/07/2010			20/07/2010			16/07/2010			
	16/07/2010		16/07/2010	16/07/2010	16/07/2010			20/07/2010			16/07/2010			
	21/07/2010		19/07/2010	20/07/2010	19/07/2010			20/07/2010			20/07/2010			
16/07/2010					16/07/2010					16/07/2010				
15/07/2010		15/07/2010	15/07/2010		15/07/2010	16/07/2010	16/07/2010		15/07/2010	15/07/2010	15/07/2010	16/07/2010	15/07/2010	15/07/2010
14/07/2010					14/07/2010					14/07/2010				
15/07/2010		15/07/2010	15/07/2010		15/07/2010	16/07/2010	16/07/2010		15/07/2010	15/07/2010	15/07/2010	15/07/2010	15/07/2010	15/07/2010
14/07/2010		15/07/2010	15/07/2010		15/07/2010	15/07/2010	15/07/2010		14/07/2010	14/07/2010	15/07/2010	15/07/2010	15/07/2010	15/07/2010
16/07/2010					15/07/2010					16/07/2010				
15/07/2010		16/07/2010	15/07/2010		15/07/2010	16/07/2010	16/07/2010		15/07/2010	15/07/2010	15/07/2010	16/07/2010	15/07/2010	15/07/2010
13/07/2010	14/07/2010	14/07/2010	14/07/2010	14/07/2010	13/07/2010	14/07/2010	14/07/2010	14/07/2010	14/07/2010	13/07/2010	14/07/2010	14/07/2010	14/07/2010	14/07/2010
19/07/2010		19/07/2010	19/07/2010		19/07/2010	19/07/2010	19/07/2010		19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010
16/07/2010		16/07/2010	15/07/2010		15/07/2010	16/07/2010	16/07/2010		16/07/2010	15/07/2010	15/07/2010	16/07/2010	16/07/2010	16/07/2010
16/07/2010		16/07/2010	16/07/2010		16/07/2010	16/07/2010	16/07/2010		16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010	16/07/2010
	21/07/2010		19/07/2010	20/07/2010	19/07/2010			20/07/2010			20/07/2010			
15/07/2010		15/07/2010	15/07/2010		15/07/2010	16/07/2010	16/07/2010		15/07/2010	15/07/2010	15/07/2010	16/07/2010	15/07/2010	15/07/2010

1796928
WS2
1.10 - 1.50
SOLID
16/07/2010
16/07/2010
20/07/2010
20/07/2010
19/07/2010
15/07/2010
20/07/2010
15/07/2010
15/07/2010
14/07/2010
19/07/2010
16/07/2010
16/07/2010
20/07/2010
15/07/2010

SDG: 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

Results Legend		Customer Sample Ref.	TP101	TP102	TP103	TP105	TP106	TP107	
#	ISO17025 accredited.	Depth (m) Sample Type Date Sampled Date Received SDG Ref Lab Sample No.(s)	0.20	1.00	2.00	0.70	0.20	0.60	
M	mCERTS accredited.		Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid
aq	Aqueous / settled sample.		05/07/2010	05/07/2010	05/07/2010	05/07/2010	05/07/2010	05/07/2010	05/07/2010
diss.filt	Dissolved / filtered sample.		08/07/2010	08/07/2010	08/07/2010	08/07/2010	08/07/2010	08/07/2010	08/07/2010
tot.unfilt	Total / unfiltered sample.		100708-104	100708-104	100708-104	100708-104	100708-104	100708-104	100708-104
*	subcontracted test.		1795358	1795474	1795533	1795581	1795636	1795674	
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.								
Component	LOD/Units	Method							
Moisture	%	PM114			15.4				
Moisture content ratio	%	PM114			18.2				
Dry matter content ratio	%	PM114			84.6				
Phenols, Total monohydric	<0.22 mg/kg	TM062 (S)	<0.22 M	<0.22 M		<0.22 M	<0.22 M	<0.22 M	
Sulphate, 2:1 water soluble	<0.003 g/l	TM098	0.0046 M	0.0342 M		0.0218 M	0.008 M	0.0324 M	
Sulphur, Total	<0.02 %	TM132	0.07 #	0.03 #		0.02 #	0.05 #	<0.02 #	
Fraction Organic Carbon (FOC)	<0.002 -	TM132	0.0519 #	0.0065 #		0.0063 #	0.0593 #	0.0072 #	
pH	1 pH Units	TM133	7.48 M	6.56 M		7.18 M	6.01 M	7.71 M	
Cyanide, Total	<1 mg/kg	TM153	1.52 M	<1 M		<1 M	<1 M	<1 M	
Cyanide, Free	<1 mg/kg	TM153	<1	<1		<1	<1	<1	
Cyanide, Complex	<1 mg/kg	TM153	1.45	<1		<1	<1	<1	
TPH >C6-C40	<10 mg/kg	TM154	2120 #	55.2 #		48 #	299 #	215 #	
Arsenic	<0.6 mg/kg	TM181	16.4 M	12.5 M		15.2 M	18.2 M	10 M	
Barium	<0.6 mg/kg	TM181	499 #	328 #		380 #	446 #	311 #	
Beryllium	<0.01 mg/kg	TM181	1.74 M	1.54 M		1.59 M	2.46 M	1.5 M	
Cadmium	<0.02 mg/kg	TM181	1.17 M	<0.02 M		<0.02 M	0.685 M	<0.02 M	
Chromium	<0.9 mg/kg	TM181	39.1 M	39.6 M		37.3 M	34.2 M	37.8 M	
Copper	<1.4 mg/kg	TM181	80.9 M	19.5 M		18.4 M	74.7 M	15.6 M	
Lead	<0.7 mg/kg	TM181	255 M	19.8 M		24 M	191 M	19.5 M	
Mercury	<0.14 mg/kg	TM181	<0.14 M	<0.14 M		<0.14 M	<0.14 M	<0.14 M	
Nickel	<0.2 mg/kg	TM181	33.7 M	32.2 M		36.5 M	32.2 M	28.7 M	
Selenium	<1 mg/kg	TM181	1.65 #	1.93 #		1.46 #	1.58 #	1.23 #	
Vanadium	<0.2 mg/kg	TM181	47.4 #	49.4 #		48 #	45.4 #	46.4 #	
Zinc	<1.9 mg/kg	TM181	339 M	130 M		118 M	323 M	104 M	
Boron, water soluble	<1 mg/kg	TM222	1.73 M	<1 M		<1 M	1.14 M	1.16 M	

SDG: 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

PAH by GCMS

Results Legend		Customer Sample Ref.	TP101	TP102	TP105	TP106	TP107
#	ISO17025 accredited.						
M	mCERTS accredited.						
aq	Aqueous / settled sample.						
diss.filt	Dissolved / filtered sample.						
tot.unfilt	Total / unfiltered sample.						
*	subcontracted test.						
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
		Depth (m)	0.20	1.00	0.70	0.20	0.60
		Sample Type	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid
		Date Sampled	05/07/2010	05/07/2010	05/07/2010	05/07/2010	05/07/2010
		Date Received	08/07/2010	08/07/2010	08/07/2010	08/07/2010	08/07/2010
		SDG Ref	100708-104	100708-104	100708-104	100708-104	100708-104
		Lab Sample No.(s)	1795358	1795474	1795581	1795636	1795674
Component	LOD/Units	Method					
Naphthalene-d8 % recovery**	%	TM218	100	95.2	98.1	93.2	96.8
Acenaphthene-d10 % recovery**	%	TM218	97.7	93.5	95.3	91.3	95.6
Phenanthrene-d10 % recovery**	%	TM218	97.3	92.3	93.5	91.1	94.9
Chrysene-d12 % recovery**	%	TM218	93.5	85.8	88	85.9	87.8
Perylene-d12 % recovery**	%	TM218	98.6	89.8	90	86.4	84.4
Naphthalene	<9 µg/kg	TM218	180	<9	<9	47.3	<9
Acenaphthylene	<12 µg/kg	TM218	296	<12	<12	37.3	<12
Acenaphthene	<8 µg/kg	TM218	98	<8	<8	33.9	<8
Fluorene	<10 µg/kg	TM218	110	<10	<10	25.5	<10
Phenanthrene	<15 µg/kg	TM218	1730	<15	<15	633	<15
Anthracene	<16 µg/kg	TM218	643	<16	<16	163	<16
Fluoranthene	<17 µg/kg	TM218	6260	44	<17	1510	<17
Pyrene	<15 µg/kg	TM218	5510	39	<15	1230	<15
Benzo(a)anthracene	<14 µg/kg	TM218	3450	18.2	<14	652	<14
Chrysene	<10 µg/kg	TM218	3000	24.9	<10	631	<10
Benzo(b)fluoranthene	<15 µg/kg	TM218	5270	45.1	<15	971	<15
Benzo(k)fluoranthene	<14 µg/kg	TM218	2170	21.5	<14	299	<14
Benzo(a)pyrene	<15 µg/kg	TM218	4430	31.6	<15	649	<15
Indeno(1,2,3-cd)pyrene	<18 µg/kg	TM218	3330	24.9	<18	416	<18
Dibenzo(a,h)anthracene	<23 µg/kg	TM218	811	<23	<23	120	<23
Benzo(g,h,i)perylene	<24 µg/kg	TM218	3890	30.3	<24	472	<24
Polyaromatic hydrocarbons, Total USEPA 16	<118 µg/kg	TM218	41200	280	<118	7890	<118

SDG: 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

Results Legend		Customer Sample Ref.	TP110	TP111	TP111	TP112	TP113	
#	ISO17025 accredited.							
M	mCERTS accredited.							
aq	Aqueous / settled sample.							
diss.filt	Dissolved / filtered sample.							
tot.unfilt	Total / unfiltered sample.							
*	subcontracted test.							
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.							
		Depth (m)	0.80	0.40	2.80	2.80	3.00	
		Sample Type	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	
		Date Sampled	07/07/2010	07/07/2010	07/07/2010	07/07/2010	07/07/2010	
		Date Received	08/07/2010	08/07/2010	08/07/2010	08/07/2010	08/07/2010	
		SDG Ref	100708-104	100708-104	100708-104	100708-104	100708-104	
		Lab Sample No.(s)	1796216	1796247	1796796	1796289	1796353	
Component	LOD/Units	Method						
Moisture	%	PM114		16.7		21.2		
Moisture content ratio	%	PM114		20.1		27		
Dry matter content ratio	%	PM114		83.3		78.8		
Asbestos Containing Material Screen	-	TM001	No ACM Detected					
Phenols, Total monohydric	<0.22 mg/kg	TM062 (S)	<0.22	#	<0.22	M	<0.22	
Sulphate, 2:1 water soluble	<0.003 g/l	TM098	0.0439	#	0.0741	M	0.0293	
Sulphur, Total	<0.02 %	TM132	0.16	#	0.05	#	0.03	
Fraction Organic Carbon (FOC)	<0.002 -	TM132	0.154	#	0.00899	#	0.00434	
pH	1 pH Units	TM133	7.59	#	7.1	M	6.98	
Cyanide, Total	<1 mg/kg	TM153	<1	#	<1	M	<1	
Cyanide, Free	<1 mg/kg	TM153	<1	#	<1	M	<1	
Cyanide, Complex	<1 mg/kg	TM153	<1	#	<1	M	<1	
TPH >C6-C40	<10 mg/kg	TM154	538	#	126	#	815	
Arsenic	<0.6 mg/kg	TM181	7.38	#	10.1	M	10.5	
Barium	<0.6 mg/kg	TM181	307	#	262	#	236	
Beryllium	<0.01 mg/kg	TM181	0.75	#	1.26	M	0.858	
Cadmium	<0.02 mg/kg	TM181	0.151	#	0.0373	M	<0.02	
Chromium	<0.9 mg/kg	TM181	9.08	#	29.9	M	24.2	
Copper	<1.4 mg/kg	TM181	22.1	#	23.4	M	15.7	
Lead	<0.7 mg/kg	TM181	11.9	#	67.3	M	20	
Mercury	<0.14 mg/kg	TM181	<0.14	#	<0.14	M	<0.14	
Nickel	<0.2 mg/kg	TM181	10.5	#	26.3	M	24.3	
Selenium	<1 mg/kg	TM181	<1	#	1.32	#	1.28	
Vanadium	<0.2 mg/kg	TM181	7.28	#	37.4	#	27.8	
Zinc	<1.9 mg/kg	TM181	48.8	#	156	M	66.6	
Boron, water soluble	<1 mg/kg	TM222	1.52	#	4.19	M	4.31	

SDG: 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
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PAH by GCMS

Results Legend		Customer Sample Ref.	TP110	TP111	TP112	TP113
#	ISO17025 accredited.					
M	mCERTS accredited.					
aq	Aqueous / settled sample.					
diss.filt	Dissolved / filtered sample.					
tot.unfilt	Total / unfiltered sample.					
*	subcontracted test.					
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.					
		Depth (m)	0.80	2.80	2.80	3.00
		Sample Type	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid
		Date Sampled	07/07/2010	07/07/2010	07/07/2010	07/07/2010
		Date Received	08/07/2010	08/07/2010	08/07/2010	08/07/2010
		SDG Ref	100708-104	100708-104	100708-104	100708-104
		Lab Sample No.(s)	1796216	1796796	1796289	1796353
Component	LOD/Units	Method				
Naphthalene-d8 % recovery**	%	TM218	103	99	104	104
Acenaphthene-d10 % recovery**	%	TM218	105	96.3	104	102
Phenanthrene-d10 % recovery**	%	TM218	102	95.3	102	100
Chrysene-d12 % recovery**	%	TM218	86.8	86.6	96.8	95.6
Perylene-d12 % recovery**	%	TM218	70.8	80.9	94.8	91.9
Naphthalene	<9 µg/kg	TM218	1820	<9	17.3	<9
Acenaphthylene	<12 µg/kg	TM218	16.8	<12	<12	<12
Acenaphthene	<8 µg/kg	TM218	31.3	<8	90.7	<8
Fluorene	<10 µg/kg	TM218	52.1	<10	149	<10
Phenanthrene	<15 µg/kg	TM218	1820	34.8	457	<15
Anthracene	<16 µg/kg	TM218	182	<16	131	<16
Fluoranthene	<17 µg/kg	TM218	1120	102	108	<17
Pyrene	<15 µg/kg	TM218	953	86.3	121	<15
Benzo(a)anthracene	<14 µg/kg	TM218	476	48.8	35.4	<14
Chrysene	<10 µg/kg	TM218	456	48.3	36.3	<10
Benzo(b)fluoranthene	<15 µg/kg	TM218	740	45.8	29.8	<15
Benzo(k)fluoranthene	<14 µg/kg	TM218	172	21.7	<14	<14
Benzo(a)pyrene	<15 µg/kg	TM218	397	29.5	22	<15
Indeno(1,2,3-cd)pyrene	<18 µg/kg	TM218	206	<18	<18	<18
Dibenzo(a,h)anthracene	<23 µg/kg	TM218	73.8	<23	<23	<23
Benzo(g,h,i)perylene	<24 µg/kg	TM218	629	<24	<24	<24
Polyaromatic hydrocarbons, Total USEPA 16	<118 µg/kg	TM218	9140	417	1200	<118

SDG 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
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Order No.: NE09/616
Report No.: 91025

TPH CWG (S)

Results Legend		Customer Sample Ref.	TP112				
#	ISO17025 accredited.						
M	mCERTS accredited.						
aq	Aqueous / settled sample.						
diss.filt	Dissolved / filtered sample.						
tot.unfilt	Total / unfiltered sample.						
*	subcontracted test.						
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
		Depth (m)	0.80				
		Sample Type	Soil/Solid				
		Date Sampled	07/07/2010				
		Date Received	08/07/2010				
		SDG Ref	100708-104				
		Lab Sample No.(s)	1796270				
Component	LOD/Units	Method					
GRO Surrogate % recovery**	%	TM089	11				
GRO >C5-C12	<44 µg/kg	TM089	665				
Benzene	<10 µg/kg	TM089	<10				
Ethylbenzene	<3 µg/kg	TM089	<3				
Toluene	<2 µg/kg	TM089	<2				
m,p-Xylene	<6 µg/kg	TM089	<6				
o-Xylene	<3 µg/kg	TM089	<3				
m,p,o-Xylene	<10 µg/kg	TM089	<10				
BTEX, Total	<10 µg/kg	TM089	<10				
Methyl tertiary butyl ether (MTBE)	<5 µg/kg	TM089	<5				
Aliphatics >C5-C6	<10 µg/kg	TM089	26.7				
Aliphatics >C6-C8	<10 µg/kg	TM089	14.1				
Aliphatics >C8-C10	<10 µg/kg	TM089	119				
Aliphatics >C10-C12	<10 µg/kg	TM089	124				
Aromatics >C6-C7	<10 µg/kg	TM089	<10				
Aromatics >C7-C8	<10 µg/kg	TM089	<10				
Aromatics >EC8-EC10	<10 µg/kg	TM089	178				
Aromatics >EC10-EC12	<10 µg/kg	TM089	186				
Total Aliphatics >C5-C12	<10 µg/kg	TM089	283				
Total Aromatics >C6-C12	<10 µg/kg	TM089	364				
Aliphatics >C12-C16	<100 µg/kg	TM173	332000				
Aliphatics >C16-C21	<100 µg/kg	TM173	4170000				
Aliphatics >C16-C35	<100 µg/kg	TM173	17900000				
Aliphatics >C21-C35	<100 µg/kg	TM173	13700000				
Aliphatics >C35-C44	<100 µg/kg	TM173	672000				
Aromatics >EC12-EC16	<100 µg/kg	TM173	18300				
Aromatics >EC16-EC21	<100 µg/kg	TM173	338000				
Aromatics >EC21-EC35	<100 µg/kg	TM173	1390000				
Aromatics >EC35-EC44	<100 µg/kg	TM173	176000				
Aromatics >EC40-EC44	<100 µg/kg	TM173	66400				
Total Aliphatics >C12-C44	<100 µg/kg	TM173	18900000				
Total Aromatics >EC12-EC44	<100 µg/kg	TM173	1930000				
Total Aliphatics >C5-35	<100 µg/kg	TM173	18200000				
Total Aliphatics >C5-C44	<100 µg/kg	TM173	18900000				
Total Aromatics >C5-35	<100 µg/kg	TM173	1750000				
Total Aromatics >C6-C44	<100 µg/kg	TM173	1930000				
Total Aliphatics & Aromatics >C5-35	<100 µg/kg	TM173	20000000				
Total Aliphatics & Aromatics >C5-C44	<100 µg/kg	TM173	20800000				

SDG 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

VOC MS (S)

Results Legend		Customer Sample Ref.	TP112				
#	ISO17025 accredited.						
M	mCERTS accredited.						
aq	Aqueous / settled sample.						
diss.filt	Dissolved / filtered sample.						
tot.unfilt	Total / unfiltered sample.						
*	subcontracted test.						
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
		Depth (m)	0.80				
		Sample Type	Soil/Solid				
		Date Sampled	07/07/2010				
		Date Received	08/07/2010				
		SDG Ref	100708-104				
		Lab Sample No.(s)	1796270				
Component	LOD/Units	Method					
Dibromofluoromethane**	%	TM116	101				
Toluene-d8**	%	TM116	75.6				
4-Bromofluorobenzene**	%	TM116	149				
Dichlorodifluoromethane	<4 µg/kg	TM116	<40				
Chloromethane	<7 µg/kg	TM116	<70				
Vinyl Chloride	<10 µg/kg	TM116	<100				
Bromomethane	<13 µg/kg	TM116	<130				
Chloroethane	<14 µg/kg	TM116	<140				
Trichlorofluoromethane	<6 µg/kg	TM116	<60				
1.1-Dichloroethene	<10 µg/kg	TM116	<100				
Carbon Disulphide	<7 µg/kg	TM116	95				
Dichloromethane	<10 µg/kg	TM116	<100				
Methyl Tertiary Butyl Ether	<11 µg/kg	TM116	<110				
trans-1-2-Dichloroethene	<11 µg/kg	TM116	<110				
1.1-Dichloroethane	<8 µg/kg	TM116	<80				
cis-1-2-Dichloroethene	<5 µg/kg	TM116	<50				
2.2-Dichloropropane	<12 µg/kg	TM116	<120				
Bromochloromethane	<14 µg/kg	TM116	<140				
Chloroform	<8 µg/kg	TM116	<80				
1.1.1-Trichloroethane	<7 µg/kg	TM116	<70				
1.1-Dichloropropene	<11 µg/kg	TM116	<110				
Carbontetrachloride	<14 µg/kg	TM116	<140				
1.2-Dichloroethane	<5 µg/kg	TM116	<50				
Benzene	<9 µg/kg	TM116	<90				
Trichloroethene	<9 µg/kg	TM116	<90				
1.2-Dichloropropane	<12 µg/kg	TM116	<120				
Dibromomethane	<9 µg/kg	TM116	<90				
Bromodichloromethane	<7 µg/kg	TM116	<70				
cis-1-3-Dichloropropene	<14 µg/kg	TM116	<140				
Toluene	<5 µg/kg	TM116	<50				
trans-1-3-Dichloropropene	<14 µg/kg	TM116	<140				
1.1.2-Trichloroethane	<10 µg/kg	TM116	<100				
1.3-Dichloropropane	<7 µg/kg	TM116	<70				
Tetrachloroethene	<5 µg/kg	TM116	<50				
Dibromochloromethane	<13 µg/kg	TM116	<130				
1.2-Dibromoethane	<12 µg/kg	TM116	<120				
Chlorobenzene	<5 µg/kg	TM116	<50				
1.1.1.2-Tetrachloroethane	<10 µg/kg	TM116	<100				
Ethylbenzene	<4 µg/kg	TM116	<40				

