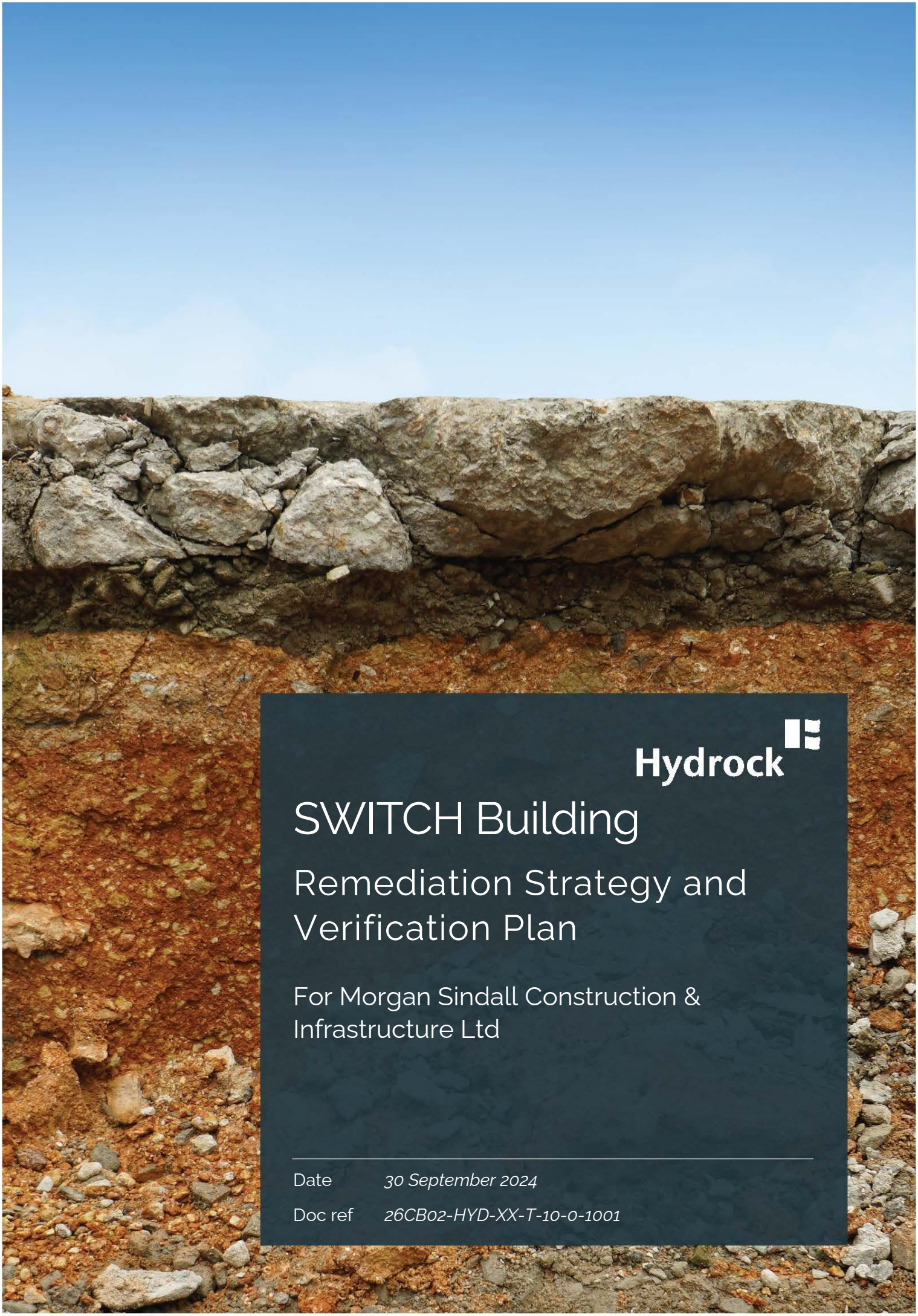

Hydrock

SWITCH Building

Remediation Strategy and Verification Plan

For Morgan Sindall Construction & Infrastructure Ltd

Date	*30 September 2024*
Doc ref	*26CB02-HYD-XX-T-10-0-1001*

Document control sheet

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Client	Morgan Sindall Construction & Infrastructure Ltd	
Project name	SWITCH Building	
Title	Remediation Strategy and Verification Plan	
Doc ref	26CB02-HYD-XX-T-10-0-1001	
Project number	26279	
Date	30/09/2024	

Document production record		
Issue number	P02	Name
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Document revision record			
Issue number	Status	Date	Revision details
P01	S2	01/07/2024	First Issue.
P02	S2	30/09/2024	Second Issue Following Client Comment

Hydrock Consultants Limited has prepared this report in accordance with the instructions of the above, named client for their sole and specific use. Any third parties who may use the information contained herein do so at their own risk.

