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## **Analytical Report Number : 20-35658**

|                             |                                                     |                                                        |            |
|-----------------------------|-----------------------------------------------------|--------------------------------------------------------|------------|
| <b>Project / Site name:</b> | Clarendon Road                                      | <b>Samples received on:</b>                            | 15/10/2020 |
| <b>Your job number:</b>     | 6075                                                | <b>Samples instructed on/<br/>Analysis started on:</b> | 15/10/2020 |
| <b>Your order number:</b>   | S-RE6075/00005                                      | <b>Analysis completed by:</b>                          | 20/10/2020 |
| <b>Report Issue Number:</b> | 1                                                   | <b>Report issued on:</b>                               | 21/10/2020 |
| <b>Samples Analysed:</b>    | 1 leachate sample - 1 soil sample - 4 water samples |                                                        |            |

**Signed:** *Karolina Marek*

Karolina Marek  
PL Head of Reporting Team  
**For & on behalf of i2 Analytical Ltd.**

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

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

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

soils - 4 weeks from reporting  
leachates - 2 weeks from reporting  
waters - 2 weeks from reporting  
asbestos - 6 months from reporting

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

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



Analytical Report Number: 20-35658  
Project / Site name: Clarendon Road

Your Order No: S-RE6075/00005

|                                             |  |       |                       |                              |  |
|---------------------------------------------|--|-------|-----------------------|------------------------------|--|
| Lab Sample Number                           |  |       |                       | 1651131                      |  |
| Sample Reference                            |  |       |                       | SP38                         |  |
| Sample Number                               |  |       |                       | None Supplied                |  |
| Depth (m)                                   |  |       |                       | None Supplied                |  |
| Date Sampled                                |  |       |                       | Deviating                    |  |
| Time Taken                                  |  |       |                       | None Supplied                |  |
| Analytical Parameter<br>(Leachate Analysis) |  | Units | Limit of<br>detection | Accred-<br>itation<br>Status |  |

#### General Inorganics

|                             |      |     |           |      |
|-----------------------------|------|-----|-----------|------|
| Sulphate as SO <sub>4</sub> | mg/l | 0.1 | ISO 17025 | 79.4 |
| Ammonium as NH <sub>4</sub> | µg/l | 15  | NONE      | 74   |

U/S = Unsuitable Sample    I/S = Insufficient Sample



Analytical Report Number: 20-35658

Project / Site name: Clarendon Road

Your Order No: S-RE6075/00005

| Lab Sample Number                     |       |                    |                      | 1651126       | 1651127       | 1651128       | 1651129       |
|---------------------------------------|-------|--------------------|----------------------|---------------|---------------|---------------|---------------|
| Sample Reference                      |       |                    |                      | BH514         | BH510         | BH513         | MB31          |
| Sample Number                         |       |                    |                      | None Supplied | None Supplied | None Supplied | None Supplied |
| Depth (m)                             |       |                    |                      | None Supplied | None Supplied | None Supplied | None Supplied |
| Date Sampled                          |       |                    |                      | Deviating     | Deviating     | Deviating     | Deviating     |
| Time Taken                            |       |                    |                      | None Supplied | None Supplied | None Supplied | None Supplied |
| Analytical Parameter (Water Analysis) | Units | Limit of detection | Accreditation Status |               |               |               |               |

#### General Inorganics

|                                  |      |       |           |       |       |       |       |
|----------------------------------|------|-------|-----------|-------|-------|-------|-------|
| Total Cyanide (Low Level 1 µg/l) | µg/l | 1     | ISO 17025 | 47    | 6.2   | < 1.0 | 4.6   |
| Free Cyanide (Low Level 1 µg/l)  | µg/l | 1     | ISO 17025 | < 1   | < 1   | < 1   | < 1   |
| Thiocyanate as SCN               | µg/l | 200   | ISO 17025 | 9500  | 210   | 320   | < 200 |
| Sulphate as SO <sub>4</sub>      | mg/l | 0.045 | ISO 17025 | 214   | 4530* | 2060  | 118   |
| Sulphide                         | µg/l | 5     | NONE      | < 5.0 | < 5.0 | < 5.0 | < 5.0 |
| Ammonia as NH <sub>3</sub>       | µg/l | 15    | ISO 17025 | 1600  | 1000  | 880   | 10000 |