SDG: 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

VOC MS (S)

Results Legend		Customer Sample Ref.	TP112				
#	ISO17025 accredited.						
M	mCERTS accredited.						
aq	Aqueous / settled sample.						
diss.filt	Dissolved / filtered sample.						
tot.unfilt	Total / unfiltered sample.						
*	subcontracted test.						
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
		Depth (m)	0.80				
		Sample Type	Soil/Solid				
		Date Sampled	07/07/2010				
		Date Received	08/07/2010				
		SDG Ref	100708-104				
		Lab Sample No.(s)	1796270				
Component	LOD/Units	Method					
p/m-Xylene	<14 µg/kg	TM116	<140	#			
o-Xylene	<10 µg/kg	TM116	<100	M			
Styrene	<10 µg/kg	TM116	<100	M			
Bromoform	<10 µg/kg	TM116	<100	M			
Isopropylbenzene	<5 µg/kg	TM116	<50	M			
1.1.2.2-Tetrachloroethane	<10 µg/kg	TM116	<100	#			
1.2.3-Trichloropropane	<17 µg/kg	TM116	<170	M			
Bromobenzene	<10 µg/kg	TM116	<100	M			
Propylbenzene	<11 µg/kg	TM116	<110	M			
2-Chlorotoluene	<9 µg/kg	TM116	<90	M			
1.3.5-Trimethylbenzene	<8 µg/kg	TM116	<80	#			
4-Chlorotoluene	<12 µg/kg	TM116	<120	M			
tert-Butylbenzene	<12 µg/kg	TM116	<120	#			
1.2.4-Trimethylbenzene	<9 µg/kg	TM116	<90	#			
sec-Butylbenzene	<10 µg/kg	TM116	<100	M			
4-Isopropyltoluene	<11 µg/kg	TM116	<110	M			
1.3-Dichlorobenzene	<6 µg/kg	TM116	<60	M			
1.4-Dichlorobenzene	<5 µg/kg	TM116	<50	M			
n-Butylbenzene	<10 µg/kg	TM116	<100	M			
1.2-Dichlorobenzene	<12 µg/kg	TM116	<120	M			
1.2-Dibromo-3-chloropropane	<14 µg/kg	TM116	<140	M			
Tert-amyl methyl ether	<15 µg/kg	TM116	<150				
1.2.4-Trichlorobenzene	<6 µg/kg	TM116	<60	#			
Hexachlorobutadiene	<12 µg/kg	TM116	<120	M			
Naphthalene	<13 µg/kg	TM116	<130	M			
1.2.3-Trichlorobenzene	<6 µg/kg	TM116	<60	M			

SDG: 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

Results Legend		Customer Sample Ref.	TP116	TP124	TP126			
#	ISO17025 accredited.							
M	mCERTS accredited.							
aq	Aqueous / settled sample.							
diss.filt	Dissolved / filtered sample.							
tot.unfilt	Total / unfiltered sample.							
*	subcontracted test.							
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.							
		Depth (m)	0.20	0.80	2.20			
		Sample Type	Soil/Solid	Soil/Solid	Soil/Solid			
		Date Sampled	07/07/2010	06/07/2010	06/07/2010			
		Date Received	08/07/2010	08/07/2010	08/07/2010			
		SDG Ref	100708-104	100708-104	100708-104			
		Lab Sample No.(s)	1796622	1795825	1796418			
Component	LOD/Units	Method						
Phenols, Total monohydric	<0.22 mg/kg	TM062 (S)	<0.22 M	<0.22 M	<0.22 M			
Sulphate, 2:1 water soluble	<0.003 g/l	TM098	0.19 M	0.117 M	0.062 M			
Sulphur, Total	<0.02 %	TM132	0.07 #	0.14 #	0.05 #			
Fraction Organic Carbon (FOC)	<0.002 -	TM132	0.0238 #	0.0326 #	0.00288 #			
pH	1 pH Units	TM133	8.15 M	6.5 M	6.51 M			
Cyanide, Total	<1 mg/kg	TM153	<1 M	<1 M	<1 M			
Cyanide, Free	<1 mg/kg	TM153	<1	<1	<1			
Cyanide, Complex	<1 mg/kg	TM153	<1	<1	<1			
TPH >C6-C40	<10 mg/kg	TM154	1530 #	493 #	<10 #			
Arsenic	<0.6 mg/kg	TM181	13 M	7.89 M	11.1 M			
Barium	<0.6 mg/kg	TM181	291 #	291 #	47.5 #			
Beryllium	<0.01 mg/kg	TM181	1.49 M	0.814 M	0.641 M			
Cadmium	<0.02 mg/kg	TM181	0.386 M	0.306 M	<0.02 M			
Chromium	<0.9 mg/kg	TM181	26.2 M	20.6 M	14 M			
Copper	<1.4 mg/kg	TM181	42.7 M	20.8 M	14.2 M			
Lead	<0.7 mg/kg	TM181	63.7 M	13.1 M	14.8 M			
Mercury	<0.14 mg/kg	TM181	<0.14 M	<0.14 M	<0.14 M			
Nickel	<0.2 mg/kg	TM181	22 M	15.7 M	13.3 M			
Selenium	<1 mg/kg	TM181	1.05 #	<1 #	<1 #			
Vanadium	<0.2 mg/kg	TM181	36.5 #	24 #	31.1 #			
Zinc	<1.9 mg/kg	TM181	137 M	92.2 M	52 M			
Boron, water soluble	<1 mg/kg	TM222	<1 M	<1 M	<1 M			

SDG: 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

PAH by GCMS

Results Legend		Customer Sample Ref.	TP116	TP124	TP126			
#	ISO17025 accredited.							
M	mCERTS accredited.							
aq	Aqueous / settled sample.							
diss.filt	Dissolved / filtered sample.							
tot.unfilt	Total / unfiltered sample.							
*	subcontracted test.							
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.							
		Depth (m)	0.20	0.80	2.20			
		Sample Type	Soil/Solid	Soil/Solid	Soil/Solid			
		Date Sampled	07/07/2010	06/07/2010	06/07/2010			
		Date Received	08/07/2010	08/07/2010	08/07/2010			
		SDG Ref	100708-104	100708-104	100708-104			
		Lab Sample No.(s)	1796622	1795825	1796418			
Component	LOD/Units	Method						
Naphthalene-d8 % recovery**	%	TM218	95.5	112	103			
Acenaphthene-d10 % recovery**	%	TM218	93.4	108	98.9			
Phenanthrene-d10 % recovery**	%	TM218	93.3	106	94.8			
Chrysene-d12 % recovery**	%	TM218	89.5	102	90.1			
Perylene-d12 % recovery**	%	TM218	90.3	98.6	88.7			
Naphthalene	<9 µg/kg	TM218	78.4	<9	103			
Acenaphthylene	<12 µg/kg	TM218	46.8	<12	35.3			
Acenaphthene	<8 µg/kg	TM218	15.6	<8	9.53			
Fluorene	<10 µg/kg	TM218	17.3	<10	12.6			
Phenanthrene	<15 µg/kg	TM218	287	<15	21.4			
Anthracene	<16 µg/kg	TM218	105	<16	<16			
Fluoranthene	<17 µg/kg	TM218	1400	<17	29.4			
Pyrene	<15 µg/kg	TM218	1470	<15	23.7			
Benzo(a)anthracene	<14 µg/kg	TM218	857	<14	16.6			
Chrysene	<10 µg/kg	TM218	869	<10	15.1			
Benzo(b)fluoranthene	<15 µg/kg	TM218	1430	<15	<15			
Benzo(k)fluoranthene	<14 µg/kg	TM218	527	<14	<14			
Benzo(a)pyrene	<15 µg/kg	TM218	1270	<15	<15			
Indeno(1,2,3-cd)pyrene	<18 µg/kg	TM218	815	<18	<18			
Dibenzo(a,h)anthracene	<23 µg/kg	TM218	216	<23	<23			
Benzo(g,h,i)perylene	<24 µg/kg	TM218	988	<24	<24			
Polyaromatic hydrocarbons, Total USEPA 16	<118 µg/kg	TM218	10400	<118	267			

SDG 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No: 91025

TPH CWG (S)

Results Legend		Customer Sample Ref.	TP116	TP124	TP125	TP126
#	ISO17025 accredited.					
M	mCERTS accredited.					
aq	Aqueous / settled sample.					
diss.filt	Dissolved / filtered sample.					
tot.unfilt	Total / unfiltered sample.					
*	subcontracted test.					
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.					
		Depth (m)	1.80	1.80	1.70	2.20
		Sample Type	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid
		Date Sampled	07/07/2010	06/07/2010	06/07/2010	06/07/2010
		Date Received	08/07/2010	08/07/2010	08/07/2010	08/07/2010
		SDG Ref	100708-104	100708-104	100708-104	100708-104
		Lab Sample No.(s)	1796327	1795821	1796508	1796418
Component	LOD/Units	Method				
GRO Surrogate % recovery**	%	TM089	35	61	125	115
GRO >C5-C12	<44 µg/kg	TM089	3510	<44	<44	<44
Benzene	<10 µg/kg	TM089	<10	<10	<10	<10
Ethylbenzene	<3 µg/kg	TM089	13.5	<3	<3	<3
Toluene	<2 µg/kg	TM089	<2	<2	<2	<2
m,p-Xylene	<6 µg/kg	TM089	101	<6	<6	<6
o-Xylene	<3 µg/kg	TM089	62.1	<3	<3	<3
m,p,o-Xylene	<10 µg/kg	TM089	163	<10	<10	<10
BTEX, Total	<10 µg/kg	TM089	177	<10	<10	<10
Methyl tertiary butyl ether (MTBE)	<5 µg/kg	TM089	<5	<5	<5	<5
Aliphatics >C5-C6	<10 µg/kg	TM089	40.3	<10	<10	<10
Aliphatics >C6-C8	<10 µg/kg	TM089	73.1	<10	<10	<10
Aliphatics >C8-C10	<10 µg/kg	TM089	354	<10	<10	<10
Aliphatics >C10-C12	<10 µg/kg	TM089	935	<10	<10	<10
Aromatics >C6-C7	<10 µg/kg	TM089	<10	<10	<10	<10
Aromatics >C7-C8	<10 µg/kg	TM089	<10	<10	<10	<10
Aromatics >EC8-EC10	<10 µg/kg	TM089	709	<10	<10	<10
Aromatics >EC10-EC12	<10 µg/kg	TM089	1400	<10	<10	<10
Total Aliphatics >C5-C12	<10 µg/kg	TM089	1400	<10	<10	<10
Total Aromatics >C6-C12	<10 µg/kg	TM089	2110	<10	<10	<10
Aliphatics >C12-C16	<100 µg/kg	TM173	77100	<100	16400	<100
Aliphatics >C16-C21	<100 µg/kg	TM173	434000	<100	150000	<100
Aliphatics >C16-C35	<100 µg/kg	TM173	2120000	520	641000	<100
Aliphatics >C21-C35	<100 µg/kg	TM173	1690000	520	492000	<100
Aliphatics >C35-C44	<100 µg/kg	TM173	650000	<100	24300	<100
Aromatics >EC12-EC16	<100 µg/kg	TM173	18800	<100	3340	<100
Aromatics >EC16-EC21	<100 µg/kg	TM173	103000	<100	16800	<100
Aromatics >EC21-EC35	<100 µg/kg	TM173	398000	7540	64300	<100
Aromatics >EC35-EC44	<100 µg/kg	TM173	134000	1330	9440	<100
Aromatics >EC40-EC44	<100 µg/kg	TM173	48800	412	3440	<100
Total Aliphatics >C12-C44	<100 µg/kg	TM173	2850000	520	682000	<100
Total Aromatics >EC12-EC44	<100 µg/kg	TM173	654000	8860	93800	<100
Total Aliphatics >C5-35	<100 µg/kg	TM173	2200000	520	658000	<100
Total Aliphatics >C5-C44	<100 µg/kg	TM173	2850000	520	682000	<100
Total Aromatics >C5-35	<100 µg/kg	TM173	521000	7540	84400	<100
Total Aromatics >C6-C44	<100 µg/kg	TM173	656000	8860	93800	<100
Total Aliphatics & Aromatics >C5-35	<100 µg/kg	TM173	2720000	8060	742000	<100
Total Aliphatics & Aromatics >C5-C44	<100 µg/kg	TM173	3510000	9380	776000	<100

SDG: 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

Results Legend		Customer Sample Ref.	TP127	TP128	TP128	TP129	TP130
#	ISO17025 accredited.	Depth (m) Sample Type Date Sampled Date Received SDG Ref Lab Sample No.(s)	2.00	0.40	1.50	1.80	0.20
M	mCERTS accredited.		Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid
aq	Aqueous / settled sample.		06/07/2010	06/07/2010	06/07/2010	06/07/2010	06/07/2010
diss.filt	Dissolved / filtered sample.		08/07/2010	08/07/2010	08/07/2010	08/07/2010	08/07/2010
tot.unfilt	Total / unfiltered sample.		100708-104	100708-104	100708-104	100708-104	100708-104
*	subcontracted test.		1796087	1796743	1796662	1796809	1796767
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
Component	LOD/Units	Method					
Moisture	%	PM114	16.1				11.2
Moisture content ratio	%	PM114	19.1				12.6
Dry matter content ratio	%	PM114	83.9				88.8
Asbestos Containing Material Screen	-	TM001					No ACM Detected
Phenols, Total monohydric	<0.22 mg/kg	TM062 (S)		<0.22	<0.22	<0.22	<0.22
Sulphate, 2:1 water soluble	<0.003 g/l	TM098		0.0269	0.561	0.112	0.0078
Sulphur, Total	<0.02 %	TM132		0.02	1.02	0.37	0.03
Fraction Organic Carbon (FOC)	<0.002 -	TM132		0.00503	0.0196	0.00456	0.0247
pH	1 pH Units	TM133		6.72	5.92	5.37	7.06
Cyanide, Total	<1 mg/kg	TM153		<1	<1	<1	<1
Cyanide, Free	<1 mg/kg	TM153		<1	<1	<1	<1
Cyanide, Complex	<1 mg/kg	TM153		<1	<1	<1	<1
TPH >C6-C40	<10 mg/kg	TM154		<10	249	158	265
Arsenic	<0.6 mg/kg	TM181		11	14	15.8	9.06
Barium	<0.6 mg/kg	TM181		343	54.7	69.3	211
Beryllium	<0.01 mg/kg	TM181		1.29	0.441	0.287	0.751
Cadmium	<0.02 mg/kg	TM181		<0.02	0.208	<0.02	0.296
Chromium	<0.9 mg/kg	TM181		35.6	7.93	6.17	17.9
Copper	<1.4 mg/kg	TM181		18.4	7.86	7.64	28.3
Lead	<0.7 mg/kg	TM181		14.2	6.16	4.65	84.1
Mercury	<0.14 mg/kg	TM181		<0.14	<0.14	<0.14	<0.14
Nickel	<0.2 mg/kg	TM181		29	21.4	10.1	14
Selenium	<1 mg/kg	TM181		1.84	<1	<1	<1
Vanadium	<0.2 mg/kg	TM181		41.8	13.3	9.05	23.9
Zinc	<1.9 mg/kg	TM181		108	43.4	20.4	100
Boron, water soluble	<1 mg/kg	TM222		<1	<1	<1	<1

SDG: 100708-104
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Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
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PAH by GCMS

Results Legend		Customer Sample Ref.	TP128	TP128	TP129	TP130		
#	ISO17025 accredited.							
M	mCERTS accredited.							
aq	Aqueous / settled sample.							
diss.filt	Dissolved / filtered sample.							
tot.unfilt	Total / unfiltered sample.							
*	subcontracted test.							
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.							
		Depth (m)	0.40	1.50	1.80	0.20		
		Sample Type	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid		
		Date Sampled	06/07/2010	06/07/2010	06/07/2010	06/07/2010		
		Date Received	08/07/2010	08/07/2010	08/07/2010	08/07/2010		
		SDG Ref	100708-104	100708-104	100708-104	100708-104		
		Lab Sample No.(s)	1796743	1796662	1796809	1796767		
Component	LOD/Units	Method						
Naphthalene-d8 % recovery**	%	TM218	109	99.3	108	103		
Acenaphthene-d10 % recovery**	%	TM218	108	98.6	108	102		
Phenanthrene-d10 % recovery**	%	TM218	103	98.8	105	100		
Chrysene-d12 % recovery**	%	TM218	99.1	92.3	102	97.2		
Perylene-d12 % recovery**	%	TM218	92.1	90.7	98.4	94.4		
Naphthalene	<9 µg/kg	TM218	<9	<9	<9	66.4		
Acenaphthylene	<12 µg/kg	TM218	<12	<12	<12	587		
Acenaphthene	<8 µg/kg	TM218	<8	<8	<8	125		
Fluorene	<10 µg/kg	TM218	<10	<10	<10	440		
Phenanthrene	<15 µg/kg	TM218	<15	<15	<15	4480		
Anthracene	<16 µg/kg	TM218	<16	<16	<16	1070		
Fluoranthene	<17 µg/kg	TM218	<17	<17	<17	5260		
Pyrene	<15 µg/kg	TM218	<15	<15	<15	4050		
Benzo(a)anthracene	<14 µg/kg	TM218	<14	<14	<14	2130		
Chrysene	<10 µg/kg	TM218	<10	<10	16.1	1700		
Benzo(b)fluoranthene	<15 µg/kg	TM218	<15	<15	20.4	1840		
Benzo(k)fluoranthene	<14 µg/kg	TM218	<14	<14	<14	870		
Benzo(a)pyrene	<15 µg/kg	TM218	<15	<15	<15	1790		
Indeno(1,2,3-cd)pyrene	<18 µg/kg	TM218	<18	<18	<18	926		
Dibenzo(a,h)anthracene	<23 µg/kg	TM218	<23	<23	<23	263		
Benzo(g,h,i)perylene	<24 µg/kg	TM218	<24	<24	<24	995		
Polyaromatic hydrocarbons, Total USEPA 16	<118 µg/kg	TM218	<118	<118	<118	26600		

SDG 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

TPH CWG (S)

Results Legend		Customer Sample Ref.	TP129				
#	ISO17025 accredited.						
M	mCERTS accredited.						
aq	Aqueous / settled sample.						
diss.filt	Dissolved / filtered sample.						
tot.unfilt	Total / unfiltered sample.						
*	subcontracted test.						
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.						
		Depth (m)	0.60				
		Sample Type	Soil/Solid				
		Date Sampled	06/07/2010				
		Date Received	08/07/2010				
		SDG Ref	100708-104				
		Lab Sample No.(s)	1796720				
Component	LOD/Units	Method					
GRO Surrogate % recovery**	%	TM089	98				
GRO >C5-C12	<44 µg/kg	TM089	<44				
Benzene	<10 µg/kg	TM089	<10				
Ethylbenzene	<3 µg/kg	TM089	<3				
Toluene	<2 µg/kg	TM089	<2				
m,p-Xylene	<6 µg/kg	TM089	<6				
o-Xylene	<3 µg/kg	TM089	<3				
m,p,o-Xylene	<10 µg/kg	TM089	<10				
BTEX, Total	<10 µg/kg	TM089	<10				
Methyl tertiary butyl ether (MTBE)	<5 µg/kg	TM089	<5				
Aliphatics >C5-C6	<10 µg/kg	TM089	<10				
Aliphatics >C6-C8	<10 µg/kg	TM089	<10				
Aliphatics >C8-C10	<10 µg/kg	TM089	<10				
Aliphatics >C10-C12	<10 µg/kg	TM089	<10				
Aromatics >C6-C7	<10 µg/kg	TM089	<10				
Aromatics >C7-C8	<10 µg/kg	TM089	<10				
Aromatics >EC8-EC10	<10 µg/kg	TM089	<10				
Aromatics >EC10-EC12	<10 µg/kg	TM089	<10				
Total Aliphatics >C5-C12	<10 µg/kg	TM089	<10				
Total Aromatics >C6-C12	<10 µg/kg	TM089	<10				
Aliphatics >C12-C16	<100 µg/kg	TM173	7500				
Aliphatics >C16-C21	<100 µg/kg	TM173	2970				
Aliphatics >C16-C35	<100 µg/kg	TM173	8780				
Aliphatics >C21-C35	<100 µg/kg	TM173	5800				
Aliphatics >C35-C44	<100 µg/kg	TM173	474				
Aromatics >EC12-EC16	<100 µg/kg	TM173	1370				
Aromatics >EC16-EC21	<100 µg/kg	TM173	1500				
Aromatics >EC21-EC35	<100 µg/kg	TM173	2970				
Aromatics >EC35-EC44	<100 µg/kg	TM173	778				
Aromatics >EC40-EC44	<100 µg/kg	TM173	<100				
Total Aliphatics >C12-C44	<100 µg/kg	TM173	16800				
Total Aromatics >EC12-EC44	<100 µg/kg	TM173	6620				
Total Aliphatics >C5-35	<100 µg/kg	TM173	16300				
Total Aliphatics >C5-C44	<100 µg/kg	TM173	16800				
Total Aromatics >C5-35	<100 µg/kg	TM173	5840				
Total Aromatics >C6-C44	<100 µg/kg	TM173	6620				
Total Aliphatics & Aromatics >C5-35	<100 µg/kg	TM173	22100				
Total Aliphatics & Aromatics >C5-C44	<100 µg/kg	TM173	23400				