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1. Introduction

In April 2024, Hydrock Consultants Limited (Hydrock) was commissioned by Morgan Sindall Construction and Infrastructure Ltd (the Client) to produce a Remediation Strategy and Verification Plan (RS&VP) for the proposed Swansea University Carbon Hub research facility (referred to as the South Wales Industrial Transition from Carbon Hub (SWITCH) Building). The building and associated car parking, substation, hard and soft landscaping and SuDS features (herein referred to as 'the site') is located off Oakwood Road, Port Talbot, SA13 1DE. This is illustrated in the fenton+reece Landscape Masterplan drawing ref. SWI-FEN-XX-XX-DR-L-1001 (Appendix A).

It is understood that a formal planning application for the proposed development has yet to be submitted to the Local Planning Authority (Neath Port Talbot Council), however a request for a screening opinion relating to the proposed development was made in March 2024 (ref. P2024/0155 attached in Appendix B) with a decision confirming the site was not considered an EIA Development.

This report has been written in accordance with Hydrock's proposal (Ref: 26279 Additional Fee for Planning and Design Geo Fee Proposal, dated 5th April 2024) and the Client's instruction to proceed (Remediation strategy and Verification Report Contract Number 26CB02/003, issued 19 April 2024).

It should be noted that this RS&VP does not cover the construction detail of the ground gas protection measures as this is contingent on the final design of the building and is to be produced by others.

1.1 Previous Investigation Reports

Hydrock undertook a Phase 1 Desk Study and Phase 2 Ground Investigation producing a Combined Phase 1 and Phase 2 Ground Investigation Report (Ref: 26cb02-HYD-XX-T-10-0-1000_S2_P3 dated December 2023) of the site (hereafter referred to as the 'GIR').

A number of previous investigation reports completed by others have been provided by the Client for information purposes only, with no formal reliance placed on these. These are listed below for information purposes only:

- Opus, July 2017. Neath Port Talbot Harbourside Ground Investigation Phase 1 Desk Study Report. Ref: V-C8602.01/OIC/00/XX/RP/01.
- Opus, October 2017. NPT Harbourside - Addendum Ground Gas Letter Report. Ref: V-X8602.01-OIC-20171012-NPTCBC-L-01.
- Opus, March 2018. Neath Port Talbot Harbourside Interpretive Geo-Environmental Ground Investigation Report. Ref: V-C8602.01/OIC/00/XX/RP/02.
- WSP, February 2020. Port Talbot Harbourside Controlled Waters Quantitative Risk Assessment. Ref. 62253048-002.
- WSP, March 2020. Port Talbot Harbourside Generic Quantitative Risk Assessment Supplementary Site Investigation Report. Ref. 62253048_001.
- WSP, March 2020. Port Talbot Harbourside Factual Report - Additional Product Investigation. Ref. 62253048-003.
- WSP, May 2020. Port Talbot Harbourside Geotechnical Assessment - R2 (Memorandum).
- WSP, June 2020. Remediation Strategy Port Talbot Harbourside. Ref. 622530-48-004.
- WSP, April 2022. Port Talbot Harbourside Remediation Verification Report. Ref. 70057278-RV1.

The above third-party investigations were completed as part of a set of works across the wider development site, including the subject site, which was completed in 2020 to allow the future

redevelopment of the previously industrial area. As part of these works, remediation of identified contamination has been completed and approved by the local authority as per the decision notice included within Appendix B (application no. P2020/0294).

Hydrock has therefore completed this remediation strategy and verification plan to cover outstanding construction mitigation measures for the proposed development in the SWITCH building area that are required based upon the findings of the ground investigation undertaken by Hydrock in 2023 only.

2. Conceptual Site Model

2.1 Context

This section presents a summary of the final conceptual site model pertaining to the site which was developed within the Hydrock 2023 GIR.