#### Total Phenols

|                            |      |    |           |      |      |      |    |
|----------------------------|------|----|-----------|------|------|------|----|
| Total Phenols (monohydric) | µg/l | 10 | ISO 17025 | < 10 | < 10 | < 10 | 13 |
|----------------------------|------|----|-----------|------|------|------|----|

#### Speciated PAHs

|                        |      |      |           |        |        |        |        |
|------------------------|------|------|-----------|--------|--------|--------|--------|
| Naphthalene            | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Acenaphthylene         | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Acenaphthene           | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Fluorene               | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Phenanthrene           | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Anthracene             | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Fluoranthene           | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Pyrene                 | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Benzo(a)anthracene     | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Chrysene               | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Benzo(b)fluoranthene   | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Benzo(k)fluoranthene   | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Benzo(a)pyrene         | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Indeno(1,2,3-cd)pyrene | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Dibenz(a,h)anthracene  | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |
| Benzo(ghi)perylene     | µg/l | 0.01 | ISO 17025 | < 0.01 | < 0.01 | < 0.01 | < 0.01 |

#### Total PAH

|                   |      |      |           |        |        |        |        |
|-------------------|------|------|-----------|--------|--------|--------|--------|
| Total EPA-16 PAHs | µg/l | 0.16 | ISO 17025 | < 0.16 | < 0.16 | < 0.16 | < 0.16 |
|-------------------|------|------|-----------|--------|--------|--------|--------|

#### Heavy Metals / Metalloids

|                       |      |   |           |       |       |       |       |
|-----------------------|------|---|-----------|-------|-------|-------|-------|
| Chromium (hexavalent) | µg/l | 5 | ISO 17025 | < 5.0 | < 5.0 | < 5.0 | < 5.0 |
| Chromium (III)        | µg/l | 1 | NONE      | 2.4   | 4.4   | 5.1   | 2.9   |

|                      |      |      |           |        |        |        |        |
|----------------------|------|------|-----------|--------|--------|--------|--------|
| Arsenic (dissolved)  | µg/l | 0.15 | ISO 17025 | 1.44   | 4.65   | 1.58   | 2.46   |
| Cadmium (dissolved)  | µg/l | 0.02 | ISO 17025 | < 0.02 | < 0.02 | 0.03   | < 0.02 |
| Chromium (dissolved) | µg/l | 0.2  | ISO 17025 | 2.4    | 4.4    | 5.1    | 2.9    |
| Copper (dissolved)   | µg/l | 0.5  | ISO 17025 | 8.6    | 14     | 9.3    | 6.2    |
| Lead (dissolved)     | µg/l | 0.2  | ISO 17025 | < 0.2  | < 0.2  | < 0.2  | 0.8    |
| Mercury (dissolved)  | µg/l | 0.05 | ISO 17025 | < 0.05 | < 0.05 | < 0.05 | < 0.05 |
| Nickel (dissolved)   | µg/l | 0.5  | ISO 17025 | 1.7    | 12     | 9.4    | 3.4    |
| Selenium (dissolved) | µg/l | 0.6  | ISO 17025 | 0.8    | 5.1    | 1.9    | 1.7    |
| Zinc (dissolved)     | µg/l | 0.5  | ISO 17025 | 2.5    | 12     | 9.9    | 10     |