SDG: 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

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Order No.: NE09/616
Report No.: 91025

Results Legend		Customer Sample Ref.	TP132	TP133	WS2	WS2
#	ISO17025 accredited.					
M	mCERTS accredited.					
aq	Aqueous / settled sample.	Depth (m)	0.60	0.60	0.10 - 0.80	1.10 - 1.50
diss.filt	Dissolved / filtered sample.	Sample Type	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid
tot.unfilt	Total / unfiltered sample.	Date Sampled	06/07/2010	06/07/2010	07/07/2010	07/07/2010
*	subcontracted test.	Date Received	08/07/2010	08/07/2010	08/07/2010	08/07/2010
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.	SDG Ref	100708-104	100708-104	100708-104	100708-104
		Lab Sample No.(s)	1796784	1796587	1796915	1796928
Component	LOD/Units	Method				
Moisture	%	PM114		5.76		
Moisture content ratio	%	PM114		6.11		
Dry matter content ratio	%	PM114		94.2		
Phenols, Total monohydric	<0.22 mg/kg	TM062 (S)	<0.22 M	<0.22 M	<0.22 M	<0.22 M
Sulphate, 2:1 water soluble	<0.003 g/l	TM098	0.0219 M	0.0097 M	0.0141 M	0.131 M
Sulphur, Total	<0.02 %	TM132	<0.02 #	<0.02 #	0.05 #	0.09 #
Fraction Organic Carbon (FOC)	<0.002 -	TM132	0.00398 #	0.00217 #	0.0168 #	0.0515 #
pH	1 pH Units	TM133	7.21 M	5.81 M	8.28 M	8.7 M
Cyanide, Total	<1 mg/kg	TM153	<1 M	<1 M	<1 M	<1 M
Cyanide, Free	<1 mg/kg	TM153	<1	<1	<1	<1
Cyanide, Complex	<1 mg/kg	TM153	<1	<1	<1	<1
TPH >C6-C40	<10 mg/kg	TM154	<10 #	11.9 #	510 #	436 #
Arsenic	<0.6 mg/kg	TM181	10.7 M	9.39 M	8.91 M	10 M
Barium	<0.6 mg/kg	TM181	253 #	53.9 #	284 #	255 #
Beryllium	<0.01 mg/kg	TM181	0.92 M	0.374 M	0.848 M	0.698 M
Cadmium	<0.02 mg/kg	TM181	<0.02 M	<0.02 M	0.334 M	0.214 M
Chromium	<0.9 mg/kg	TM181	19.2 M	11.5 M	19.9 M	13.5 M
Copper	<1.4 mg/kg	TM181	11.3 M	12 M	25.7 M	24.4 M
Lead	<0.7 mg/kg	TM181	10.6 M	30.8 M	99.5 M	103 M
Mercury	<0.14 mg/kg	TM181	<0.14 M	<0.14 M	<0.14 M	0.202 M
Nickel	<0.2 mg/kg	TM181	20.8 M	8.97 M	18.7 M	13.9 M
Selenium	<1 mg/kg	TM181	1.03 #	<1 #	<1 #	<1 #
Vanadium	<0.2 mg/kg	TM181	26.1 #	21 #	27.1 #	20.6 #
Zinc	<1.9 mg/kg	TM181	55.6 M	37.7 M	118 M	100 M
Boron, water soluble	<1 mg/kg	TM222	<1 M	<1 M	<1 M	<1 M

SDG: 100708-104
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

PAH by GCMS

Results Legend		Customer Sample Ref.	TP132	TP133	WS2	WS2
#	ISO17025 accredited.					
M	mCERTS accredited.					
aq	Aqueous / settled sample.	Depth (m)	0.60	0.60	0.10 - 0.80	1.10 - 1.50
diss.filt	Dissolved / filtered sample.	Sample Type	Soil/Solid	Soil/Solid	Soil/Solid	Soil/Solid
tot.unfilt	Total / unfiltered sample.	Date Sampled	06/07/2010	06/07/2010	07/07/2010	07/07/2010
*	subcontracted test.	Date Received	08/07/2010	08/07/2010	08/07/2010	08/07/2010
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.	SDG Ref	100708-104	100708-104	100708-104	100708-104
		Lab Sample No.(s)	1796784	1796587	1796915	1796928
Component	LOD/Units	Method				
Naphthalene-d8 % recovery**	%	TM218	102	102	98.9	106
Acenaphthene-d10 % recovery**	%	TM218	103	102	96.7	104
Phenanthrene-d10 % recovery**	%	TM218	99.4	99.9	92.3	100
Chrysene-d12 % recovery**	%	TM218	95.6	94.8	88.7	94.4
Perylene-d12 % recovery**	%	TM218	91.1	90.5	85.5	90.6
Naphthalene	<9 µg/kg	TM218	<9	<9	61.8	25.2
Acenaphthylene	<12 µg/kg	TM218	<12	<12	129	14.3
Acenaphthene	<8 µg/kg	TM218	<8	<8	70.5	22.1
Fluorene	<10 µg/kg	TM218	<10	<10	65.2	14.8
Phenanthrene	<15 µg/kg	TM218	<15	30.7	1040	82.2
Anthracene	<16 µg/kg	TM218	<16	<16	349	31.1
Fluoranthene	<17 µg/kg	TM218	<17	33.7	3050	184
Pyrene	<15 µg/kg	TM218	<15	28.2	2570	158
Benzo(a)anthracene	<14 µg/kg	TM218	<14	20.4	1720	130
Chrysene	<10 µg/kg	TM218	<10	17.3	1320	98.7
Benzo(b)fluoranthene	<15 µg/kg	TM218	22.6	24.3	2460	174
Benzo(k)fluoranthene	<14 µg/kg	TM218	<14	<14	833	62.2
Benzo(a)pyrene	<15 µg/kg	TM218	<15	15.9	1860	112
Indeno(1,2,3-cd)pyrene	<18 µg/kg	TM218	<18	<18	1100	71.1
Dibenzo(a,h)anthracene	<23 µg/kg	TM218	<23	<23	298	<23
Benzo(g,h,i)perylene	<24 µg/kg	TM218	<24	<24	1240	88.2
Polyaromatic hydrocarbons, Total USEPA 16	<118 µg/kg	TM218	<118	171	18200	1270

SDG: 100708-104
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Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/616
Report No.: 91025

TPH CWG (S)

Results Legend		Customer Sample Ref.	TP132	TP133	WS2
#	ISO17025 accredited.				
M	mCERTS accredited.				
aq	Aqueous / settled sample.				
diss.filt	Dissolved / filtered sample.				
tot.unfilt	Total / unfiltered sample.				
*	subcontracted test.				
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.				
		Depth (m)	0.60	0.60	1.10 - 1.50
		Sample Type	Soil/Solid	Soil/Solid	Soil/Solid
		Date Sampled	06/07/2010	06/07/2010	07/07/2010
		Date Received	08/07/2010	08/07/2010	08/07/2010
		SDG Ref	100708-104	100708-104	100708-104
		Lab Sample No.(s)	1796784	1796587	1796928
Component	LOD/Units	Method			
GRO Surrogate % recovery**	%	TM089	117	118	33
GRO >C5-C12	<44 µg/kg	TM089	<44	<44	607
Benzene	<10 µg/kg	TM089	<10	<10	<10
Ethylbenzene	<3 µg/kg	TM089	<3	<3	<3
Toluene	<2 µg/kg	TM089	<2	<2	<2
m,p-Xylene	<6 µg/kg	TM089	<6	<6	<6
o-Xylene	<3 µg/kg	TM089	<3	<3	<3
m,p,o-Xylene	<10 µg/kg	TM089	<10	<10	<10
BTEX, Total	<10 µg/kg	TM089	<10	<10	<10
Methyl tertiary butyl ether (MTBE)	<5 µg/kg	TM089	<5	<5	<5
Aliphatics >C5-C6	<10 µg/kg	TM089	<10	<10	50.5
Aliphatics >C6-C8	<10 µg/kg	TM089	<10	<10	202
Aliphatics >C8-C10	<10 µg/kg	TM089	<10	<10	50.1
Aliphatics >C10-C12	<10 µg/kg	TM089	<10	<10	88.1
Aromatics >C6-C7	<10 µg/kg	TM089	<10	<10	<10
Aromatics >C7-C8	<10 µg/kg	TM089	<10	<10	<10
Aromatics >EC8-EC10	<10 µg/kg	TM089	<10	<10	75.2
Aromatics >EC10-EC12	<10 µg/kg	TM089	<10	<10	132
Total Aliphatics >C5-C12	<10 µg/kg	TM089	<10	<10	390
Total Aromatics >C6-C12	<10 µg/kg	TM089	<10	<10	207
Aliphatics >C12-C16	<100 µg/kg	TM173	<100	<100	7750
Aliphatics >C16-C21	<100 µg/kg	TM173	<100	<100	17000
Aliphatics >C16-C35	<100 µg/kg	TM173	<100	<100	137000
Aliphatics >C21-C35	<100 µg/kg	TM173	<100	<100	120000
Aliphatics >C35-C44	<100 µg/kg	TM173	<100	<100	45600
Aromatics >EC12-EC16	<100 µg/kg	TM173	<100	<100	7310
Aromatics >EC16-EC21	<100 µg/kg	TM173	<100	<100	20800
Aromatics >EC21-EC35	<100 µg/kg	TM173	<100	<100	119000
Aromatics >EC35-EC44	<100 µg/kg	TM173	<100	<100	52700
Aromatics >EC40-EC44	<100 µg/kg	TM173	<100	<100	21200
Total Aliphatics >C12-C44	<100 µg/kg	TM173	<100	<100	191000
Total Aromatics >EC12-EC44	<100 µg/kg	TM173	<100	<100	200000
Total Aliphatics >C5-35	<100 µg/kg	TM173	<100	<100	145000
Total Aliphatics >C5-C44	<100 µg/kg	TM173	<100	<100	191000
Total Aromatics >C5-35	<100 µg/kg	TM173	<100	<100	148000
Total Aromatics >C6-C44	<100 µg/kg	TM173	<100	<100	200000
Total Aliphatics & Aromatics >C5-35	<100 µg/kg	TM173	<100	<100	293000
Total Aliphatics & Aromatics >C5-C44	<100 µg/kg	TM173	<100	<100	391000

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference	NTE 285	Client Location	THE DOVE WAY UTTOXETER
Mass Sample taken (kg)	0.207	Moisture Content Ratio (%)	18.2
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	84.6
Particle Size <4mm	>95%		

Case

SDG	100708-104
Lab Sample Number(s)	1795533
Sampled Date	05-Jul-2010
Customer Sample Ref.	TP103
Depth (m)	2.00

Solid Waste Analysis

Total Organic Carbon (%)	-
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	-
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.00224	0.00448	-	-	-
Barium	0.043	0.086	-	-	-
Cadmium	0.000152	0.000304	-	-	-
Chromium	0.00152	0.00304	-	-	-
Copper	0.00315	0.0063	-	-	-
Mercury Dissolved (CVAF)	<0.00001	<0.00002	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.0182	0.0364	-	-	-
Lead	0.000793	0.00159	-	-	-
Antimony	-	-	-	-	-
Selenium	0.00172	0.00344	-	-	-
Zinc	0.00599	0.012	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	109	218	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	14-Jul-2010
pH (pH Units)	7.14
Conductivity (µS/cm)	262.00
Temperature (°C)	21.00
Volume Leachant (Litres)	0.318
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference	NTE 285	Client Location	THE DOVE WAY UTTOXETER
Mass Sample taken (kg)	0.207	Moisture Content Ratio (%)	18.2
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	84.6
Particle Size <4mm	>95%		

Case

SDG	100708-104
Lab Sample Number(s)	1795533
Sampled Date	05-Jul-2010
Customer Sample Ref.	TP103
Depth (m)	2.00

Solid Waste Analysis

Total Organic Carbon (%)	-	-	-
Loss on Ignition (%)	-	-	-
Sum of BTEX (mg/kg)	-	-	-
Sum of 7 PCBs (mg/kg)	-	-	-
Mineral Oil (mg/kg)	-	-	-
PAH Sum of 17 (mg/kg)	-	-	-
pH (pH Units)	-	-	-
ANC to pH 6 (mol/kg)	-	-	-
ANC to pH 4 (mol/kg)	-	-	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	0.00035	0.0007	-	-	-
Boron	0.0816	0.163	-	-	-
pH	7	14	-	-	-
Total Cyanide (W)	<0.05	<0.1	-	-	-
Vanadium	0.00504	0.0101	-	-	-

Leach Test Information

Date Prepared	14-Jul-2010
pH (pH Units)	7.14
Conductivity (µS/cm)	262.00
Temperature (°C)	21.00
Volume Leachant (Litres)	0.318
Volume of Eluate VE1 (Litres)	

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

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Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference	NTE 285	Client Location	THE DOVE WAY UTTOXETER
Mass Sample taken (kg)	0.209	Moisture Content Ratio (%)	19.1
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	83.9
Particle Size <4mm	>95%		

Case

SDG	100708-104
Lab Sample Number(s)	1796087
Sampled Date	06-Jul-2010
Customer Sample Ref.	TP127
Depth (m)	2.00

Solid Waste Analysis

Total Organic Carbon (%)	-
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	-
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.00217	0.00434	-	-	-
Barium	0.0535	0.107	-	-	-
Cadmium	<0.0001	<0.0002	-	-	-
Chromium	0.00146	0.00292	-	-	-
Copper	0.00259	0.00518	-	-	-
Mercury Dissolved (CVAF)	<0.00001	<0.00002	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.00289	0.00578	-	-	-
Lead	0.00112	0.00224	-	-	-
Antimony	-	-	-	-	-
Selenium	0.000859	0.00172	-	-	-
Zinc	0.00606	0.0121	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	20.5	41	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	14-Jul-2010
pH (pH Units)	7.77
Conductivity (µS/cm)	1.83
Temperature (°C)	20.60
Volume Leachant (Litres)	0.317
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference	NTE 285	Client Location	THE DOVE WAY UTTOXETER
Mass Sample taken (kg)	0.209	Moisture Content Ratio (%)	19.1
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	83.9
Particle Size <4mm	>95%		

Case

SDG	100708-104
Lab Sample Number(s)	1796087
Sampled Date	06-Jul-2010
Customer Sample Ref.	TP127
Depth (m)	2.00

Solid Waste Analysis

Total Organic Carbon (%)	-	-	-
Loss on Ignition (%)	-	-	-
Sum of BTEX (mg/kg)	-	-	-
Sum of 7 PCBs (mg/kg)	-	-	-
Mineral Oil (mg/kg)	-	-	-
PAH Sum of 17 (mg/kg)	-	-	-
pH (pH Units)	-	-	-
ANC to pH 6 (mol/kg)	-	-	-
ANC to pH 4 (mol/kg)	-	-	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	0.000097	0.000194	-	-	-
Boron	<0.0094	<0.0188	-	-	-
pH	6.6	13	-	-	-
Total Cyanide (W)	<0.05	<0.1	-	-	-
Vanadium	0.00204	0.00408	-	-	-

Leach Test Information

Date Prepared	14-Jul-2010
pH (pH Units)	7.77
Conductivity (µS/cm)	1.83
Temperature (°C)	20.60
Volume Leachant (Litres)	0.317
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference	NTE 285	Client Location	THE DOVE WAY UTTOXETER
Mass Sample taken (kg)	0.210	Moisture Content Ratio (%)	20.1
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	83.3
Particle Size <4mm	>95%		

Case

SDG	100708-104
Lab Sample Number(s)	1796247
Sampled Date	07-Jul-2010
Customer Sample Ref.	TP111
Depth (m)	0.40

Solid Waste Analysis

Total Organic Carbon (%)	-
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	-
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.000861	0.00172	-	-	-
Barium	0.0927	0.185	-	-	-
Cadmium	0.000112	0.000224	-	-	-
Chromium	0.00393	0.00786	-	-	-
Copper	0.00792	0.0158	-	-	-
Mercury Dissolved (CVAF)	0.0000261	0.0000522	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.00478	0.00956	-	-	-
Lead	0.000335	0.00067	-	-	-
Antimony	-	-	-	-	-
Selenium	0.00117	0.00234	-	-	-
Zinc	0.00627	0.0125	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	47	94	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	14-Jul-2010
pH (pH Units)	8.02
Conductivity (µS/cm)	372.00
Temperature (°C)	20.50
Volume Leachant (Litres)	0.315
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference	NTE 285	Client Location	THE DOVE WAY UTTOXETER
Mass Sample taken (kg)	0.210	Moisture Content Ratio (%)	20.1
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	83.3
Particle Size <4mm	>95%		

Case

SDG	100708-104
Lab Sample Number(s)	1796247
Sampled Date	07-Jul-2010
Customer Sample Ref.	TP111
Depth (m)	0.40

Solid Waste Analysis

Total Organic Carbon (%)	-	-	-
Loss on Ignition (%)	-	-	-
Sum of BTEX (mg/kg)	-	-	-
Sum of 7 PCBs (mg/kg)	-	-	-
Mineral Oil (mg/kg)	-	-	-
PAH Sum of 17 (mg/kg)	-	-	-
pH (pH Units)	-	-	-
ANC to pH 6 (mol/kg)	-	-	-
ANC to pH 4 (mol/kg)	-	-	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	<0.00007	<0.00014	-	-	-
Boron	0.217	0.434	-	-	-
pH	8.5	17	-	-	-
Total Cyanide (W)	<0.05	<0.1	-	-	-
Vanadium	0.00176	0.00352	-	-	-

Leach Test Information

Date Prepared	14-Jul-2010
pH (pH Units)	8.02
Conductivity (µS/cm)	372.00
Temperature (°C)	20.50
Volume Leachant (Litres)	0.315
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference	NTE 285	Client Location	THE DOVE WAY UTTOXETER
Mass Sample taken (kg)	0.222	Moisture Content Ratio (%)	27.0
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	78.8
Particle Size <4mm	>95%		

Case

SDG	100708-104
Lab Sample Number(s)	1796289
Sampled Date	07-Jul-2010
Customer Sample Ref.	TP112
Depth (m)	2.80

Solid Waste Analysis

Total Organic Carbon (%)	0.434
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	6.98
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.00429	0.00858	-	-	-
Barium	0.0735	0.147	-	-	-
Cadmium	<0.0001	<0.0002	-	-	-
Chromium	0.00715	0.0143	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.00814	0.0163	-	-	-
Lead	0.00386	0.00772	-	-	-
Antimony	-	-	-	-	-
Selenium	0.00418	0.00836	-	-	-
Zinc	0.0352	0.0704	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	49.1	98.2	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-
Copper	0.0112	0.0224	-	-	-
Mercury Dissolved (CVAF)	0.0000248	0.0000496	-	-	-

Leach Test Information

Date Prepared	14-Jul-2010
pH (pH Units)	7.39
Conductivity (µS/cm)	200.00
Temperature (°C)	20.40
Volume Leachant (Litres)	0.303
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference	NTE 285	Client Location	THE DOVE WAY UTTOXETER
Mass Sample taken (kg)	0.222	Moisture Content Ratio (%)	27.0
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	78.8
Particle Size <4mm	>95%		

Case

SDG	100708-104
Lab Sample Number(s)	1796289
Sampled Date	07-Jul-2010
Customer Sample Ref.	TP112
Depth (m)	2.80

Solid Waste Analysis

Total Organic Carbon (%)	0.434
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	6.98
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	0.000264	0.000528	-	-	-
Boron	1.12	2.24	-	-	-
pH	7.9	16	-	-	-
Total Cyanide (W)	<0.05	<0.1	-	-	-
Vanadium	0.0096	0.0192	-	-	-

Leach Test Information

Date Prepared	14-Jul-2010
pH (pH Units)	7.39
Conductivity (µS/cm)	200.00
Temperature (°C)	20.40
Volume Leachant (Litres)	0.303
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference	NTE 285	Client Location	THE DOVE WAY UTTOXETER
Mass Sample taken (kg)	0.186	Moisture Content Ratio (%)	6.11
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	94.2
Particle Size <4mm	>95%		

Case

SDG	100708-104
Lab Sample Number(s)	1796587
Sampled Date	06-Jul-2010
Customer Sample Ref.	TP133
Depth (m)	0.60

Solid Waste Analysis

Total Organic Carbon (%)	0.217
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	<0.01
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	5.81
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.00273	0.00546	-	-	-
Barium	0.0299	0.0598	-	-	-
Cadmium	0.000131	0.000262	-	-	-
Chromium	0.00204	0.00408	-	-	-
Copper	0.0107	0.0214	-	-	-
Mercury Dissolved (CVAF)	<0.00001	<0.00002	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.00463	0.00926	-	-	-
Lead	0.00629	0.0126	-	-	-
Antimony	-	-	-	-	-
Selenium	<0.00039	<0.00078	-	-	-
Zinc	0.0275	0.055	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	28.3	56.6	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	14-Jul-2010
pH (pH Units)	7.71
Conductivity (µS/cm)	93.30
Temperature (°C)	20.80
Volume Leachant (Litres)	0.339
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference	NTE 285	Client Location	THE DOVE WAY UTTOXETER
Mass Sample taken (kg)	0.186	Moisture Content Ratio (%)	6.11
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	94.2
Particle Size <4mm	>95%		

Case

SDG	100708-104
Lab Sample Number(s)	1796587
Sampled Date	06-Jul-2010
Customer Sample Ref.	TP133
Depth (m)	0.60

Solid Waste Analysis

Total Organic Carbon (%)	0.217
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	<0.01
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	5.81
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

-	-	-
-	-	-
-	-	-
-	-	-
-	-	-
-	-	-
-	-	-
-	-	-
-	-	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	0.000093	0.000186	-	-	-
Boron	<0.0094	<0.0188	-	-	-
pH	6.7	13	-	-	-
Total Cyanide (W)	<0.05	<0.1	-	-	-
Vanadium	0.00547	0.0109	-	-	-

Leach Test Information

Date Prepared	14-Jul-2010
pH (pH Units)	7.71
Conductivity (µS/cm)	93.30
Temperature (°C)	20.80
Volume Leachant (Litres)	0.339
Volume of Eluate VE1 (Litres)	

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

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Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference	NTE 285	Client Location	THE DOVE WAY UTTOXETER
Mass Sample taken (kg)	0.197	Moisture Content Ratio (%)	12.6
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	88.8
Particle Size <4mm	>95%		

Case

SDG	100708-104
Lab Sample Number(s)	1796767
Sampled Date	06-Jul-2010
Customer Sample Ref.	TP130
Depth (m)	0.20

Solid Waste Analysis

Total Organic Carbon (%)	2.47
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	7.06
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Arsenic	0.00173	0.00346	-	-	-
Barium	0.0963	0.193	-	-	-
Cadmium	0.00015	0.0003	-	-	-
Chromium	0.00586	0.0117	-	-	-
Copper	0.0189	0.0378	-	-	-
Mercury Dissolved (CVAF)	0.0000356	0.0000712	-	-	-
Molybdenum	-	-	-	-	-
Nickel	0.00559	0.0112	-	-	-
Lead	0.00111	0.00222	-	-	-
Antimony	-	-	-	-	-
Selenium	0.00211	0.00422	-	-	-
Zinc	0.00526	0.0105	-	-	-
Chloride	-	-	-	-	-
Fluoride	-	-	-	-	-
Sulphate (soluble)	16.5	33	-	-	-
Total Dissolved Solids	-	-	-	-	-
Total Monohydric Phenols (W)	-	-	-	-	-
Dissolved Organic Carbon	-	-	-	-	-

Leach Test Information

Date Prepared	14-Jul-2010
pH (pH Units)	8.11
Conductivity (µS/cm)	415.00
Temperature (°C)	20.40
Volume Leachant (Litres)	0.328
Volume of Eluate VE1 (Litres)	

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

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

Mcerts Certification does not apply to leachates

CEN 2:1 ONE STAGE BATCH TEST

REF-CEN12457-3

Client Reference	NTE 285	Client Location	THE DOVE WAY UTTOXETER
Mass Sample taken (kg)	0.197	Moisture Content Ratio (%)	12.6
Mass of dry sample (kg)	0.175	Dry Matter Content Ratio (%)	88.8
Particle Size <4mm	>95%		

Case

SDG	100708-104
Lab Sample Number(s)	1796767
Sampled Date	06-Jul-2010
Customer Sample Ref.	TP130
Depth (m)	0.20

Solid Waste Analysis

Total Organic Carbon (%)	2.47
Loss on Ignition (%)	-
Sum of BTEX (mg/kg)	-
Sum of 7 PCBs (mg/kg)	-
Mineral Oil (mg/kg)	-
PAH Sum of 17 (mg/kg)	-
pH (pH Units)	7.06
ANC to pH 6 (mol/kg)	-
ANC to pH 4 (mol/kg)	-

Eluate Analysis	Concⁿ in 2:1 eluate C₂	2:1 concⁿ leached A₂	Limit values for compliance leaching test using BS EN 12457-3 at L/S 10 l/kg		
	mg/l	mg/kg			
Beryllium	<0.00007	<0.00014	-	-	-
Boron	<0.0094	<0.0188	-	-	-
pH	8.6	17	-	-	-
Total Cyanide (W)	<0.05	<0.1	-	-	-
Vanadium	0.00316	0.00632	-	-	-

Leach Test Information

Date Prepared	14-Jul-2010
pH (pH Units)	8.11
Conductivity (µS/cm)	415.00
Temperature (°C)	20.40
Volume Leachant (Litres)	0.328
Volume of Eluate VE1 (Litres)	

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

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Mcerts Certification does not apply to leachates

Table of Results - Appendix

SDG Number : 100708-104

Client : BWB Consulting

Client Ref : NTE 285

REPORT KEY

NDP	No Determination Possible	#	ISO 17025 Accredited	*	Subcontracted Test	M	MCERTS Accredited
NFD	No Fibres Detected	PF	Possible Fibres Detected	»	Result previously reported (Incremental reports only)	EC	Equivalent Carbon (Aromatics C8-C35)

Results expressed as (e.g.) 1.03E-07 is equivalent to 1.03x10⁻⁷

Note: Method detection limits are not always achievable due to various circumstances beyond our control

Method No	Reference	Description	Wet/Dry Sample ¹
PM001		Preparation of Samples for Metals Analysis	Dry
PM024	Modified BS 1377	Soil preparation including homogenisation, moisture screens of soils for Asbestos Containing Material	Wet
PM114		Leaching Procedure for CEN Two Stage Batch Test 2:1/8:1 Cumulative	
PM115		Leaching Procedure for CEN One Stage Leach Test 2:1 & 10:1 1 Step	
TM001	In - house Method	Determination of asbestos containing material by screening on solids	
TM062 (S)	National Grid Property Holdings Methods for the Collection & Analysis of Samples from National Grid Sites version 1 Sec 3.9	Determination of Phenols in Soils by HPLC	Wet
TM089	Modified: US EPA Methods 8020 & 602	Determination of Gasoline Range Hydrocarbons (GRO) and BTEX (MTBE) compounds by Headspace GC-FID (C4-C12)	
TM098	Method 4500E, AWWA/APHA, 20th Ed., 1999	Determination of Sulphate using the Kone Analyser	Dry
TM116	Modified: US EPA Method 8260, 8120, 8020, 624, 610 & 602	Determination of Volatile Organic Compounds by Headspace / GC-MS	
TM132	In - house Method	ELTRA CS800 Operators Guide	Dry
TM133	BS 1377: Part 3 1990;BS 6068-2.5	Determination of pH in Soil and Water using the GLpH pH Meter	Wet
TM152	Method 3125B, AWWA/APHA, 20th Ed., 1999	Analysis of Aqueous Samples by ICP-MS	
TM153	Method 4500A,B,C, I, M AWWA/APHA, 20th Ed., 1999	Determination of Total Cyanide, Free (Easily Liberatable) Cyanide and Thiocyanate using the "Skalar SANS+ System" Segmented Flow Analyser	Wet
TM154	In - house Method	Determination of Petroleum Hydrocarbons by EZ Flash GC-FID in the Carbon range C6- C40	Wet
TM173	Analysis of Petroleum Hydrocarbons in Environmental Media – Total Petroleum Hydrocarbon Criteria	Determination of Speciated Extractable Petroleum Hydrocarbons in Soils by GC-FID	Dry
TM181	US EPA Method 6010B	Determination of Routine Metals in Soil by iCap 6500 Duo ICP-OES	Dry
TM183	BS EN 23506:2002, (BS 6068-2.74:2002) ISBN 0 580 38924 3	Determination of Trace Level Mercury in Waters and Leachates by PSA Cold Vapour Atomic Fluorescence Spectrometry	
TM184	EPA Methods 325.1 & 325.2,	The Determination of Anions in Aqueous Matrices using the Kone Spectrophotometric Analysers	Dry
TM218	Microwave extraction – EPA method 3546	Microwave extraction - EPA method 3546	Wet
TM222	In-House Method	Determination of Hot Water Soluble Boron in Soils (10:1 Water:soil) by IRIS Emission Spectrometer	Dry
TM227	Standard methods for the examination of waters and wastewaters 20th Edition, AWWA/APHA Method 4500.	Determination of Total Cyanide, Free (Easily Liberatable) Cyanide and Thiocyanate	
TM256	The measurement of Electrical Conductivity and the Laboratory determination of pH Value of Natural, Treated and Wastewaters. HMSO, 1978. ISBN 011 751428 4.	Determination of pH in Water and Leachate using the GLpH pH Meter	

¹ Applies to Solid samples only. DRY indicates samples have been dried at 35°C. NA = not applicable.

APPENDIX

APPENDIX

1. Results are expressed on a dry weight basis (dried at 35°C) for all soil analyses except for the following:
NRA Leach tests, flash point, ammonium as NH₄ by the BRE method, VOC TICS, SVOC TICS, TOF-MS SCAN/SEARCH and TOF-MS TICS.
2. Samples will be run in duplicate upon request, but an additional charge may be incurred.
3. If sufficient sample is received a sub sample will be retained free of charge for 30 days after analysis is completed (e-mailed) for both soil jars, tubs and volatile jars. All waters and vials will be discarded 10 days after the analysis is completed (e-mailed). All material removed during an asbestos containing material screen and analysed for the presence of asbestos will be retained for a period of 6 months after the analysis date. All samples received and not scheduled will be disposed of one month after the date of receipt unless we are instructed to the contrary. Once the initial period has expired, a storage charge will be applied for each month or part thereof until the client cancels the request for sample storage. ALcontrol Laboratories reserve the right to charge for samples received and stored but not analysed.
4. With respect to turnaround, we will always endeavour to meet client requirements wherever possible, but turnaround times cannot be absolutely guaranteed due to so many variables beyond our control.
5. We take responsibility for any test performed by sub-contractors (marked with an asterisk). We endeavour to use UKAS/MCERTS Accredited Laboratories, who either complete a quality questionnaire or are audited by ourselves. For some determinands there are no UKAS/MCERTS Accredited Laboratories, in this instance a laboratory with a known track record will be utilised.
6. When requested, the individual sub sample scheduled will be screened in house for the presence of large asbestos containing material fragments/pieces. If no asbestos containing material is found this will be reported as 'no asbestos containing material detected'. If asbestos containing material is detected it will be removed and analysed by our documented in house method TM048 based on HSG 248 (2005), which is accredited to ISO17025. If asbestos containing material is present no further analysis will be undertaken. At no point is the fibre content of the soil sample determined.
7. If no separate volatile sample is supplied by the client, the integrity of the data may be compromised if the laboratory is required to create a sub-sample from the bulk sample – similarly, if a headspace or sediment is present in the volatile sample. This will be flagged up as an invalid VOC on the test schedule or recorded on the log sheet.
8. If appropriate preserved bottles are not received preservation will take place on receipt. However, the integrity of the data may be compromised.
9. NDP – No determination possible due to insufficient/unsuitable sample.
10. Metals in water are performed on a filtered sample, and therefore represent dissolved metals – total metals must be requested separately.
11. A table containing the date of analysis for each parameter is not routinely included with the report, but is available upon request.
12. Results relate only to the items tested
13. **Surrogate recoveries** – Most of our organic methods include surrogates, the recovery of which is monitored and reported.
For EPH, MO, PAH, GRO and VOCs on soils the result is not surrogate corrected, but a percentage recovery is quoted. Acceptable limits for most organic methods are 70 – 130 %.
14. **Product analyses** – Organic analyses on products can only be semi-quantitative due to the matrix effects and high dilution factors employed.
15. Phenols monohydric by HPLC include phenol, cresols (2-Methylphenol, 3-Methylphenol and 4-Methylphenol) and Xylenols (2,3 Dimethylphenol, 2,4 Dimethylphenol, 2,5 Dimethylphenol, 2,6 Dimethylphenol, 3,4 Dimethylphenol, 3,5 Dimethylphenol).
16. Total of 5 speciated phenols by HPLC includes Phenol, 2,3,5-Trimethyl Phenol, 2-Isopropylphenol, Cresols and Xylenols (as detailed in 14).
17. Stones/debris are not routinely removed. We always endeavour to take a representative sub sample from the received sample.
18. Our MCERTS accreditation for PAHs by GCMS applies to all product types apart from Kerosene, where naphthalene only is not accredited.
19. In certain circumstances the method detection limit may be elevated due to the sample being outside the calibration range. Other factors that may contribute to this include possible interferences. In both cases the sample would be diluted which would cause the method detection limit to be raised.
19. Mercury results quoted on soils will not include volatile mercury as the analysis is performed on a dried and crushed sample.
20. For the BSEN 12457-3 two batch process to allow the cumulative release to be calculated, the volume of the leachate produced is measured and filtered for all tests. We therefore cannot carry out any unfiltered analysis. The tests affected include volatiles GCFID/GCMS and all subcontracted analysis.
21. For all leachate preparations (NRA, DIN, TCLP, BSEN 12457-1, 2, 3) volatile loss may occur, as we do not employ zero headspace extraction.
22. We are accredited to MCERTS for sand, clay and loam/topsoil, or any of these materials – whether these are derived from naturally occurring soil profiles, or from fill/made ground, as long as these materials constitute the major part of the sample. Other coarse granular material such as concrete, gravel and brick are not accredited if they comprise the major part of the sample.
23. Analysis and identification of specific compounds using GCFID is by retention time only, and we routinely calibrate and quantify for benzene, toluene, ethylbenzenes and xylenes (BTEX). For total volatiles in the C4 – C10 range, the total area of the chromatogram is integrated and expressed as ug/kg or ug/l. Although this analysis is commonly used for the quantification of gasoline range organics (GRO), the system will also detect other compounds such as chlorinated solvents, and this may lead to a falsely high result with respect to hydrocarbons only. It is not possible to specifically identify these non-hydrocarbons, as standards are not routinely run for any other compounds, and for more definitive identification, volatiles by GCMS should be utilised.

LIQUID MATRICES EXTRACTION SUMMARY

ANALYSIS	EXTRACTION SOLVENT	EXTRACTION METHOD	ANALYSIS
PAH MS	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC MS
EPH	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC FID
EPH CWG	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC FID
MINERAL OIL	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC FID
PCB 7 CONGENERS	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC MS
PCB TOTAL	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GS MS
SVOC	DCM	LIQUID/LIQUID SHAKE	GC MS
FREE SULPHUR	DCM	SOLID PHASE EXTRACTION	HPLC
PEST OCP/OPP	DCM	LIQUID/LIQUID SHAKE	GC MS
TRIAZINE HERBS	DCM	LIQUID/LIQUID SHAKE	GC MS
PHENOLS MS	DCM	SOLID PHASE EXTRACTION	GC MS
TPH by INFRA RED (IR)	TCE	LIQUID/LIQUID EXTRACTION	HPLC
MINERAL OIL by IR	TCE	LIQUID/LIQUID EXTRACTION	HPLC
GLYCOLS	NONE	DIRECT INJECTION	GC FID

SOLID MATRICES EXTRACTION SUMMARY

ANALYSIS	D/C OR WET	EXTRACTION SOLVENT	EXTRACTION METHOD	ANALYSIS
Solvent Extractable Matter	D&C	DCM	SOXTHERM	GRAVIMETRIC
Cyclohexane Ext. Matter	D&C	CYCLOHEXANE	SOXTHERM	GRAVIMETRIC
Thin Layer Chromatography	D&C	DCM	SOXTHERM	IATROSCAN
Elemental Sulphur	D&C	DCM	SOXTHERM	HPLC
Phenols by GCMS	WET	DCM	SOXTHERM	GC-MS
Herbicides	D&C	HEXANE:ACETONE	SOXTHERM	GC-MS
Pesticides	D&C	HEXANE:ACETONE	SOXTHERM	GC-MS
EPH (DRO)	D&C	HEXANE:ACETONE	END OVER END	GC-FID
EPH (Min oil)	D&C	HEXANE:ACETONE	END OVER END	GC-FID
EPH (Cleaned up)	D&C	HEXANE:ACETONE	END OVER END	GC-FID
EPH CWG by GC	D&C	HEXANE:ACETONE	END OVER END	GC-FID
PCB tot / PCB con	D&C	HEXANE:ACETONE	END OVER END	GC-MS
Polyaromatic Hydrocarbons (MS)	WET	HEXANE:ACETONE	Microwave TM218.	GC-MS
C8-C40 (C6-C40)EZ Flash	WET	HEXANE:ACETONE	SHAKER	GC-EZ
Polyaromatic Hydrocarbons Rapid GC	WET	HEXANE:ACETONE	SHAKER	GC-EZ
Semi Volatile Organic Compounds	WET	DCM:ACETONE	SONICATE	GC-MS

Identification of Asbestos in Bulk Materials

The results for asbestos identification for soil samples are obtained from possible Asbestos Containing Material, removed during the 'Screening of soils for Asbestos Containing Materials', which have been examined to determine the presence of asbestos fibres using Alcontrol Laboratories (Hawarden) in-house method of transmitted/polarised light microscopy and central stop dispersion staining, based on HSG 248 (2005).

Visual Estimation Of Fibre Content.

Estimation of fibre content is not permitted as part of our UKAS accredited test other than: -

Trace – Where only one or two asbestos fibres were identified.

Further guidance on typical asbestos fibre content of manufactured products can be found in MDHS 100.

The identification of asbestos containing materials falls within our schedule of tests for which we hold UKAS accreditation, however opinions, interpretations and all other information contained in the report are outside the scope of UKAS accreditation.

Asbestos Type

Common Name

Chrysotile	White Asbestos
Amosite	Brown Asbestos
Crocidolite	Blue Asbestos
Fibrous Actinolite	-
Fibrous Anthophyllite	-
Fibrous Tremolite	-

APPENDIX 6
SURFACE WATER AND GROUNDWATER
CHEMICAL LABORATORY TESTING



BWB Consulting
3-4 Kayes Walk
The Lace Market
Nottingham
Nottinghamshire
NG1 1PY

Attention: Richard Robinson

CERTIFICATE OF ANALYSIS

Date: 26 July 2010
Customer: H_BWB_NTT-81
Sample Delivery Group (SDG): 100719-5 **Report No.:** 91589
Your Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

We received 12 samples on Monday July 19, 2010 and 9 of these samples were scheduled for analysis which was completed on Monday July 26, 2010. Accredited laboratory tests are defined within the report, but opinions, interpretations and on-site data expressed herein are outside the scope of ISO 17025 accreditation.

Should this report require incorporation into client reports, it must be used in its entirety and not simply with the data sections alone.

All chemical testing (unless subcontracted) is performed at ALcontrol Hawarden Laboratories.

Asbestos testing - we are not accredited for screening soil samples for asbestos fibres. We are only accredited to identify asbestos fibres in bulk material (ACM).

Approved By:

Iain Swinton

Operations Director - Land UK & Ireland



SDG:	100719-5	Customer:	BWB Consulting
Job:	H_BWB_NTT-81	Attention:	Richard Robinson
Client Reference:	NTE 285	Order No.:	NE09/619
Location:	THE DOVE WAY UTTOXETER	Report No:	91589

Received Sample Overview

Lab Sample No(s)	Customer Sample Ref.	Depth (m)	Sampled Date
1836076	BH1		15/07/2010
1835995	BH2		15/07/2010
1836005	BH3		15/07/2010
1836110	BH4		15/07/2010
1836201	BH5		15/07/2010
1836009	BH6		15/07/2010
1836214	BH7		15/07/2010
1836172	BH8		15/07/2010
1836164	BH9		15/07/2010
1836045	BROOK-DOWN		15/07/2010
1836018	BROOK-MID		15/07/2010
1836224	BROOK-UP		15/07/2010

Only received samples which have had analysis scheduled will be shown on the following pages.