#### Monoaromatics & Oxygenates

|                                    |      |   |           |       |       |       |       |
|------------------------------------|------|---|-----------|-------|-------|-------|-------|
| Benzene                            | µg/l | 1 | ISO 17025 | < 1.0 | < 1.0 | < 1.0 | < 1.0 |
| Toluene                            | µg/l | 1 | ISO 17025 | < 1.0 | < 1.0 | < 1.0 | < 1.0 |
| Ethylbenzene                       | µg/l | 1 | ISO 17025 | < 1.0 | < 1.0 | < 1.0 | < 1.0 |
| p & m-xylene                       | µg/l | 1 | ISO 17025 | < 1.0 | < 1.0 | < 1.0 | < 1.0 |
| o-xylene                           | µg/l | 1 | ISO 17025 | < 1.0 | < 1.0 | < 1.0 | < 1.0 |
| MTBE (Methyl Tertiary Butyl Ether) | µg/l | 1 | ISO 17025 | < 1.0 | < 1.0 | < 1.0 | < 1.0 |



Analytical Report Number: 20-35658  
Project / Site name: Clarendon Road

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|                                          |               |                       |                              |               |
|------------------------------------------|---------------|-----------------------|------------------------------|---------------|
| Lab Sample Number                        | 1651126       | 1651127               | 1651128                      | 1651129       |
| Sample Reference                         | BH514         | BH510                 | BH513                        | MB31          |
| Sample Number                            | None Supplied | None Supplied         | None Supplied                | None Supplied |
| Depth (m)                                | None Supplied | None Supplied         | None Supplied                | None Supplied |
| Date Sampled                             | Deviating     | Deviating             | Deviating                    | Deviating     |
| Time Taken                               | None Supplied | None Supplied         | None Supplied                | None Supplied |
| Analytical Parameter<br>(Water Analysis) | Units         | Limit of<br>detection | Accred-<br>itation<br>Status |               |

#### Petroleum Hydrocarbons

|                                |      |    |           |       |       |       |       |
|--------------------------------|------|----|-----------|-------|-------|-------|-------|
| TPH-CWG - Aliphatic >C5 - C6   | µg/l | 1  | ISO 17025 | < 1.0 | < 1.0 | < 1.0 | < 1.0 |
| TPH-CWG - Aliphatic >C6 - C8   | µg/l | 1  | ISO 17025 | < 1.0 | < 1.0 | < 1.0 | < 1.0 |
| TPH-CWG - Aliphatic >C8 - C10  | µg/l | 1  | ISO 17025 | < 1.0 | < 1.0 | < 1.0 | < 1.0 |
| TPH-CWG - Aliphatic >C10 - C12 | µg/l | 10 | NONE      | < 10  | < 10  | < 10  | < 10  |
| TPH-CWG - Aliphatic >C12 - C16 | µg/l | 10 | NONE      | < 10  | < 10  | < 10  | < 10  |
| TPH-CWG - Aliphatic >C16 - C21 | µg/l | 10 | NONE      | < 10  | < 10  | < 10  | < 10  |
| TPH-CWG - Aliphatic >C21 - C35 | µg/l | 10 | NONE      | < 10  | < 10  | < 10  | < 10  |
| TPH-CWG - Aliphatic (C5 - C35) | µg/l | 10 | NONE      | < 10  | < 10  | < 10  | < 10  |

|                               |      |    |           |       |       |       |       |
|-------------------------------|------|----|-----------|-------|-------|-------|-------|
| TPH-CWG - Aromatic >C5 - C7   | µg/l | 1  | ISO 17025 | < 1.0 | < 1.0 | < 1.0 | < 1.0 |
| TPH-CWG - Aromatic >C7 - C8   | µg/l | 1  | ISO 17025 | < 1.0 | < 1.0 | < 1.0 | < 1.0 |
| TPH-CWG - Aromatic >C8 - C10  | µg/l | 1  | ISO 17025 | < 1.0 | < 1.0 | < 1.0 | < 1.0 |
| TPH-CWG - Aromatic >C10 - C12 | µg/l | 10 | NONE      | < 10  | < 10  | < 10  | < 10  |
| TPH-CWG - Aromatic >C12 - C16 | µg/l | 10 | NONE      | < 10  | < 10  | < 10  | < 10  |
| TPH-CWG - Aromatic >C16 - C21 | µg/l | 10 | NONE      | < 10  | < 10  | < 10  | < 10  |
| TPH-CWG - Aromatic >C21 - C35 | µg/l | 10 | NONE      | < 10  | < 10  | < 10  | < 10  |
| TPH-CWG - Aromatic (C5 - C35) | µg/l | 10 | NONE      | < 10  | < 10  | < 10  | < 10  |