Total	
Vial	NaOH
0	9
0	9
0	9
0	9
X	9
0	9
0	9
0	9
0	9
0	9
X	9
0	9
0	9
0	9
0	9
X	9
0	9

SDG: 100719-5
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/619
Report No.: 91589

Test Completion dates

SDG reference: 100719-5

Lab Sample No(s)	1835995	1836005	1836018	1836045	1836076	1836164	1836172	1836214	1836224
Customer Sample Ref.	BH2	BH3	BROOK-MID	BROOK-DOWN	BH1	BH9	BH8	BH7	BROOK-UP
Depth									
Type	LIQUID	LIQUID	LIQUID	LIQUID	LIQUID	LIQUID	LIQUID	LIQUID	LIQUID
Ammonium	19/07/2010	19/07/2010	20/07/2010	20/07/2010	19/07/2010	20/07/2010	20/07/2010	19/07/2010	20/07/2010
Anions by Kone (w)	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010
Conductivity (at 20 deg.C)	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010
Cyanide	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010
Dissolved Metals by ICP-MS	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010	23/07/2010	23/07/2010	21/07/2010	23/07/2010
EPH (DRO) (C10-C40) Aqueous (W)	20/07/2010	21/07/2010	20/07/2010	20/07/2010	21/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010
EPH CWG (Aliphatic) Aqueous GC	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010
EPH CWG (Aromatic) Aqueous GC	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010
GRO by GC-FID (W)	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010	26/07/2010	22/07/2010	22/07/2010	22/07/2010
Mercury Dissolved	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010
PAH Spec MS - Aqueous (W)	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010	21/07/2010
pH Value	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010	20/07/2010
Phenols by HPLC (W)	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010
TPH CWG (W)	22/07/2010	22/07/2010	22/07/2010	22/07/2010	22/07/2010	26/07/2010	22/07/2010	22/07/2010	22/07/2010

SDG: 100719-5
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/619
Report No.: 91589

Results Legend		Customer Sample Ref.	BH1	BH2	BH3	BH7	BH8	BH9
#	ISO17025 accredited.	Depth (m) Sample Type Date Sampled Date Received SDG Ref Lab Sample No.(s)	Water(GW/SW)	Water(GW/SW)	Water(GW/SW)	Water(GW/SW)	Water(GW/SW)	Water(GW/SW)
M	mCERTS accredited.		15/07/2010	15/07/2010	15/07/2010	15/07/2010	15/07/2010	15/07/2010
aq	Aqueous / settled sample.		19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010
diss.filt	Dissolved / filtered sample.		100719-5	100719-5	100719-5	100719-5	100719-5	100719-5
tot.unfilt	Total / unfiltered sample.		1836076	1835995	1836005	1836214	1836172	1836164
*	subcontracted test.							
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.							
Component	LOD/Units	Method						
Ammoniacal Nitrogen as N	<0.2 mg/l	TM099	0.266 #	17.5 #	23.1 #	0.803 #	13.9 #	15.6 #
Conductivity @ 20 deg.C	<0.014 mS/cm	TM120	1.22 #	1.6 #	1.16 #	0.699 #	1.78 #	1.55 #
Arsenic (diss.filt)	<0.12 µg/l	TM152	2.88 #	1.17 #	1.79 #	1.13 #	1.8 #	1.98 #
Barium (diss.filt)	<0.03 µg/l	TM152	54.8 #	159 #	429 #	44.6 #	54.4 #	86.8 #
Beryllium (diss.filt)	<0.07 µg/l	TM152	<0.07 #	<0.07 #	<0.07 #	<0.07 #	<0.07 #	<0.07 #
Boron (diss.filt)	<9.4 µg/l	TM152	405 #	1540 #	1180 #	110 #	217 #	149 #
Cadmium (diss.filt)	<0.1 µg/l	TM152	0.128 #	0.119 #	<0.1 #	0.38 #	0.26 #	0.104 #
Chromium (diss.filt)	<0.22 µg/l	TM152	6.52 #	13.6 #	12.9 #	6.24 #	6.61 #	9.28 #
Copper (diss.filt)	<0.85 µg/l	TM152	1.68 #	2.68 #	1.12 #	0.875 #	6.22 #	3.61 #
Lead (diss.filt)	<0.02 µg/l	TM152	0.027 #	0.05 #	<0.02 #	<0.02 #	0.051 #	0.108 #
Nickel (diss.filt)	<0.15 µg/l	TM152	11.6 #	17 #	12.4 #	5.14 #	9.35 #	7.43 #
Selenium (diss.filt)	<0.39 µg/l	TM152	0.423 #	1.03 #	1.3 #	0.961 #	8.05 #	5.81 #
Vanadium (diss.filt)	<0.24 µg/l	TM152	2.14 #	4.28 #	4.2 #	4.17 #	2.93 #	2.93 #
Zinc (diss.filt)	<0.41 µg/l	TM152	3.73 #	2.08 #	4.2 #	1.02 #	4.77 #	12.9 #
EPH Range >C10 - C40 (aq)	<46 µg/l	TM172	52.3 #	<46 #	84.4 #	<46 #	823 #	1880 #
Mercury (diss.filt)	<0.01 µg/l	TM183	<0.01 #	<0.01 #	<0.01 #	<0.01 #	<0.01 #	<0.01 #
Sulphate	<3 mg/l	TM184	230 #	413 #	51.3 #	85.4 #	412 #	366 #
Cyanide, Total	<0.05 mg/l	TM227	<0.05 #	<0.05 #	<0.05 #	<0.05 #	1.63 #	0.957 #
pH	<1 pH Units	TM256	7.67 #	7.78 #	7.85 #	8.09 #	7.97 #	7.65 #
Phenols, Total monohydric	<0.015 mg/l	TM259	<0.015 #	<0.015 #	<0.015 #	<0.015 #	<0.015 #	<0.015 #

SDG: 100719-5
Job: H_BWB_NTT-81
Client Reference: NTE 285
Location: THE DOVE WAY UTTOXETER

Customer: BWB Consulting
Attention: Richard Robinson
Order No.: NE09/619
Report No: 91589

TPH CWG (W)

Results Legend		Customer Sample Ref.	BH1	BH2	BH3	BH7	BH8	BH9
#	ISO17025 accredited.	Depth (m) Sample Type Date Sampled Date Received SDG Ref Lab Sample No.(s)	Water(GW/SW)	Water(GW/SW)	Water(GW/SW)	Water(GW/SW)	Water(GW/SW)	Water(GW/SW)
M	mCERTS accredited.		15/07/2010	15/07/2010	15/07/2010	15/07/2010	15/07/2010	15/07/2010
aq	Aqueous / settled sample.		19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010	19/07/2010
diss.filt	Dissolved / filtered sample.		100719-5	100719-5	100719-5	100719-5	100719-5	100719-5
tot.unfilt	Total / unfiltered sample.		1836076	1835995	1836005	1836214	1836172	1836164
*	subcontracted test.							
**	% recovery of the surrogate standard to check the efficiency of the method. The results of the individual compounds within the samples are not corrected for this recovery.							
Component	LOD/Units	Method						
Total Aliphatics >C5-C35 (aq)	<10 µg/l	TM174	<10	<10	<10	<10	<10	329
Total Aromatics >C6-C35 (aq)	<10 µg/l	TM174	<10	<10	<10	<10	317	635
Total Aliphatics & Aromatics >C5-35 (aq)	<10 µg/l	TM174	<10	<10	<10	<10	317	964
Aliphatics >C12-C16 (aq)	<10 µg/l	TM174	<10	<10	<10	<10	<10	<10
Aromatics >EC12-EC16 (aq)	<10 µg/l	TM174	<10	<10	<10	<10	28	<10
Aliphatics >C16-C21 (aq)	<10 µg/l	TM174	<10	<10	<10	<10	<10	22
Aromatics >EC16-EC21 (aq)	<10 µg/l	TM174	<10	<10	<10	<10	75	31
Aliphatics >C21-C35 (aq)	<10 µg/l	TM174	<10	<10	<10	<10	<10	307
Aromatics >EC21-EC35 (aq)	<10 µg/l	TM174	<10	<10	<10	<10	214	604
Total Aliphatics >C12-C35 (aq)	<10 µg/l	TM174	<10	<10	<10	<10	<10	329
Total Aromatics >EC12-EC35 (aq)	<10 µg/l	TM174	<10	<10	<10	<10	317	635
Total Aliphatics & Aromatics >C12-C35 (Aqueous)	<10 µg/l	TM174	<10	<10	<10	<10	317	964
GRO Surrogate % recovery**	%	TM245	94	90	91	96	101	89
GRO >C5-C12	<50 µg/l	TM245	<50	<50	<50	<50	<50	<50
Benzene	<7 µg/l	TM245	<7 #	<7 #	<7 #	<7 #	<7 #	<7 #
Ethylbenzene	<5 µg/l	TM245	<5 #	<5 #	<5 #	<5 #	<5 #	<5 #
Toluene	<4 µg/l	TM245	<4 #	<4 #	<4 #	<4 #	<4 #	<4 #
m,p-Xylene	<8 µg/l	TM245	<8 #	<8 #	<8 #	<8 #	<8 #	<8 #
o-Xylene	<3 µg/l	TM245	<3 #	<3 #	<3 #	<3 #	<3 #	<3 #
m,p,o-Xylene	<10 µg/l	TM245	<10 #	<10 #	<10 #	<10 #	<10 #	<10 #
BTEX, Total	<10 µg/l	TM245	<10 #	<10 #	<10 #	<10 #	<10 #	<10 #
Methyl tertiary butyl ether (MTBE)	<3 µg/l	TM245	<3 #	<3 #	<3 #	<3 #	<3 #	<3 #
Aliphatics >C5-C6	<10 µg/l	TM245	<10	<10	<10	<10	<10	<10
Aliphatics >C6-C8	<10 µg/l	TM245	<10	<10	<10	<10	<10	<10
Aliphatics >C8-C10	<10 µg/l	TM245	<10	<10	<10	<10	<10	<10
Aliphatics >C10-C12	<10 µg/l	TM245	<10	<10	<10	<10	<10	<10
Aromatics >C6-C7	<10 µg/l	TM245	<10	<10	<10	<10	<10	<10
Aromatics >C7-C8	<10 µg/l	TM245	<10	<10	<10	<10	<10	<10
Aromatics >EC8-EC10	<10 µg/l	TM245	<10	<10	<10	<10	<10	<10
Aromatics >EC10-EC12	<10 µg/l	TM245	<10	<10	<10	<10	<10	<10
Total Aliphatics >C5-C12	<10 µg/l	TM245	<10	<10	<10	<10	<10	<10
Total Aromatics >C6-C12	<10 µg/l	TM245	<10	<10	<10	<10	<10	<10

Table of Results - Appendix

SDG Number : 100719-5

Client : BWB Consulting

Client Ref : NTE 285

REPORT KEY

Results expressed as (e.g.) 1.03E-07 is equivalent to 1.03x10⁻⁷

NDP	No Determination Possible	#	ISO 17025 Accredited	*	Subcontracted Test	M	MCERTS Accredited
NFD	No Fibres Detected	PFD	Possible Fibres Detected	»	Result previously reported (Incremental reports only)	EC	Equivalent Carbon (Aromatics C8-C35)

Note: Method detection limits are not always achievable due to various circumstances beyond our control

Method No	Reference	Description	Wet/Dry Sample ¹
TM061	Method for the Determination of EPH, Massachusetts Dept. of EP, 1998	Determination of Extractable Petroleum Hydrocarbons by GC-FID (C10-C40)	
TM099	BS 2690: Part 7:1968 / BS 6068: Part 2.11:1984	Determination of Ammonium in Water Samples using the Kone Analyser	
TM120	Method 2510B, AWWA/APHA, 20th Ed., 1999 / BS 2690: Part 9:1970	Determination of Electrical Conductivity using a Conductivity Meter	
TM152	Method 3125B, AWWA/APHA, 20th Ed., 1999	Analysis of Aqueous Samples by ICP-MS	
TM172	Analysis of Petroleum Hydrocarbons in Environmental Media – Total Petroleum Hydrocarbon Criteria	EPH in Waters	
TM174	Analysis of Petroleum Hydrocarbons in Environmental Media – Total Petroleum Hydrocarbon Criteria	Determination of Speciated Extractable Petroleum Hydrocarbons in Waters by GC-FID	
TM178	Modified: US EPA Method 8100	Determination of Polynuclear Aromatic Hydrocarbons (PAH) by GC-MS in Waters	
TM183	BS EN 23506:2002, (BS 6068-2.74:2002) ISBN 0 580 38924 3	Determination of Trace Level Mercury in Waters and Leachates by PSA Cold Vapour Atomic Fluorescence Spectrometry	
TM184	EPA Methods 325.1 & 325.2,	The Determination of Anions in Aqueous Matrices using the Kone Spectrophotometric Analysers	
TM227	Standard methods for the examination of waters and wastewaters 20th Edition, AWWA/APHA Method 4500.	Determination of Total Cyanide, Free (Easily Liberatable) Cyanide and Thiocyanate	
TM245	By GC-FID	Determination of GRO by Headspace in waters	
TM256	The measurement of Electrical Conductivity and the Laboratory determination of pH Value of Natural, Treated and Wastewaters. HMSO, 1978. ISBN 011 751428 4.	Determination of pH in Water and Leachate using the GLpH pH Meter	
TM259			

¹ Applies to Solid samples only. DRY indicates samples have been dried at 35°C. NA = not applicable.

APPENDIX

APPENDIX

1. Results are expressed on a dry weight basis (dried at 35°C) for all soil analyses except for the following:
NRA Leach tests, flash point, ammonium as NH₄ by the BRE method, VOC TICS, SVOC TICS, TOF-MS SCAN/SEARCH and TOF-MS TICS.
2. Samples will be run in duplicate upon request, but an additional charge may be incurred.
3. If sufficient sample is received a sub sample will be retained free of charge for 30 days after analysis is completed (e-mailed) for both soil jars, tubs and volatile jars. All waters and vials will be discarded 10 days after the analysis is completed (e-mailed). All material removed during an asbestos containing material screen and analysed for the presence of asbestos will be retained for a period of 6 months after the analysis date. All samples received and not scheduled will be disposed of one month after the date of receipt unless we are instructed to the contrary. Once the initial period has expired, a storage charge will be applied for each month or part thereof until the client cancels the request for sample storage. ALcontrol Laboratories reserve the right to charge for samples received and stored but not analysed.
4. With respect to turnaround, we will always endeavour to meet client requirements wherever possible, but turnaround times cannot be absolutely guaranteed due to so many variables beyond our control.
5. We take responsibility for any test performed by sub-contractors (marked with an asterisk). We endeavour to use UKAS/MCERTS Accredited Laboratories, who either complete a quality questionnaire or are audited by ourselves. For some determinands there are no UKAS/MCERTS Accredited Laboratories, in this instance a laboratory with a known track record will be utilised.
6. When requested, the individual sub sample scheduled will be screened in house for the presence of large asbestos containing material fragments/pieces. If no asbestos containing material is found this will be reported as 'no asbestos containing material detected'. If asbestos containing material is detected it will be removed and analysed by our documented in house method TM048 based on HSG 248 (2005), which is accredited to ISO17025. If asbestos containing material is present no further analysis will be undertaken. At no point is the fibre content of the soil sample determined.
7. If no separate volatile sample is supplied by the client, the integrity of the data may be compromised if the laboratory is required to create a sub-sample from the bulk sample – similarly, if a headspace or sediment is present in the volatile sample. This will be flagged up as an invalid VOC on the test schedule or recorded on the log sheet.
8. If appropriate preserved bottles are not received preservation will take place on receipt. However, the integrity of the data may be compromised.
9. NDP – No determination possible due to insufficient/unsuitable sample.
10. Metals in water are performed on a filtered sample, and therefore represent dissolved metals – total metals must be requested separately.
11. A table containing the date of analysis for each parameter is not routinely included with the report, but is available upon request.
12. Results relate only to the items tested
13. **Surrogate recoveries** – Most of our organic methods include surrogates, the recovery of which is monitored and reported.
For EPH, MO, PAH, GRO and VOCs on soils the result is not surrogate corrected, but a percentage recovery is quoted. Acceptable limits for most organic methods are 70 – 130 %.
14. **Product analyses** – Organic analyses on products can only be semi-quantitative due to the matrix effects and high dilution factors employed.
15. Phenols monohydric by HPLC include phenol, cresols (2-Methylphenol, 3-Methylphenol and 4-Methylphenol) and Xylenols (2,3 Dimethylphenol, 2,4 Dimethylphenol, 2,5 Dimethylphenol, 2,6 Dimethylphenol, 3,4 Dimethylphenol, 3,5 Dimethylphenol).
16. Total of 5 speciated phenols by HPLC includes Phenol, 2,3,5-Trimethyl Phenol, 2-Isopropylphenol, Cresols and Xylenols (as detailed in 14).
17. Stones/debris are not routinely removed. We always endeavour to take a representative sub sample from the received sample.
18. Our MCERTS accreditation for PAHs by GCMS applies to all product types apart from Kerosene, where naphthalene only is not accredited.
19. In certain circumstances the method detection limit may be elevated due to the sample being outside the calibration range. Other factors that may contribute to this include possible interferences. In both cases the sample would be diluted which would cause the method detection limit to be raised.
19. Mercury results quoted on soils will not include volatile mercury as the analysis is performed on a dried and crushed sample.
20. For the BSEN 12457-3 two batch process to allow the cumulative release to be calculated, the volume of the leachate produced is measured and filtered for all tests. We therefore cannot carry out any unfiltered analysis. The tests affected include volatiles GCFID/GCMS and all subcontracted analysis.
21. For all leachate preparations (NRA, DIN, TCLP, BSEN 12457-1, 2, 3) volatile loss may occur, as we do not employ zero headspace extraction.
22. We are accredited to MCERTS for sand, clay and loam/topsoil, or any of these materials – whether these are derived from naturally occurring soil profiles, or from fill/made ground, as long as these materials constitute the major part of the sample. Other coarse granular material such as concrete, gravel and brick are not accredited if they comprise the major part of the sample.
23. Analysis and identification of specific compounds using GCFID is by retention time only, and we routinely calibrate and quantify for benzene, toluene, ethylbenzenes and xylenes (BTEX). For total volatiles in the C4 – C10 range, the total area of the chromatogram is integrated and expressed as ug/kg or ug/l. Although this analysis is commonly used for the quantification of gasoline range organics (GRO), the system will also detect other compounds such as chlorinated solvents, and this may lead to a falsely high result with respect to hydrocarbons only. It is not possible to specifically identify these non-hydrocarbons, as standards are not routinely run for any other compounds, and for more definitive identification, volatiles by GCMS should be utilised.

LIQUID MATRICES EXTRACTION SUMMARY

ANALYSIS	EXTRACTION SOLVENT	EXTRACTION METHOD	ANALYSIS
PAH MS	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC MS
EPH	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC FID
EPH CWG	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC FID
MINERAL OIL	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC FID
PCB 7 CONGENERS	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GC MS
PCB TOTAL	HEXANE	STIRRED EXTRACTION (STIR-BAR)	GS MS
SVOC	DCM	LIQUID/LIQUID SHAKE	GC MS
FREE SULPHUR	DCM	SOLID PHASE EXTRACTION	HPLC
PEST OCP/OPP	DCM	LIQUID/LIQUID SHAKE	GC MS
TRIAZINE HERBS	DCM	LIQUID/LIQUID SHAKE	GC MS
PHENOLS MS	DCM	SOLID PHASE EXTRACTION	GC MS
TPH by INFRA RED (IR)	TCE	LIQUID/LIQUID EXTRACTION	HPLC
MINERAL OIL by IR	TCE	LIQUID/LIQUID EXTRACTION	HPLC
GLYCOLS	NONE	DIRECT INJECTION	GC FID

SOLID MATRICES EXTRACTION SUMMARY

ANALYSIS	D/C OR WET	EXTRACTION SOLVENT	EXTRACTION METHOD	ANALYSIS
Solvent Extractable Matter	D&C	DCM	SOX THERM	GRAVIMETRIC
Cyclohexane Ext. Matter	D&C	CYCLOHEXANE	SOX THERM	GRAVIMETRIC
Thin Layer Chromatography	D&C	DCM	SOX THERM	IATROSCAN
Elemental Sulphur	D&C	DCM	SOX THERM	HPLC
Phenols by GCMS	WET	DCM	SOX THERM	GC-MS
Herbicides	D&C	HEXANE:ACETONE	SOX THERM	GC-MS
Pesticides	D&C	HEXANE:ACETONE	SOX THERM	GC-MS
EPH (DRO)	D&C	HEXANE:ACETONE	END OVER END	GC-FID
EPH (Min oil)	D&C	HEXANE:ACETONE	END OVER END	GC-FID
EPH (Cleaned up)	D&C	HEXANE:ACETONE	END OVER END	GC-FID
EPH CWG by GC	D&C	HEXANE:ACETONE	END OVER END	GC-FID
PCB tot / PCB con	D&C	HEXANE:ACETONE	END OVER END	GC-MS
Polyaromatic Hydrocarbons (MS)	WET	HEXANE:ACETONE	Microwave TM218.	GC-MS
C8-C40 (C6-C40)EZ Flash	WET	HEXANE:ACETONE	SHAKER	GC-EZ
Polyaromatic Hydrocarbons Rapid GC	WET	HEXANE:ACETONE	SHAKER	GC-EZ
Semi Volatile Organic Compounds	WET	DCM:ACETONE	SONICATE	GC-MS

Identification of Asbestos in Bulk Materials

The results for asbestos identification for soil samples are obtained from possible Asbestos Containing Material, removed during the 'Screening of soils for Asbestos Containing Materials', which have been examined to determine the presence of asbestos fibres using Alcontrol Laboratories (Hawarden) in-house method of transmitted/polarised light microscopy and central stop dispersion staining, based on HSG 248 (2005).

Visual Estimation Of Fibre Content.

Estimation of fibre content is not permitted as part of our UKAS accredited test other than: -

Trace – Where only one or two asbestos fibres were identified.

Further guidance on typical asbestos fibre content of manufactured products can be found in MDHS 100.

The identification of asbestos containing materials falls within our schedule of tests for which we hold UKAS accreditation, however opinions, interpretations and all other information contained in the report are outside the scope of UKAS accreditation.

Asbestos Type

Common Name

Chrysotile	White Asbestos
Amosite	Brown Asbestos
Crocidolite	Blue Asbestos
Fibrous Actinolite	-
Fibrous Anthophyllite	-
Fibrous Tremolite	-

APPENDIX 7
GEOTECHNICAL LABORATORY TESTING



LABORATORY REPORT



4043

Contract Number: PSL10/1341

Client's Reference:

Report Date: 04 August 2010

Client Name: BWB Consulting
3-4 Kayes Walk
The Lace Market
Nottingham

NG1 1PY

For the attention of: Richard Robinson

Contract Title: The Dove Way, Uttoxeter

Date Received: 19-Jul-10

Date Commenced: 19-Jul-10

Date Completed: 4-Aug-10

Notes: Observations 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)


D Lambe
(Senior Technician)

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Doncaster DN4 0AR
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Page 1 of

SUMMARY OF LABORATORY SOIL DESCRIPTIONS

Hole Number	Sample Number	Sample Type	Depth m	Description of Sample
BH1		D	1.80	Dark brown gravelly sandy CLAY
BH1		B	4.00-4.50	Brown sandy slightly silty GRAVEL with some cobbles.
BH2		B	3.00-3.50	Brown sandy slightly silty GRAVEL.
BH2		B	6.50-7.00	Brown sandy slightly silty GRAVEL.
BH2		D	8.90	Reddish brown very sandy CLAY.
BH3		D	2.60	Brown slightly sandy CLAY.
BH3		B	4.00-4.50	Brown very sandy silty GRAVEL with occasional cobbles.
BH3		B	6.50-7.00	Brown sandy slightly silty GRAVEL.
BH3		D	8.40	Reddish brown very sandy CLAY.
BH4		D	0.90	Brown slightly sandy CLAY.
BH4		B	1.50-2.00	Brown sandy slightly silty GRAVEL.
BH4		B	3.00-3.50	Brown very sandy slightly silty GRAVEL.
BH4		D	5.40	Reddish brown slightly gravelly very sandy CLAY.
BH5		D	3.00	Reddish brown very sandy CLAY.
BH6		D	0.50	Brown slightly gravelly very sandy CLAY.
BH6		B	3.00-3.50	Brown slightly gravelly slightly silty SAND.
BH6		D	6.70	Reddish brown very sandy CLAY.
BH7		B	0.20-0.70	MADE GROUND dark brown very sandy clayey gravel with some cobbles.
BH7		B	2.00-2.50	Brown very sandy slightly silty GRAVEL.

 Professional Soils Laboratory	Compiled by	Date	Checked by	Date	Approved by	Date
	<i>Mat</i>	29/07/10	<i>es</i>	04/08/10	<i>es</i>	04/08/10
	THE DOVE WAY, UTTOXETER.				Contract No:	PSL10/1341
				Client Ref:	NTE285	


SUMMARY OF SOIL CLASSIFICATION TESTS

(B.S. 1377 : PART 2 : 1990)

Hole Number	Sample Number	Sample Type	Depth m	Moisture Content % <small>Clause 3.2</small>	Bulk Density Mg/m ³ <small>Clause 7.2</small>	Dry Density Mg/m ³ <small>Clause 7.2</small>	Particle Density Mg/m ³ <small>Clause 8.</small>	Liquid Limit % <small>Clause 4.3/4.4</small>	Plastic Limit % <small>Clause 5.</small>	Plasticity Index % <small>Clause 6.</small>	% Passing .425mm	Remarks
BH1		D	1.80	25				43	24	19	80	Intermediate plasticity CI.
BH2		D	8.90	15				32	18	14	100	Low plasticity CL.
BH3		D	2.60	34				56	26	30	100	High plasticity CH.
BH3		D	8.40	17				32	19	13	100	Low plasticity CL.
BH4		D	0.90	28				55	27	28	100	High plasticity CH.
BH4		D	5.40	18				30	17	13	96	Low plasticity CL.
BH5		D	3.00	20				34	20	14	100	Low plasticity CL.
BH6		D	0.50	22				29	17	12	95	Low plasticity CL.
BH6		D	6.70	24				34	20	14	100	Low plasticity CL.
BH7		D	4.60	18				32	20	12	98	Low plasticity CL.
BH8		D	6.00	21				31	19	12	84	Low plasticity CL.
BH9		D	2.50	12				27	15	12	81	Low plasticity CL.
BH9		D	4.50	17				28	17	11	80	Low plasticity CL.
TP101		D	0.50	34				53	26	27	100	High plasticity CH.

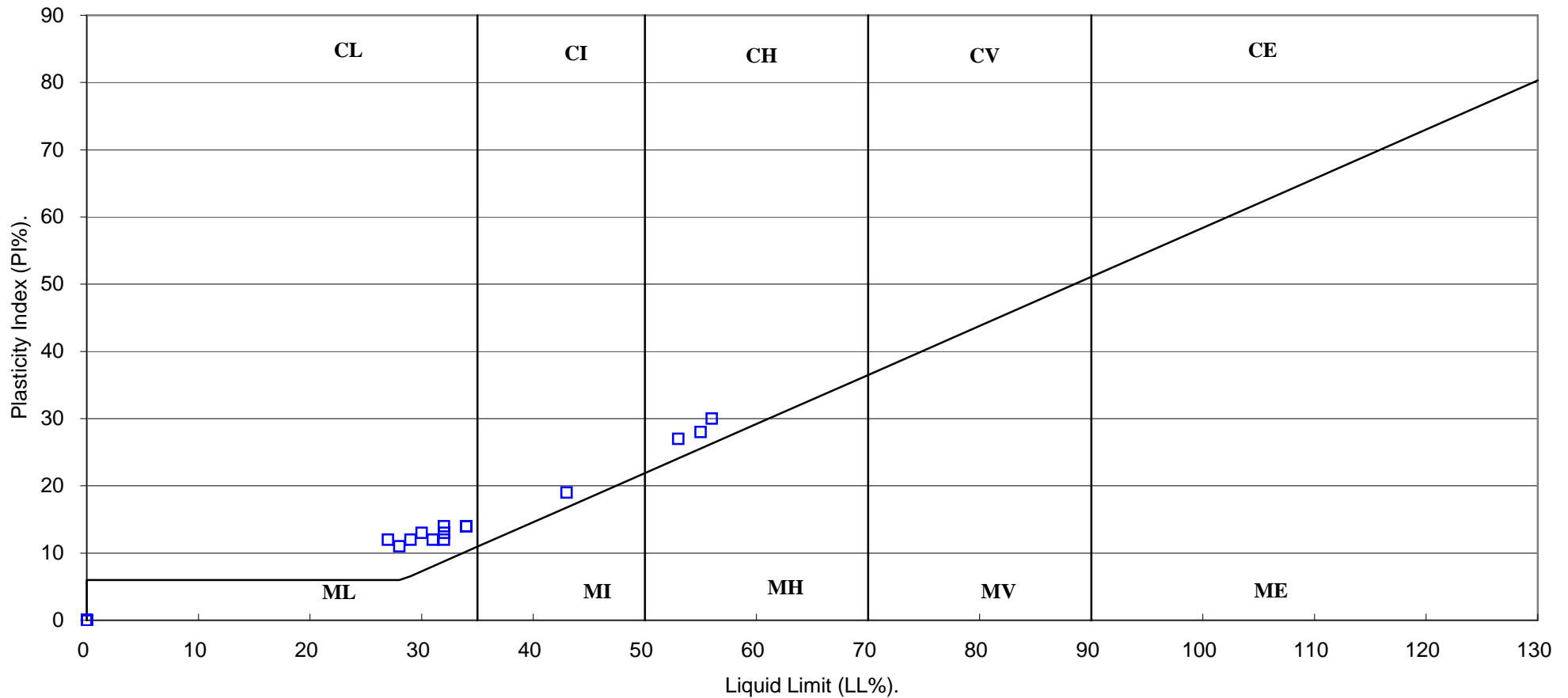
SYMBOLS : NP : Non Plastic

* : Liquid Limit and Plastic Limit Wet Sieved.

	Compiled by	Date	Checked by	Date	Approved by	Date
	<i>Mat</i>	29/07/10	<i>eg</i>	04/08/10	<i>eg</i>	04/08/10
	THE DOVE WAY, UTTOXETER.					Contract No:
					Client Ref:	NTE285

PLASTICITY CHART FOR CASAGRANDE CLASSIFICATION.

(B.S.5930 : 1999)



Compiled by	Date	Checked by	Date	Approved by	Date
<i>Mat</i>	29/07/10	<i>es</i>	04/08/10	<i>es</i>	04/08/10
THE DOVE WAY, UTTOXETER.				Contract No:	PSL10/1341
				Client Ref:	NTE285

Particle Size Distribution Test

BS1377 : Part 2 : 1990

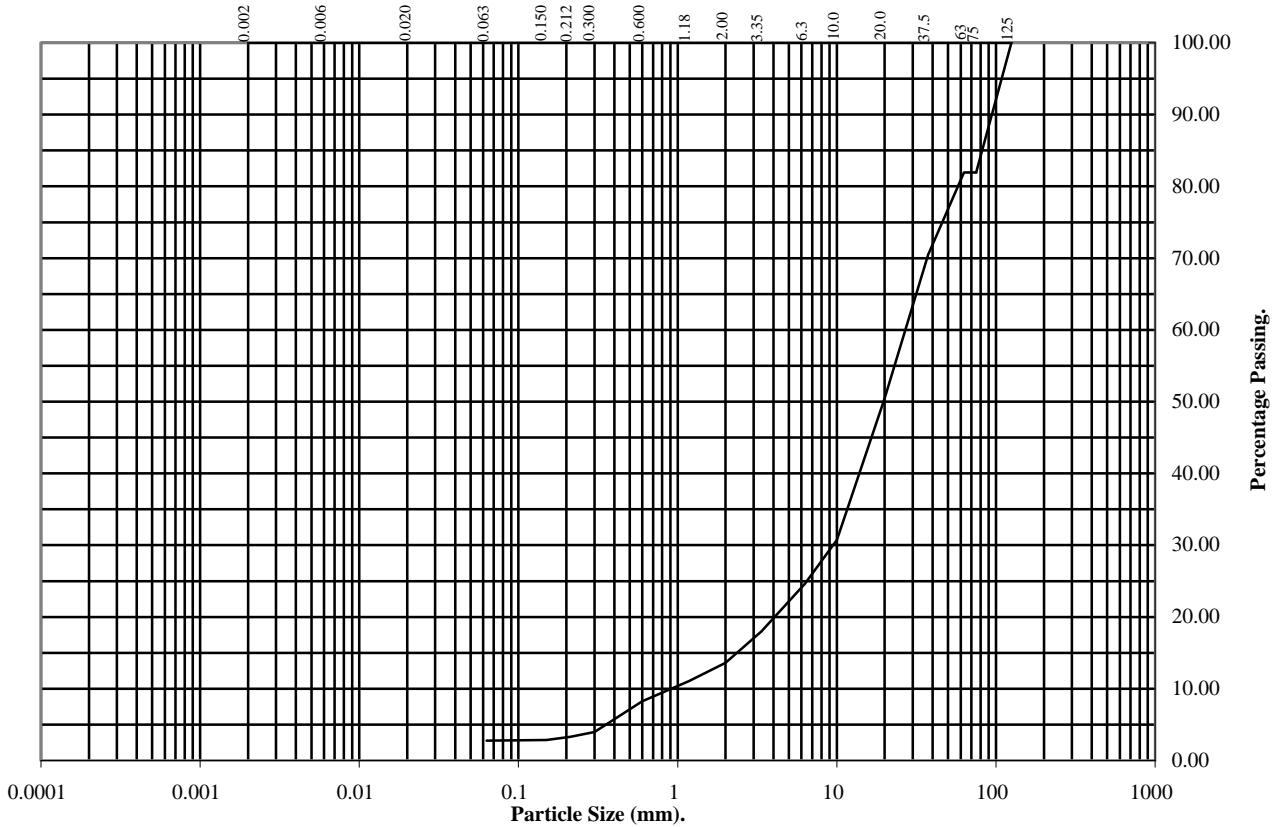
Wet Sieve, Clause 9.2

Hole Number: **BH1**

Depth (m): **4.00-4.50**

Sample Number:

Sample Type: **B**



BS Test Sieve	Percentage Passing
125	100
75	82
63	82
37.5	70
20	50
10	31
6.3	25
3.35	18
2	14
1.18	11
0.6	8
0.3	4
0.212	3
0.15	3
0.063	3

Soil Fraction	Total Percentage
Cobbles	18
Gravel	68
Sand	11
Silt / Clay	3

Remarks:
See summary of soil descriptions.

Checked By	Date	Approved By	Date
<i>[Signature]</i>	04/08/10	<i>[Signature]</i>	04/08/10

 Professional Soils Laboratory	THE DOVE WAY, UTTOXETER.	Contract No.: PSL10/1341
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Particle Size Distribution Test

BS1377 : Part 2 : 1990

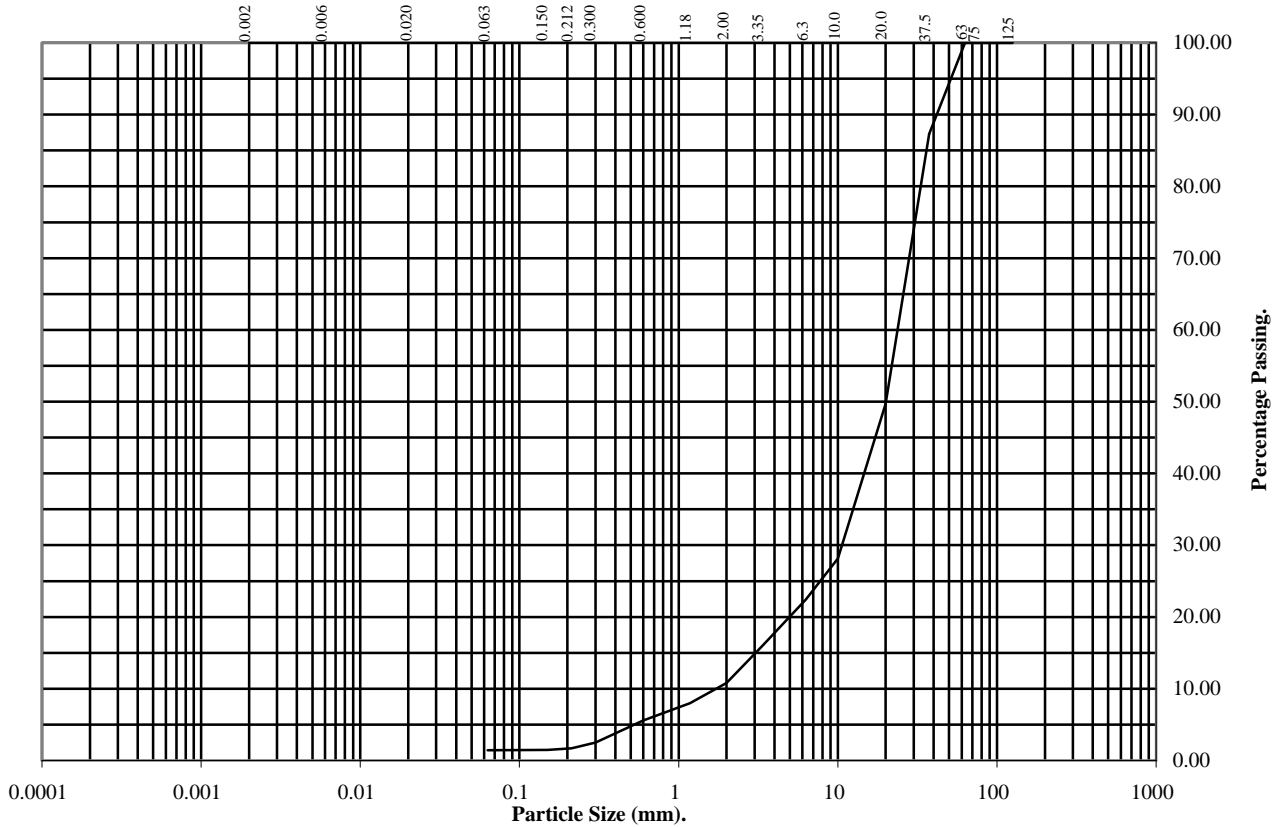
Wet Sieve, Clause 9.2

Hole Number: BH2

Depth (m): 3.00-3.50

Sample Number:

Sample Type: B



BS Test Sieve	Percentage Passing
125	100
75	100
63	100
37.5	87
20	50
10	28
6.3	22
3.35	16
2	11
1.18	8
0.6	6
0.3	2
0.212	2
0.15	1
0.063	1

Soil Fraction	Total Percentage
Cobbles	0
Gravel	89
Sand	10
Silt / Clay	1

Remarks:
See summary of soil descriptions.

Checked By	Date	Approved By	Date
<i>[Signature]</i>	04/08/10	<i>[Signature]</i>	04/08/10

 Professional Soils Laboratory	THE DOVE WAY, UTTOXETER.	Contract No.: PSL10/1341
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Particle Size Distribution Test

BS1377 : Part 2 : 1990

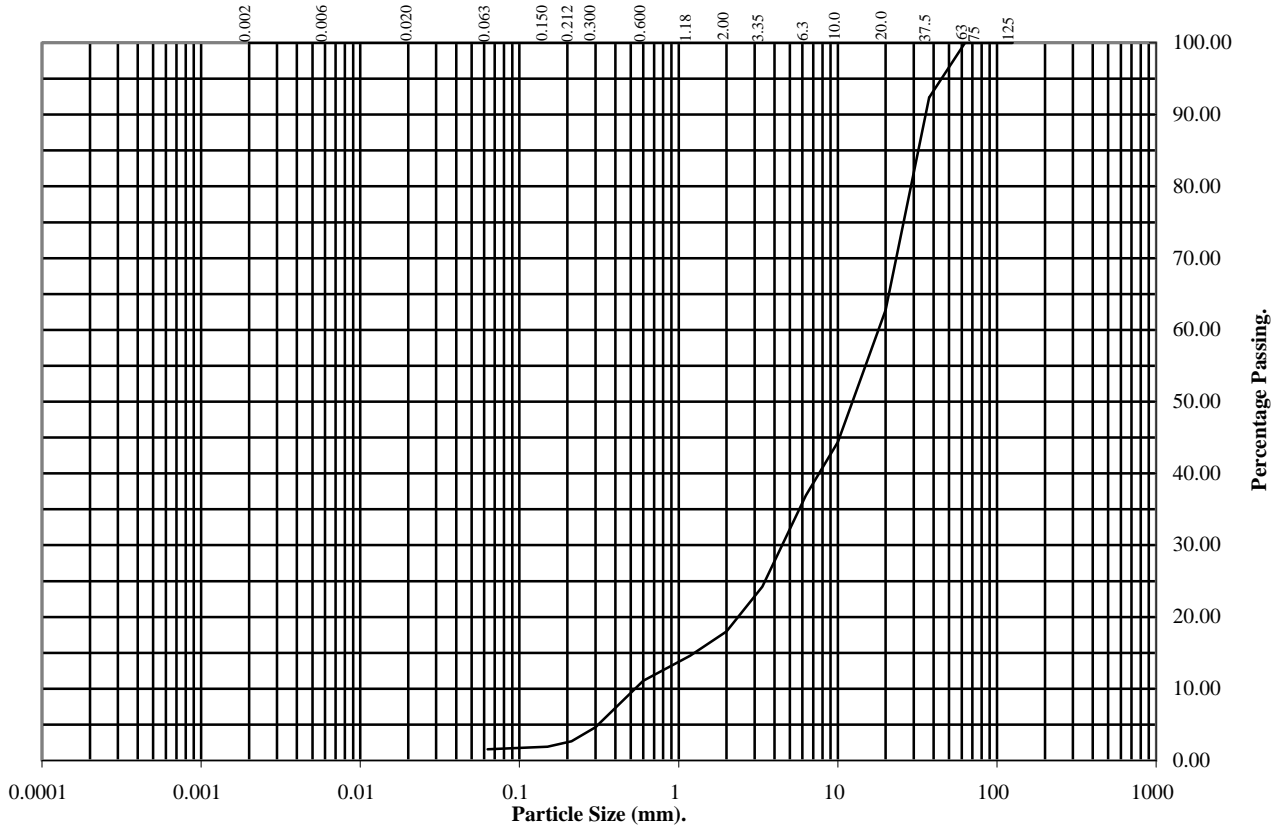
Wet Sieve, Clause 9.2

Hole Number: BH2

Depth (m): 6.50-7.00

Sample Number:

Sample Type: B



BS Test Sieve	Percentage Passing
125	100
75	100
63	100
37.5	92
20	63
10	44
6.3	37
3.35	24
2	18
1.18	15
0.6	11
0.3	5
0.212	3
0.15	2
0.063	2

Soil Fraction	Total Percentage
Cobbles	0
Gravel	82
Sand	16
Silt / Clay	2

Remarks:
See summary of soil descriptions.