U/S = Unsuitable Sample I/S = Insufficient Sample

\* Over range data, sample was diluted and results are estimated from an extrapolated calibration. Results should be interpreted with care.

Analytical Report Number: 20-35658

Project / Site name: Clarendon Road

Your Order No: S-RE6075/00005

| Lab Sample Number                    |       |                    |                      | 1651130       |
|--------------------------------------|-------|--------------------|----------------------|---------------|
| Sample Reference                     |       |                    |                      | SP38          |
| Sample Number                        |       |                    |                      | None Supplied |
| Depth (m)                            |       |                    |                      | None Supplied |
| Date Sampled                         |       |                    |                      | Deviating     |
| Time Taken                           |       |                    |                      | None Supplied |
| Analytical Parameter (Soil Analysis) | Units | Limit of detection | Accreditation Status |               |
| Stone Content                        | %     | 0.1                | NONE                 | < 0.1         |
| Moisture Content                     | %     | N/A                | NONE                 | 2.8           |
| Total mass of sample received        | kg    | 0.001              | NONE                 | 1.4           |

|                  |      |     |           |              |
|------------------|------|-----|-----------|--------------|
| Asbestos in Soil | Type | N/A | ISO 17025 | Not-detected |
|------------------|------|-----|-----------|--------------|

#### General Inorganics

|                                                                  |       |         |        |      |
|------------------------------------------------------------------|-------|---------|--------|------|
| Water Soluble SO <sub>4</sub> (2:1 Leach. Equiv.) 1hr extraction | g/l   | 0.00125 | MCERTS | 0.42 |
| Water Soluble SO <sub>4</sub> (2:1 Leach. Equiv.) 1hr extraction | mg/kg | 2.5     | MCERTS | 850  |
| Water Soluble SO <sub>4</sub> (2:1 Leach. Equiv.) 1hr extraction | mg/l  | 1.25    | MCERTS | 424  |
| Ammonium as NH <sub>4</sub>                                      | mg/kg | 0.5     | MCERTS | 2    |

#### Speciated PAHs

|                |       |      |        |        |
|----------------|-------|------|--------|--------|
| Naphthalene    | mg/kg | 0.05 | MCERTS | < 0.05 |
| Acenaphthene   | mg/kg | 0.05 | MCERTS | < 0.05 |
| Fluorene       | mg/kg | 0.05 | MCERTS | < 0.05 |
| Anthracene     | mg/kg | 0.05 | MCERTS | < 0.05 |
| Fluoranthene   | mg/kg | 0.05 | MCERTS | 0.85   |
| Pyrene         | mg/kg | 0.05 | MCERTS | 0.89   |
| Benzo(a)pyrene | mg/kg | 0.05 | MCERTS | 0.63   |

#### Monoaromatics & Oxygenates

|                                    |       |   |        |       |
|------------------------------------|-------|---|--------|-------|
| Benzene                            | µg/kg | 1 | MCERTS | < 1.0 |
| Toluene                            | µg/kg | 1 | MCERTS | < 1.0 |
| Ethylbenzene                       | µg/kg | 1 | MCERTS | < 1.0 |
| p & m-xylene                       | µg/kg | 1 | MCERTS | < 1.0 |
| o-xylene                           | µg/kg | 1 | MCERTS | < 1.0 |
| MTBE (Methyl Tertiary Butyl Ether) | µg/kg | 1 | MCERTS | < 1.0 |