Checked By	Date	Approved By	Date
<i>[Signature]</i>	04/08/10	<i>[Signature]</i>	04/08/10

 Professional Soils Laboratory	THE DOVE WAY, UTTOXETER.	Contract No.: PSL10/1341
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Particle Size Distribution Test

BS1377 : Part 2 : 1990

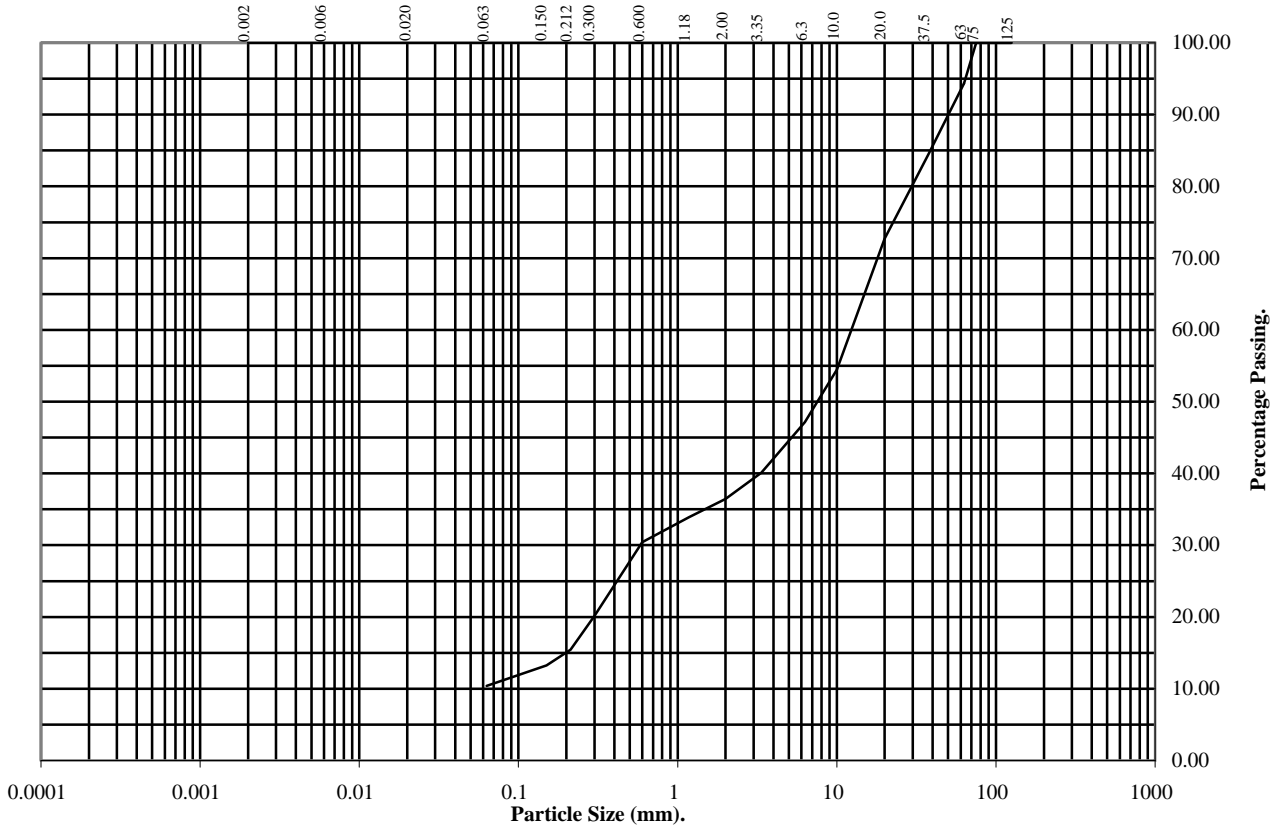
Wet Sieve, Clause 9.2

Hole Number: BH3

Depth (m): 4.00-4.50

Sample Number:

Sample Type: B



BS Test Sieve	Percentage Passing
125	100
75	100
63	94
37.5	84
20	73
10	54
6.3	47
3.35	40
2	36
1.18	34
0.6	30
0.3	20
0.212	15
0.15	13
0.063	10

Soil Fraction	Total Percentage
Cobbles	6
Gravel	58
Sand	26
Silt / Clay	10

Remarks:
See summary of soil descriptions.

Checked By	Date	Approved By	Date
<i>[Signature]</i>	04/08/10	<i>[Signature]</i>	04/08/10

 Professional Soils Laboratory	THE DOVE WAY, UTTOXETER.	Contract No.: PSL10/1341
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Particle Size Distribution Test

BS1377 : Part 2 : 1990

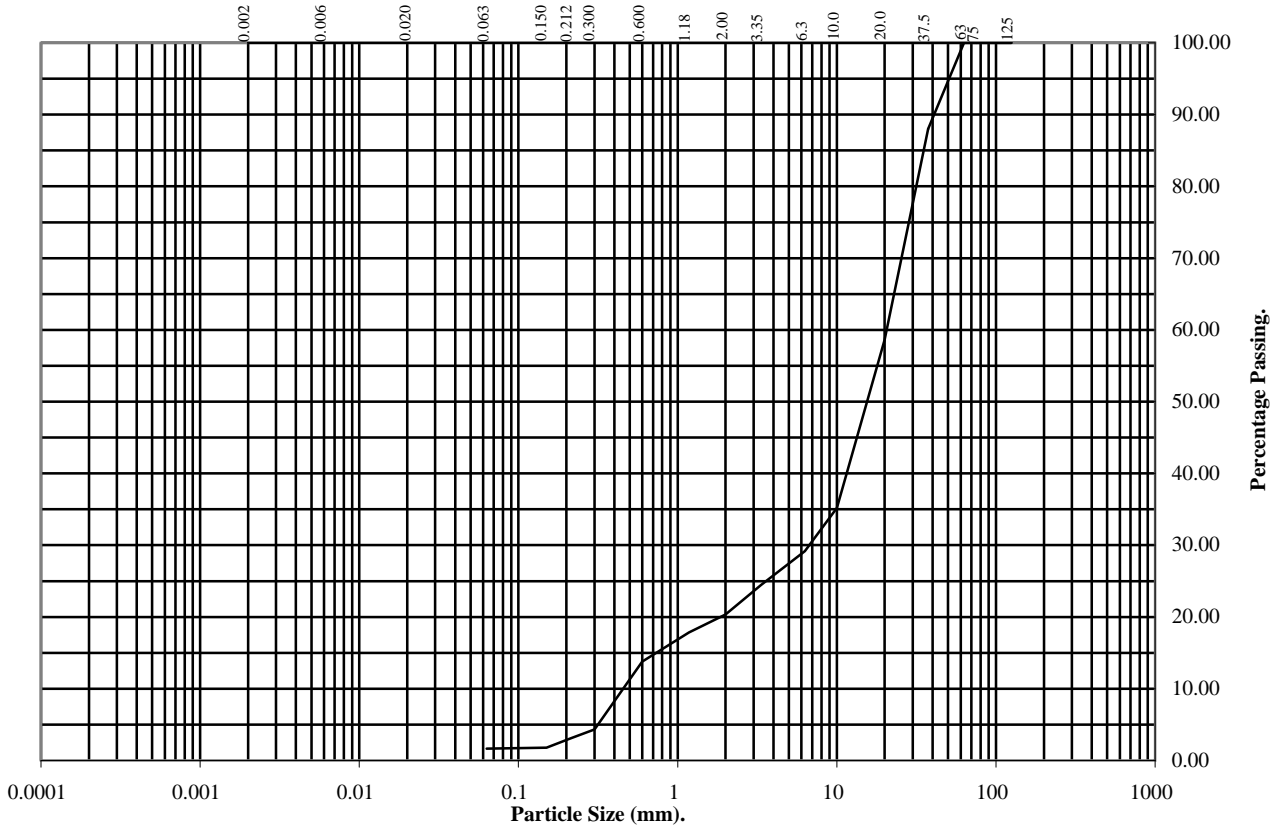
Wet Sieve, Clause 9.2

Hole Number: BH3

Depth (m): 6.50-7.00

Sample Number:

Sample Type: B



BS Test Sieve	Percentage Passing
125	100
75	100
63	100
37.5	88
20	59
10	35
6.3	29
3.35	24
2	20
1.18	18
0.6	14
0.3	4
0.212	3
0.15	2
0.063	2

Soil Fraction	Total Percentage
Cobbles	0
Gravel	80
Sand	18
Silt / Clay	2

Remarks:
See summary of soil descriptions.

Checked By	Date	Approved By	Date
<i>[Signature]</i>	04/08/10	<i>[Signature]</i>	04/08/10

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THE DOVE WAY, UTTOXETER.

Contract No.:
PSL10/1341

Particle Size Distribution Test

BS1377 : Part 2 : 1990

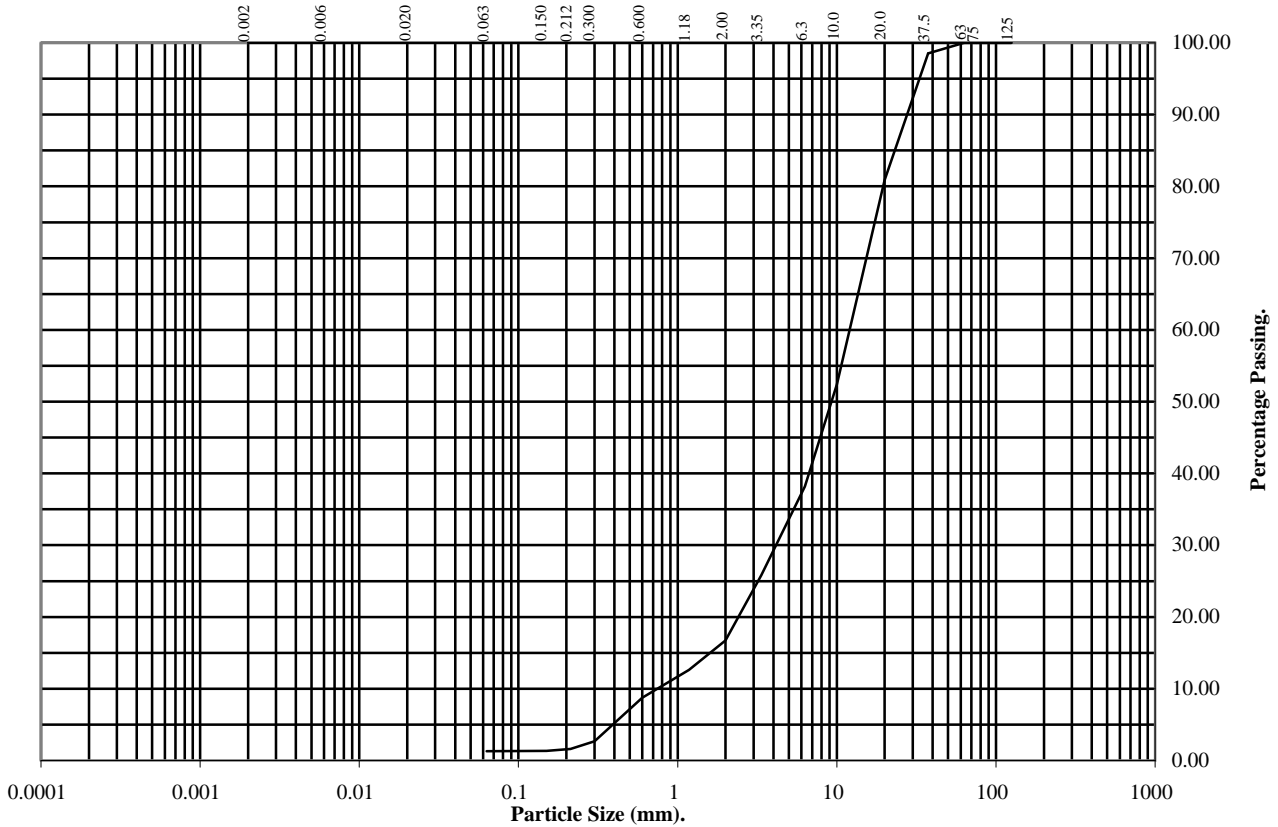
Wet Sieve, Clause 9.2

Hole Number: **BH4**

Depth (m): **1.50-2.00**

Sample Number:

Sample Type: **B**



BS Test Sieve	Percentage Passing
125	100
75	100
63	100
37.5	99
20	81
10	52
6.3	38
3.35	26
2	17
1.18	13
0.6	9
0.3	3
0.212	2
0.15	1
0.063	1

Soil Fraction	Total Percentage
Cobbles	0
Gravel	83
Sand	16
Silt / Clay	1

Remarks:
See summary of soil descriptions.

Checked By	Date	Approved By	Date
<i>[Signature]</i>	04/08/10	<i>[Signature]</i>	04/08/10

 Professional Soils Laboratory	THE DOVE WAY, UTTOXETER.	Contract No.: PSL10/1341
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Particle Size Distribution Test

BS1377 : Part 2 : 1990

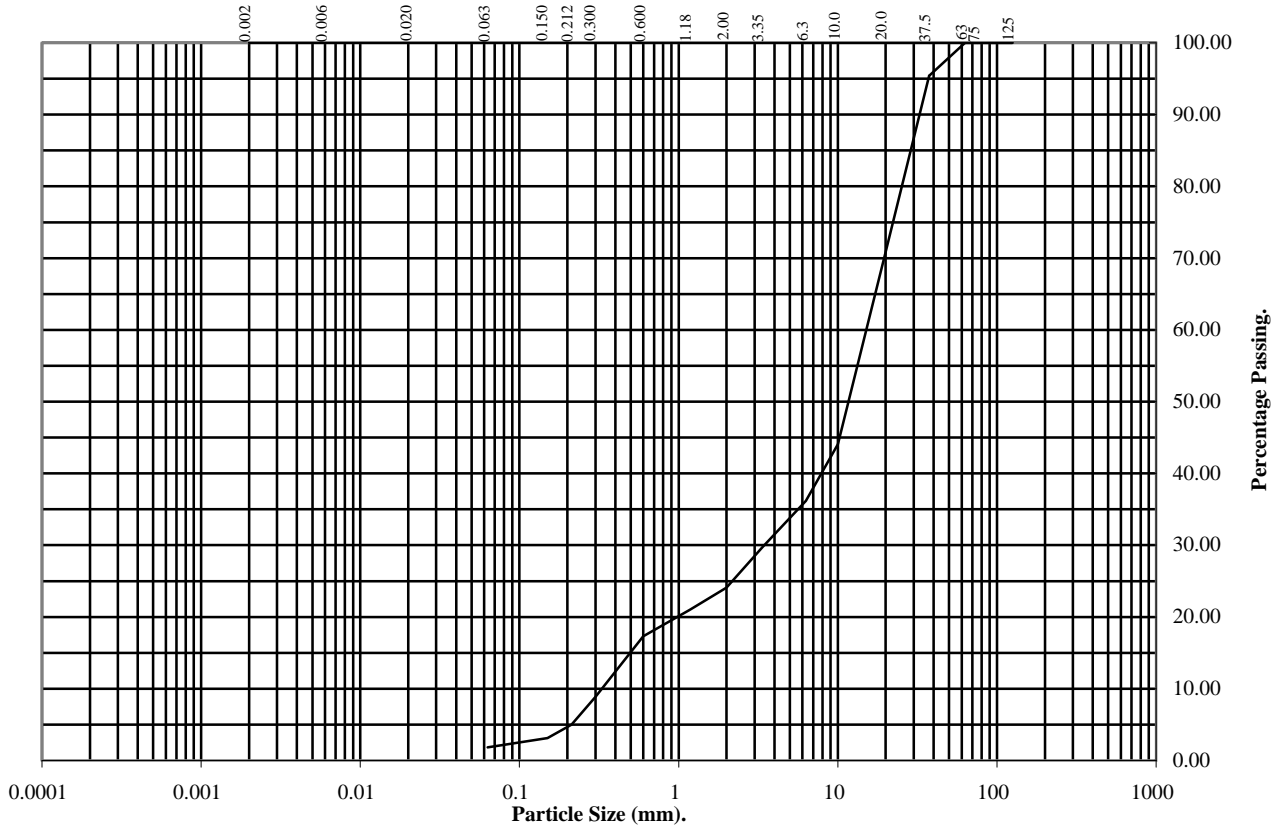
Wet Sieve, Clause 9.2

Hole Number: **BH4**

Depth (m): **3.00-3.50**

Sample Number:

Sample Type: **B**



BS Test Sieve	Percentage Passing
125	100
75	100
63	100
37.5	95
20	71
10	44
6.3	36
3.35	30
2	24
1.18	21
0.6	17
0.3	9
0.212	5
0.15	3
0.063	2

Soil Fraction	Total Percentage
Cobbles	0
Gravel	76
Sand	22
Silt / Clay	2

Remarks:
See summary of soil descriptions.

Checked By	Date	Approved By	Date
<i>[Signature]</i>	04/08/10	<i>[Signature]</i>	04/08/10

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Contract No.:
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Particle Size Distribution Test

BS1377 : Part 2 : 1990

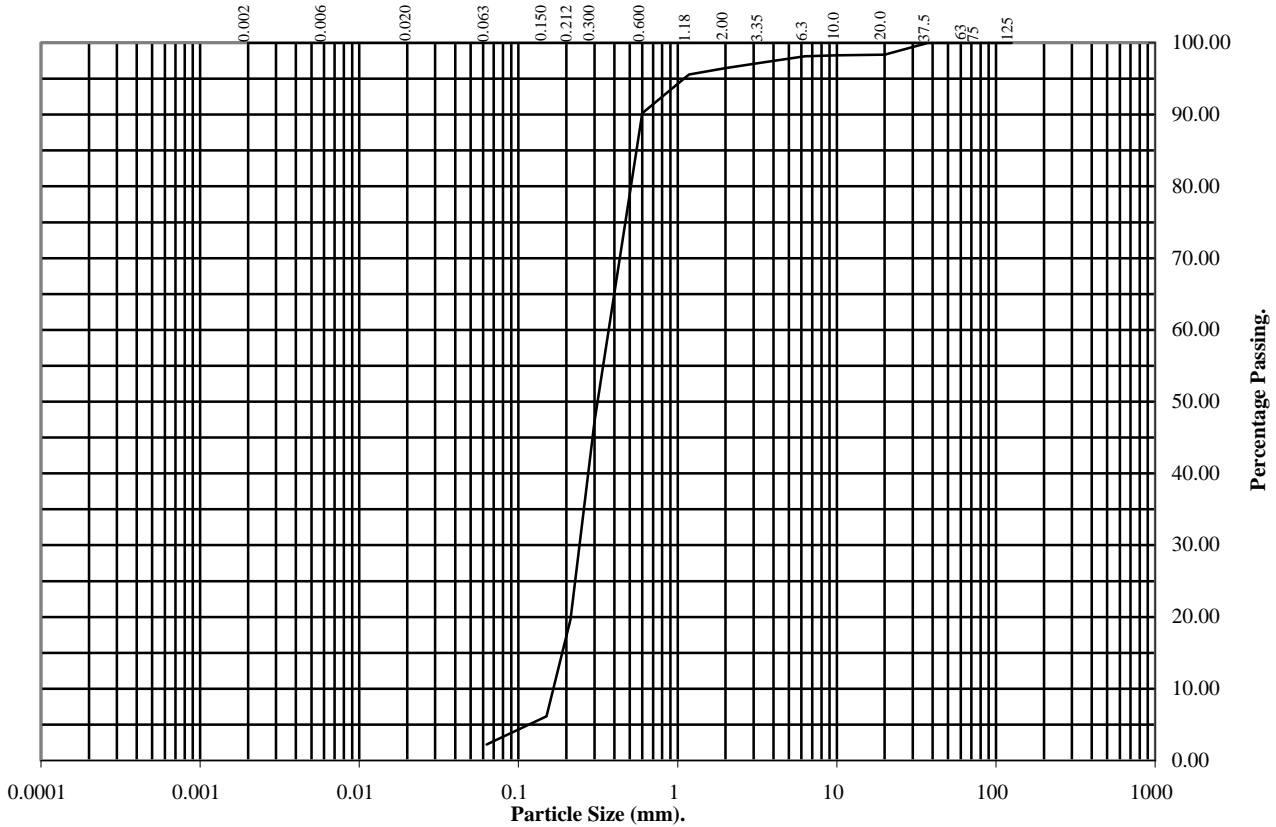
Wet Sieve, Clause 9.2

Hole Number: **BH6**

Depth (m): **3.00-3.50**

Sample Number:

Sample Type: **B**



BS Test Sieve	Percentage Passing
125	100
75	100
63	100
37.5	100
20	98
10	98
6.3	98
3.35	97
2	96
1.18	96
0.6	90
0.3	47
0.212	20
0.15	6
0.063	2

Soil Fraction	Total Percentage
Cobbles	0
Gravel	4
Sand	94
Silt / Clay	2

Remarks:
See summary of soil descriptions.