#### Petroleum Hydrocarbons

|                                  |       |       |        |         |
|----------------------------------|-------|-------|--------|---------|
| TPH-CWG - Aliphatic >EC5 - EC6   | mg/kg | 0.001 | MCERTS | < 0.001 |
| TPH-CWG - Aliphatic >EC6 - EC8   | mg/kg | 0.001 | MCERTS | < 0.001 |
| TPH-CWG - Aliphatic >EC8 - EC10  | mg/kg | 0.001 | MCERTS | < 0.001 |
| TPH-CWG - Aliphatic >EC10 - EC12 | mg/kg | 1     | MCERTS | < 1.0   |
| TPH-CWG - Aliphatic >EC12 - EC16 | mg/kg | 2     | MCERTS | < 2.0   |
| TPH-CWG - Aliphatic >EC16 - EC21 | mg/kg | 8     | MCERTS | < 8.0   |
| TPH-CWG - Aliphatic >EC21 - EC35 | mg/kg | 8     | MCERTS | < 8.0   |
| TPH-CWG - Aliphatic (EC5 - EC35) | mg/kg | 10    | MCERTS | < 10    |

|                                 |       |       |        |         |
|---------------------------------|-------|-------|--------|---------|
| TPH-CWG - Aromatic >EC5 - EC7   | mg/kg | 0.001 | MCERTS | < 0.001 |
| TPH-CWG - Aromatic >EC7 - EC8   | mg/kg | 0.001 | MCERTS | < 0.001 |
| TPH-CWG - Aromatic >EC8 - EC10  | mg/kg | 0.001 | MCERTS | < 0.001 |
| TPH-CWG - Aromatic >EC10 - EC12 | mg/kg | 1     | MCERTS | < 1.0   |
| TPH-CWG - Aromatic >EC12 - EC16 | mg/kg | 2     | MCERTS | < 2.0   |
| TPH-CWG - Aromatic >EC16 - EC21 | mg/kg | 10    | MCERTS | < 10    |
| TPH-CWG - Aromatic >EC21 - EC35 | mg/kg | 10    | MCERTS | < 10    |
| TPH-CWG - Aromatic (EC5 - EC35) | mg/kg | 10    | MCERTS | < 10    |

Analytical Report Number: 20-35658  
 Project / Site name: Clarendon Road  
 Your Order No: S-RE6075/00005

|                                         |  |       |                       |                         |  |
|-----------------------------------------|--|-------|-----------------------|-------------------------|--|
| Lab Sample Number                       |  |       |                       | 1651130                 |  |
| Sample Reference                        |  |       |                       | SP38                    |  |
| Sample Number                           |  |       |                       | None Supplied           |  |
| Depth (m)                               |  |       |                       | None Supplied           |  |
| Date Sampled                            |  |       |                       | Deviating               |  |
| Time Taken                              |  |       |                       | None Supplied           |  |
| Analytical Parameter<br>(Soil Analysis) |  | Units | Limit of<br>detection | Accreditation<br>Status |  |

#### VOCs

|                             |       |   |        |       |
|-----------------------------|-------|---|--------|-------|
| Vinyl Chloride              | µg/kg | 1 | NONE   | < 1.0 |
| Cis-1,2-dichloroethene      | µg/kg | 1 | MCERTS | < 1.0 |
| 1,1-Dichloroethane          | µg/kg | 1 | MCERTS | < 1.0 |
| 1,1,1-Trichloroethane       | µg/kg | 1 | MCERTS | < 1.0 |
| 1,2-Dichloroethane          | µg/kg | 1 | MCERTS | < 1.0 |
| Trans-1,2-dichloroethene    | µg/kg | 1 | NONE   | < 1.0 |
| Tetrachloromethane          | µg/kg | 1 | MCERTS | < 1.0 |
| Trichloroethene             | µg/kg | 1 | MCERTS | < 1.0 |
| 1,1,2-Trichloroethane       | µg/kg | 1 | MCERTS | < 1.0 |
| Tetrachloroethene           | µg/kg | 1 | NONE   | < 1.0 |
| 1,1,1,2-Tetrachloroethane   | µg/kg | 1 | MCERTS | < 1.0 |
| 1,1,1,2,2-Tetrachloroethane | µg/kg | 1 | MCERTS | < 1.0 |