Checked By	Date	Approved By	Date
<i>[Signature]</i>	04/08/10	<i>[Signature]</i>	04/08/10

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Contract No.:
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Particle Size Distribution Test

BS1377 : Part 2 : 1990

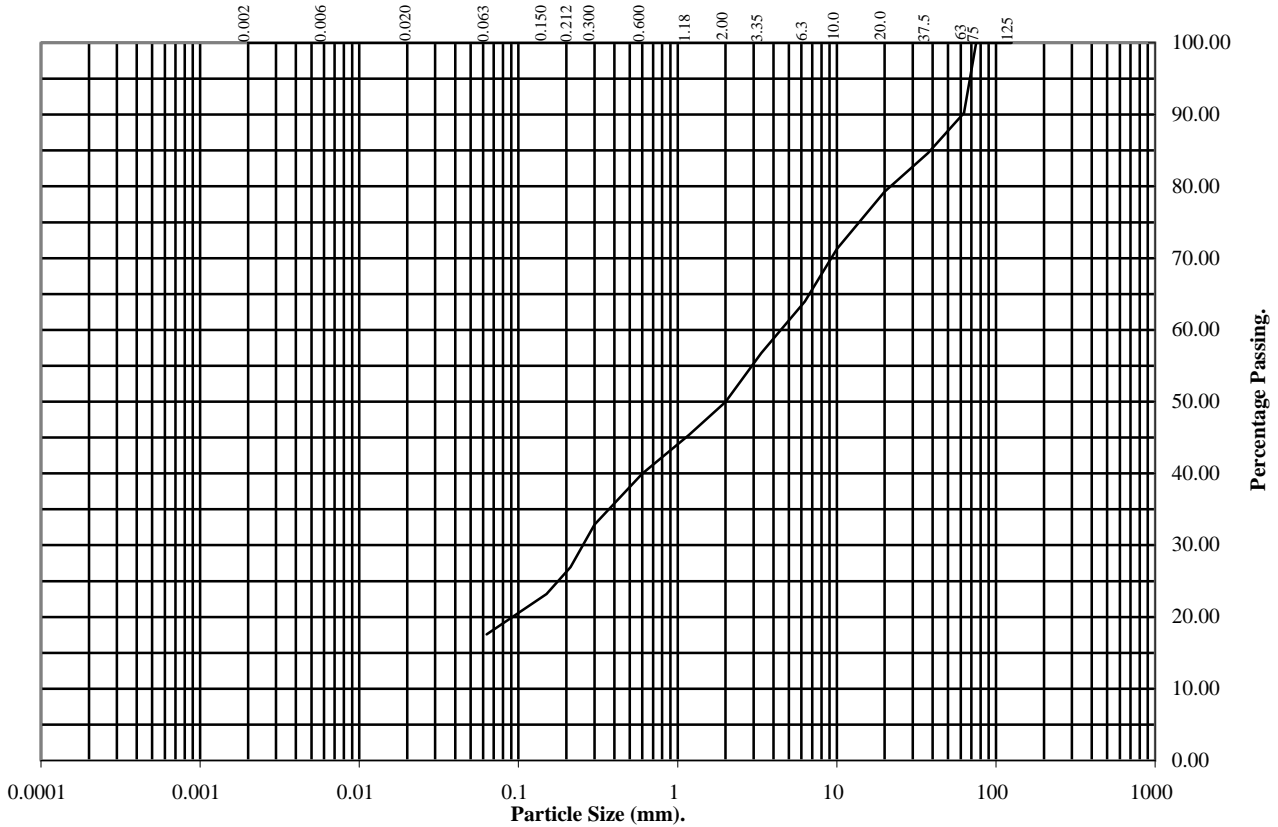
Wet Sieve, Clause 9.2

Hole Number: BH7

Depth (m): 0.20-0.70

Sample Number:

Sample Type: B



BS Test Sieve	Percentage Passing
125	100
75	100
63	90
37.5	85
20	79
10	71
6.3	64
3.35	57
2	50
1.18	45
0.6	40
0.3	33
0.212	27
0.15	23
0.063	18

Soil Fraction	Total Percentage
Cobbles	10
Gravel	40
Sand	32
Silt / Clay	18

Remarks:
See summary of soil descriptions.

Checked By	Date	Approved By	Date
<i>[Signature]</i>	04/08/10	<i>[Signature]</i>	04/08/10

Professional Soils Laboratory	THE DOVE WAY, UTTOXETER.	Contract No.: PSL10/1341
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Particle Size Distribution Test

BS1377 : Part 2 : 1990

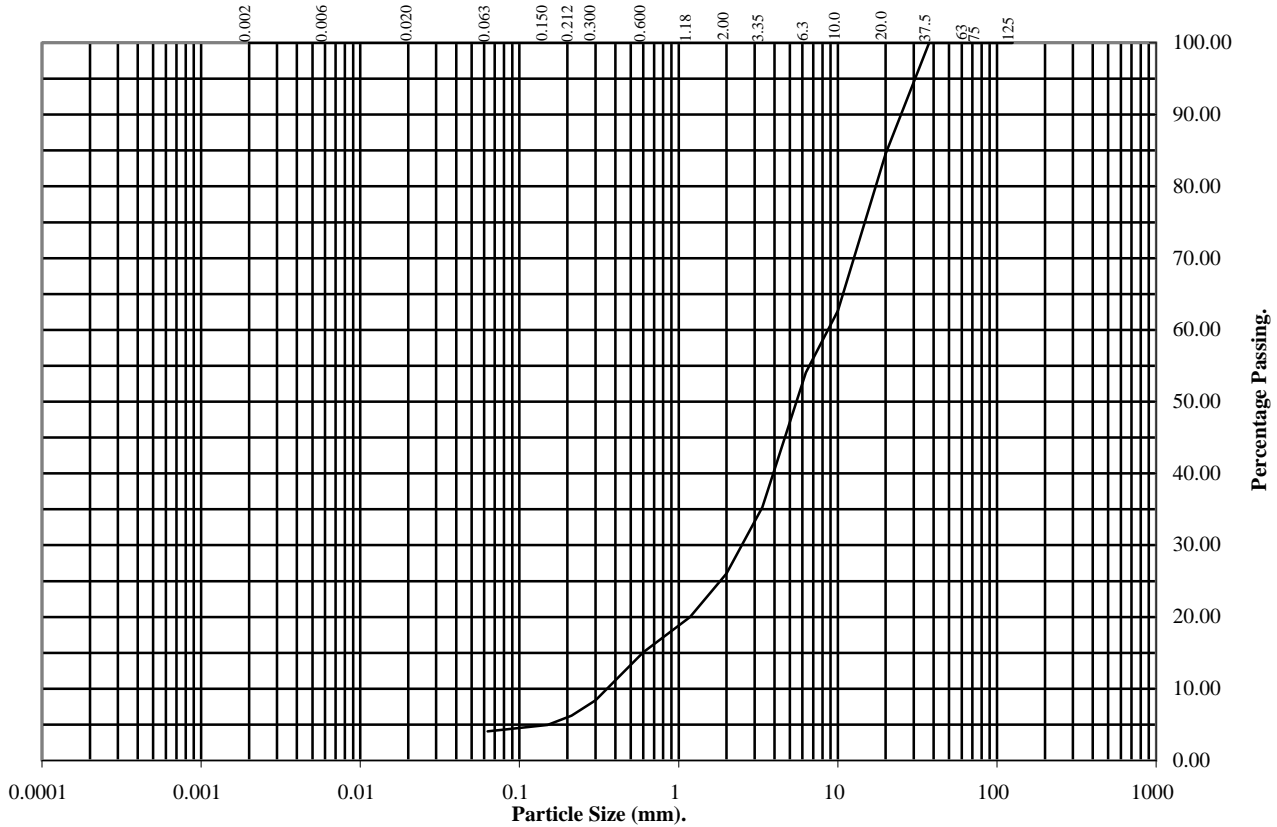
Wet Sieve, Clause 9.2

Hole Number: BH7

Depth (m): 2.00-2.50

Sample Number:

Sample Type: B



BS Test Sieve	Percentage Passing
125	100
75	100
63	100
37.5	100
20	85
10	63
6.3	54
3.35	35
2	26
1.18	20
0.6	15
0.3	8
0.212	6
0.15	5
0.063	4

Soil Fraction	Total Percentage
Cobbles	0
Gravel	74
Sand	22
Silt / Clay	4

Remarks:
See summary of soil descriptions.

Checked By	Date	Approved By	Date
<i>[Signature]</i>	04/08/10	<i>[Signature]</i>	04/08/10

 Professional Soils Laboratory	THE DOVE WAY, UTTOXETER.	Contract No.: PSL10/1341
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Particle Size Distribution Test

BS1377 : Part 2 : 1990

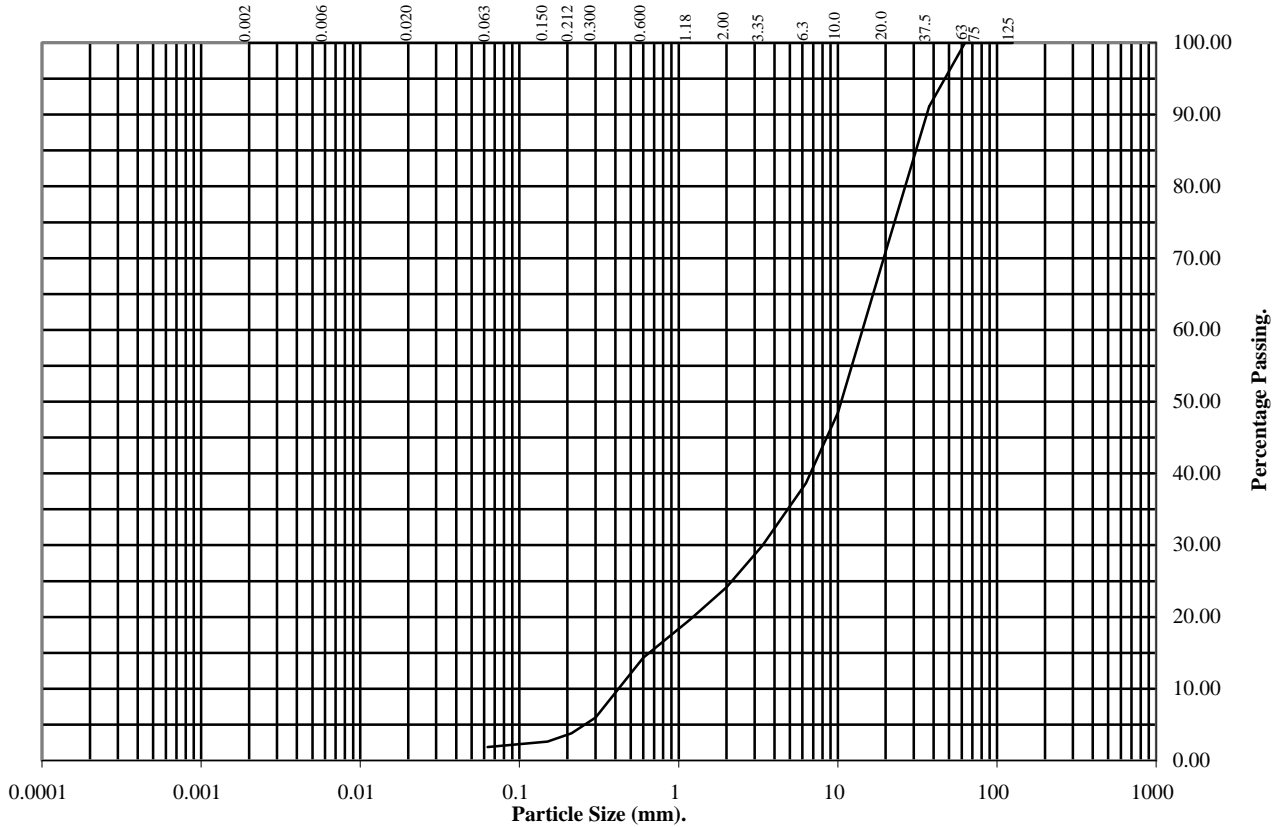
Wet Sieve, Clause 9.2

Hole Number: **BH8**

Depth (m): **3.00-3.50**

Sample Number:

Sample Type: **B**



BS Test Sieve	Percentage Passing
125	100
75	100
63	100
37.5	91
20	71
10	48
6.3	39
3.35	30
2	24
1.18	20
0.6	14
0.3	6
0.212	4
0.15	3
0.063	2

Soil Fraction	Total Percentage
Cobbles	0
Gravel	76
Sand	22
Silt / Clay	2

Remarks:
See summary of soil descriptions.

Checked By	Date	Approved By	Date
<i>[Signature]</i>	04/08/10	<i>[Signature]</i>	04/08/10

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THE DOVE WAY, UTTOXETER.

Contract No.:
PSL10/1341

Particle Size Distribution Test

BS1377 : Part 2 : 1990

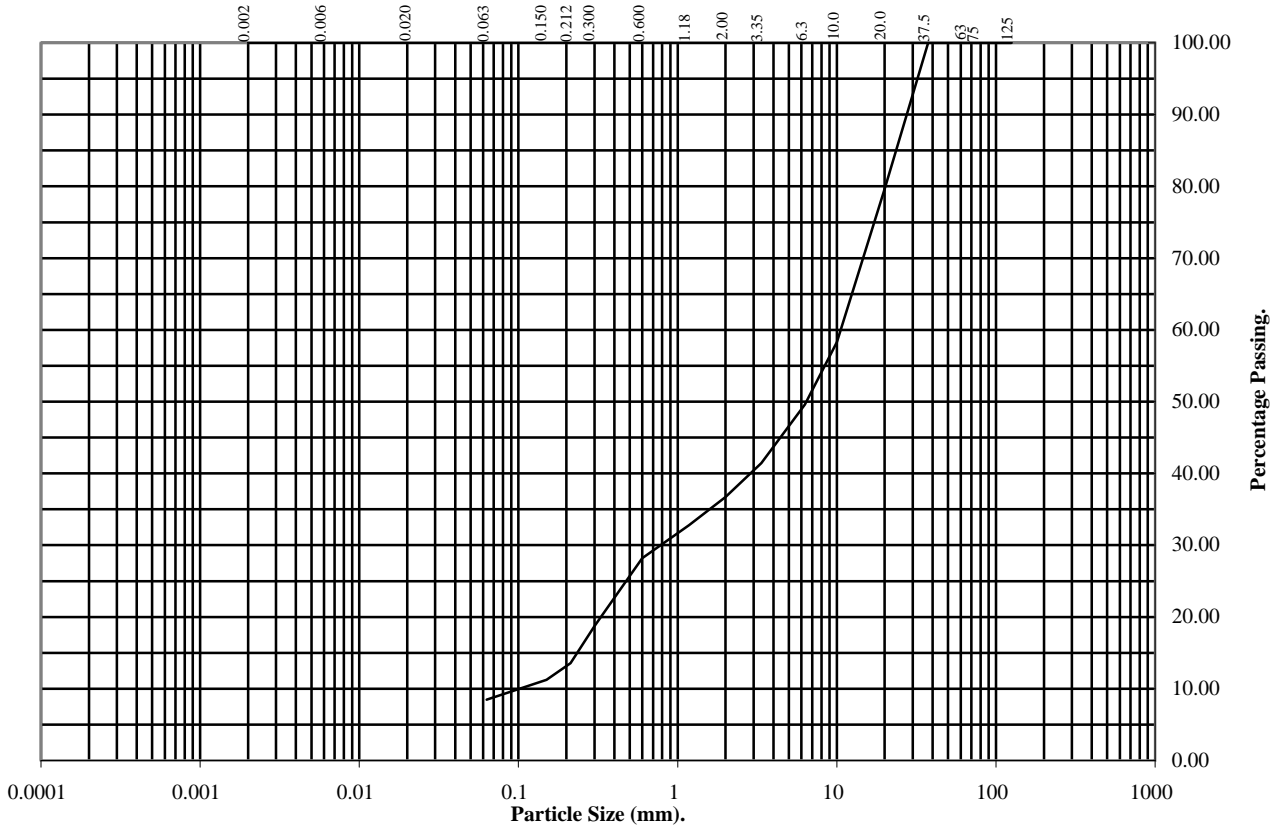
Wet Sieve, Clause 9.2

Hole Number: TP101

Depth (m): 2.00

Sample Number:

Sample Type: B



BS Test Sieve	Percentage Passing
125	100
75	100
63	100
37.5	100
20	80
10	58
6.3	50
3.35	41
2	37
1.18	33
0.6	28
0.3	19
0.212	14
0.15	11
0.063	8

Soil Fraction	Total Percentage
Cobbles	0
Gravel	63
Sand	29
Silt / Clay	8

Remarks:
See summary of soil descriptions.

Checked By	Date	Approved By	Date
<i>[Signature]</i>	04/08/10	<i>[Signature]</i>	04/08/10



THE DOVE WAY, UTTOXETER.

Contract No.: PSL10/1341

Particle Size Distribution Test

BS1377 : Part 2 : 1990

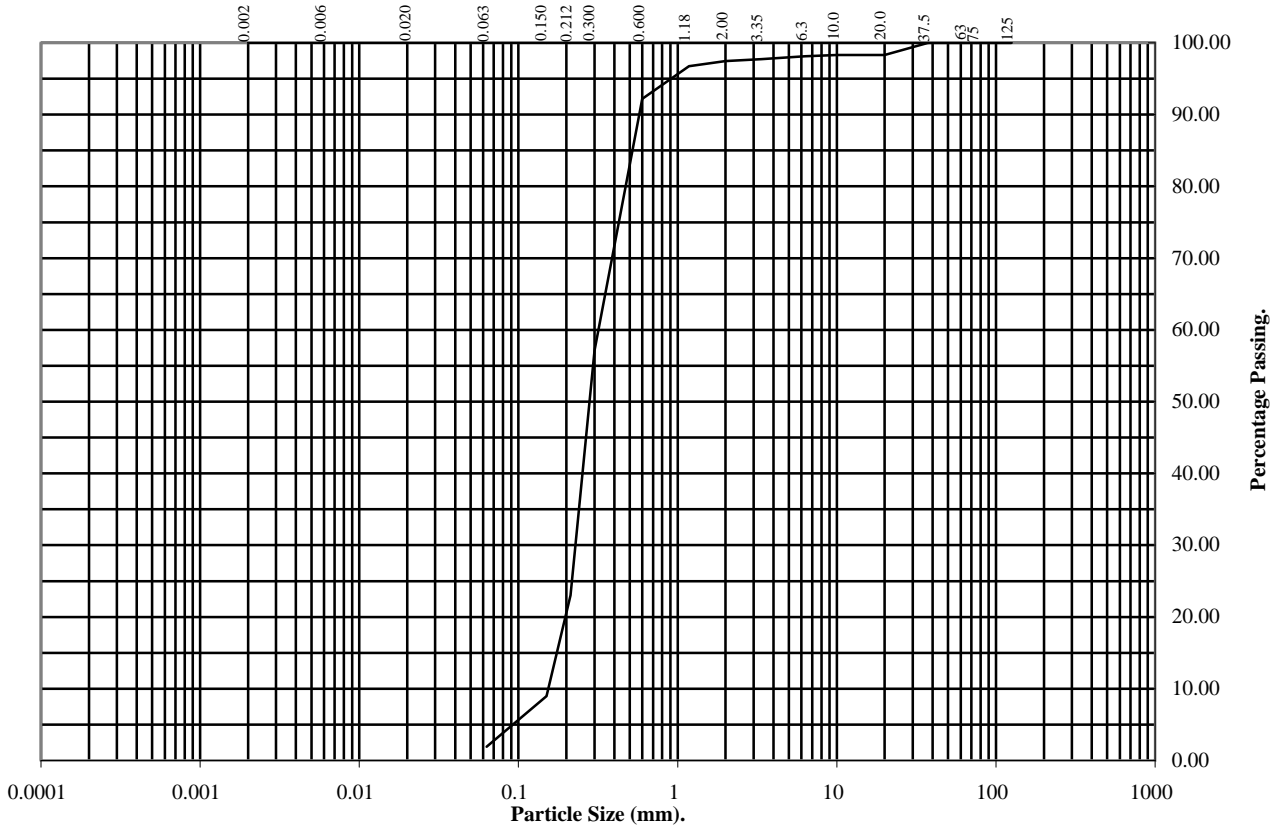
Wet Sieve, Clause 9.2

Hole Number: TP108

Depth (m): 2.20

Sample Number:

Sample Type: B



BS Test Sieve	Percentage Passing
125	100
75	100
63	100
37.5	100
20	98
10	98
6.3	98
3.35	98
2	97
1.18	97
0.6	92
0.3	57
0.212	23
0.15	9
0.063	2

Soil Fraction	Total Percentage
Cobbles	0
Gravel	3
Sand	95
Silt / Clay	2

Remarks:
See summary of soil descriptions.

Checked By	Date	Approved By	Date
<i>[Signature]</i>	04/08/10	<i>[Signature]</i>	04/08/10

 Professional Soils Laboratory	THE DOVE WAY, UTTOXETER.	Contract No.: PSL10/1341
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