#### SVOCS

|        |       |     |           |       |
|--------|-------|-----|-----------|-------|
| Phenol | mg/kg | 0.2 | ISO 17025 | < 0.2 |
|--------|-------|-----|-----------|-------|

U/S = Unsuitable Sample I/S = Insufficient Sample



**Analytical Report Number : 20-35658**  
**Project / Site name: Clarendon Road**

\* These descriptions are only intended to act as a cross check if sample identities are questioned. The major constituent of the sample is intended to act with respect to MCERTS validation. The laboratory is accredited for sand, clay and loam (MCERTS) soil types. Data for unaccredited types of solid should be interpreted with care.

Stone content of a sample is calculated as the % weight of the stones not passing a 10 mm sieve. Results are not corrected for stone content.

| Lab Sample Number | Sample Reference | Sample Number | Depth (m)     | Sample Description *    |
|-------------------|------------------|---------------|---------------|-------------------------|
| 1651130           | SP38             | None Supplied | None Supplied | Brown loam with rubble. |



**Analytical Report Number : 20-35658**  
**Project / Site name: Clarendon Road**

**Water matrix abbreviations: Surface Water (SW) Potable Water (PW) Ground Water (GW)**

| Analytical Test Name                               | Analytical Method Description                                                                                                                                              | Analytical Method Reference                                                                                     | Method number | Wet / Dry Analysis | Accreditation Status |
|----------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------|---------------|--------------------|----------------------|
| Sulphate, water soluble, in soil (16hr extraction) | Determination of water soluble sulphate by ICP-OES. Results reported directly (leachate equivalent) and corrected for extraction ratio (soil equivalent).                  | In house method.                                                                                                | L038-PL       | D                  | MCERTS               |
| Metals in water by ICP-MS (dissolved)              | Determination of metals in water by acidification followed by ICP-MS. Accredited Matrices: SW, GW, PW except B=SW,GW, Hg=SW,PW, Al=SW,PW.                                  | In-house method based on USEPA Method 6020 & 200.8 "for the determination of trace elements in water by ICP-MS. | L012-PL       | W                  | ISO 17025            |
| NRA Leachate Prep                                  | 10:1 extract with de-ionised water shaken for 24 hours then filtered.                                                                                                      | In-house method based on National Rivers Authority                                                              | L020-PL       | W                  | NONE                 |
| Asbestos identification in soil                    | Asbestos Identification with the use of polarised light microscopy in conjunction with disperion staining techniques.                                                      | In house method based on HSG 248                                                                                | A001-PL       | D                  | ISO 17025            |
| Hexavalent chromium in water                       | Determination of hexavalent chromium in water by acidification, addition of 1,5 diphenylcarbazine followed by colorimetry.                                                 | In-house method by continuous flow analyser. Accredited Matrices SW, GW, PW.                                    | L080-PL       | W                  | ISO 17025            |
| Moisture Content                                   | Moisture content, determined gravimetrically. (30 oC)                                                                                                                      | In house method.                                                                                                | L019-UK/PL    | W                  | NONE                 |
| Monohydric phenols in water                        | Determination of phenols in water by continuous flow analyser. Accredited matrices: SW PW GW                                                                               | In-house method based on Examination of Water and Wastewater 20th Edition: Clesceri, Greenberg & Eaton (skalar) | L080-PL       | W                  | ISO 17025            |
| Speciated EPA-16 PAHs in water                     | Determination of PAH compounds in water by extraction in dichloromethane followed by GC-MS with the use of surrogate and internal standards. Accredited matrices: SW PW GW | In-house method based on USEPA 8270                                                                             | L102B-PL      | W                  | ISO 17025            |
| Sulphide in water                                  | Determination of sulphide in water by ion selective electrode.                                                                                                             | In-house method                                                                                                 | L029-PL       | W                  | NONE                 |
| Thiocyanate in water                               | Determination of thiocyanate in water by discreet analyser (colorimetry). Accredited matrices SW, GW, PW.                                                                  | In house method based on SMWW 4500-CN-M. Accredited matrices: SW, PW, GW.                                       | L082-PL       | W                  | ISO 17025            |
| Sulphate in water                                  | Determination of sulphate in water by acidification followed by ICP-OES. Accredited matrices: SW PW GW, PrW.                                                               | In-house method based on MEWAM 2006 Methods for the Determination of Metals in Soil.                            | L039-PL       | W                  | ISO 17025            |
| Stones content of soil                             | Standard preparation for all samples unless otherwise detailed. Gravimetric determination of stone > 10 mm as % dry weight.                                                | In-house method based on British Standard Methods and MCERTS requirements.                                      | L019-UK/PL    | D                  | NONE                 |
| Semi-volatile organic compounds in soil            | Determination of semi-volatile organic compounds in soil by extraction in dichloromethane and hexane followed by GC-MS.                                                    | In-house method based on USEPA 8270                                                                             | L064-PL       | D                  | ISO 17025            |
| TPHCWG (Waters)                                    | Determination of dichloromethane extractable hydrocarbons in water by GC-MS, speciation by interpretation.                                                                 | In-house method                                                                                                 | L070-PL       | W                  | NONE                 |
| Volatile organic compounds in soil                 | Determination of volatile organic compounds in soil by headspace GC-MS.                                                                                                    | In-house method based on USEPA8260                                                                              | L073B-PL      | W                  | MCERTS               |
| BTEX and MTBE in soil (Monoaromatics)              | Determination of BTEX in soil by headspace GC-MS.                                                                                                                          | In-house method based on USEPA8260                                                                              | L073B-PL      | W                  | MCERTS               |
| Speciated EPA-16 PAHs in soil                      | Determination of PAH compounds in soil by extraction in dichloromethane and hexane followed by GC-MS with the use of surrogate and internal standards.                     | In-house method based on USEPA 8270                                                                             | L064-PL       | D                  | MCERTS               |



**Analytical Report Number : 20-35658**  
**Project / Site name: Clarendon Road**

**Water matrix abbreviations: Surface Water (SW) Potable Water (PW) Ground Water (GW)**

| Analytical Test Name                              | Analytical Method Description                                                                                                               | Analytical Method Reference                                                                                     | Method number | Wet / Dry Analysis | Accreditation Status |
|---------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------|---------------|--------------------|----------------------|
| BTEX and MTBE in water (Monoaromatics)            | Determination of BTEX and MTBE in water by headspace GC-MS. Accredited matrices: SW PW GW                                                   | In-house method based on USEPA8260                                                                              | L073B-PL      | W                  | ISO 17025            |
| Ammonia as NH <sub>3</sub> in water               | Determination of Ammonium/Ammonia/ Ammoniacal Nitrogen by the colorimetric salicylate/nitroprusside method. Accredited matrices SW, GW, PW. | In-house method based on Examination of Water and Wastewater 20th Edition: Clesceri, Greenberg & Eaton          | L082-PL       | W                  | ISO 17025            |
| Ammonium as NH <sub>4</sub> in leachate           | Determination of Ammonium/Ammonia/ Ammoniacal Nitrogen by the colorimetric salicylate/nitroprusside method.                                 | In-house method based on Examination of Water and Wastewater 20th Edition: Clesceri, Greenberg & Eaton          | L082-PL       | W                  | NONE                 |
| Ammonium as NH <sub>4</sub> in soil               | Determination of Ammonium/Ammonia/ Ammoniacal Nitrogen by the colorimetric salicylate/nitroprusside method, 10:1 water extraction.          | In-house method based on Examination of Water and Wastewater 20th Edition: Clesceri, Greenberg & Eaton          | L082-PL       | W                  | MCERTS               |
| Cr (III) in water                                 | In-house method by calculation from total Cr and Cr VI.                                                                                     | In-house method by calculation                                                                                  | L080-PL       | W                  | NONE                 |
| TPHCWG (Soil)                                     | Determination of hexane extractable hydrocarbons in soil by GC-MS/GC-FID.                                                                   | In-house method with silica gel split/clean up.                                                                 | L088/76-PL    | W                  | MCERTS               |
| Low level total cyanide in water                  | Determination of total cyanide by distillation followed by colorimetry. Accredited matrices: SW PW GW                                       | In-house method based on Examination of Water and Wastewater 20th Edition: Clesceri, Greenberg & Eaton (Skalar) | L080-PL       | W                  | ISO 17025            |
| Free cyanide (low level) in water                 | Determination of free cyanide by distillation followed by colorimetry. Accredited matrices SW, GW, PW.                                      | In-house method based on Examination of Water and Wastewater 20th Edition: Clesceri, Greenberg & Eaton (Skalar) | L080-PL       | W                  | ISO 17025            |
| Sulphate in leachates                             | Determination of sulphate in leachate by acidification followed by ICP-OES.                                                                 | In-house method based on MEWAM 1986 Methods for the Determination of Metals in Soil"                            | L039-PL       | W                  | ISO 17025            |
| D.O. for Gravimetric Quant if Screen/ID positive  | Dependent option for Gravimetric Quant if Screen/ID positive scheduled.                                                                     | In house asbestos methods A001 & A006.                                                                          | A006-PL       | D                  | NONE                 |
| Sulphate, water soluble, in soil (1hr extraction) | Sulphate, water soluble, in soil (1hr extraction)                                                                                           | In-house method                                                                                                 | L038-PL       | D                  | MCERTS               |

**For method numbers ending in 'UK' analysis have been carried out in our laboratory in the United Kingdom.**

**For method numbers ending in 'PL' analysis have been carried out in our laboratory in Poland.**

**Soil analytical results are expressed on a dry weight basis. Where analysis is carried out on as-received the results obtained are multiplied by a moisture correction factor that is determined gravimetrically using the moisture content which is carried out at a maximum of 30°C.**

## Sample Deviation Report



**Analytical Report Number : 20-35658**  
**Project / Site name: Clarendon Road**

| Sample ID | Other ID      | Sample Type | Lab Sample Number | Sample Deviation | Test Name                               | Test Ref      | Test Deviation |
|-----------|---------------|-------------|-------------------|------------------|-----------------------------------------|---------------|----------------|
| BH510     | None Supplied | W           | 1651127           | a                | None Supplied                           | None Supplied | None Supplied  |
| BH513     | None Supplied | W           | 1651128           | a                | None Supplied                           | None Supplied | None Supplied  |
| BH514     | None Supplied | W           | 1651126           | a                | None Supplied                           | None Supplied | None Supplied  |
| MB31      | None Supplied | W           | 1651129           | a                | None Supplied                           | None Supplied | None Supplied  |
| SP38      | None Supplied | L           | 1651131           | a                | None Supplied                           | None Supplied | None Supplied  |
| SP38      | None Supplied | S           | 1651130           | ab               | BTEX and MTBE in soil (Monoaromatics)   | L073B-PL      | b              |
| SP38      | None Supplied | S           | 1651130           | ab               | Semi-volatile organic compounds in soil | L064-PL       | b              |
| SP38      | None Supplied | S           | 1651130           | ab               | Speciated EPA-16 PAHs in soil           | L064-PL       | b              |
| SP38      | None Supplied | S           | 1651130           | ab               | TPHCWG (Soil)                           | L088/76-PL    | b              |
| SP38      | None Supplied | S           | 1651130           | ab               | Volatile organic compounds in soil      | L073B-PL      | b              |