Table 2.1: Site summary

Item	Context
Site Location	The site is located to the immediate south of Port Talbot Parkway Railway station carpark and to the west of Oakwood Road, Port Talbot, SA13 1DE with approximate National Grid Reference 276610E, 189470N.
Site Description	The c. 2.1 ha irregularly shaped site comprised open derelict land, with an access road bisecting the site into a northern and southern half. The site was laid to Made Ground (associated with the demolition of previous structures) comprising gravel, concrete, asphalt, slag and brick. The site was generally level with small changes in elevation of c. 0.5m to the base of the drainage ditch which runs parallel to the southern side of the access road. The south-eastern part of the site was c. 1m below the level of the remainder of the site, to accommodate a SuDS pond feature with much dense vegetation cover.
Site History	In the late 1800s, historical Ordnance Survey Mapping indicates the site comprised undeveloped land with marshland, ponds and railway sidings in the south and east of the site. By the late 1910s, the site formed part of the Port Talbot Steel Works with railway lines present in the south and a building located in the northwestern corner. The use of the site increased through to the 1950s with additional rail lines, a tank, a large circular structure (gasholder) and a number of additional buildings and by the 1960s was utilised as a tank farm and chemical works. Little change occurred until the 1980s, when an electrical substation was located in the south of the site, with a roundabout in the southeastern corner. Further demolition across the site occurred through the 1990s. The northwestern part of the site was utilised as a container storage area in the early 2000s. All remaining structures were demolished by 2010. In 2020/2021 WSP and Andrew Scott Ltd completed remediation at the site, which consisted of removal of hydrocarbon impacted soils and skimming of LNAPL from open excavations across the site, The immediate surrounding area has a similar industrial history comprising docklands to the south and tin plate works, saw mills, depots and works within 250m of the site boundary. from the 1870s to the early 2000s.

Table continues:

Item	Context
Geology and Ground Conditions	The site is mapped as being underlain by Landscaped Ground over Tidal Flat Deposits over South Wales Middle Coal Measures. Proven ground conditions comprised: » 'Landscaped' Made Ground comprising brownish red to brownish dark grey slightly sandy subangular to angular fine to coarse gravel of limestone, sandstone, asphalt, concrete, brick and slag from ground level to between 2.1m and 2.8m depth; over, » Tidal Flat Deposits comprising firm to stiff grey slightly silty clay with occasional fine to coarse sand horizons to depths of between 2.7m and 3.6m bgl; over, » Alluvial Fan Deposits composed of dense dark brownish grey slightly sandy rounded fine to coarse gravel of sandstone with a low sandstone cobble content to between 2.5m and 8.5m+ bgl. Evidence of hydrocarbon contamination comprising mild to strong odours and occasional oily sheens was encountered within investigation locations largely in the northern half of the site and in the vicinity of the southwestern site boundary. No coal measures were encountered in the Hydrock Phase 2 investigation.
Hydrogeology	Tidal Flat Deposits are classified as a Secondary Undifferentiated Aquifer and the South Wales Middle Coal Measures are classified as a Secondary A Aquifer. Groundwater vulnerability mapping (presented within the Envirocheck Report) indicates the site is within an area of high vulnerability for both the superficial and the bedrock aquifer. Groundwater was encountered during the intrusive investigation and subsequent monitoring visits. A shallow water table was present within the Made Ground at elevations of between 5.62m and 5.24m AOD and confirmed to flow in generally south direction towards the Docks and sea beyond.
Hydrology and flooding	Three surface water features are located in the immediate vicinity of the site as follows: » Drainage ditch – on site to the south of central road » Attenuation pond – southeast corner of the site » Former docks – c. 50m south of the site The site is located within an area at low risk from flooding from the sea with the chance of flooding between 1 in 1000 and 1 in 100 (0.1% and 1%).
Radon	The site is within an area where less than 1% of properties are above the Radon Action Level, therefore radon protection measures are not required.

3. Risk Assessment Review

A Generic Quantitative Risk Assessment (GQRA) is outlined within the Hydrock GIR and comprised the comparison of chemical laboratory testing results of soil samples with Hydrock's Generic Assessment Criteria (GAC) to assess the suitability of materials at site for the proposed end use. The outcomes of the GQRA have been summarised below. Reference should be made to the full GQRA presented in the Hydrock GIR for further detail.

3.1 Soils Risk Assessment

3.1.1 Human Health

The site is intended for a research facility and therefore soil screening values have been selected based on the CLEA land use scenario for commercial end use.

35 total soil samples from Made Ground, Tidal Flats and Alluvial Fan Deposits were collected and tested for a combination of metals, metalloids, Polycyclic-Aromatic Hydrocarbons (PAH), petroleum hydrocarbons, asbestos and phenols. The table below summarises the recorded exceedances:

Table 3.1: Hydrock GIR Recorded Exceedances of Human Health GAC

Contaminant of concern	Generic criterion (mg/kg)	Basis for generic criterion	No. samples	Min. (mg/kg)	Max. (mg/kg)	No. samples exceeding
Made Ground						
Lead	2300	C4SL	24	21	48000	1 (TP03 at 2.4m)
Asbestos	-	GAC	24	<0.001%	0.005%	3 (TP01 at 0.3m and 1.2m and TP09 at 3.0m)
Natural Soils (Tidal Flat and Alluvial Fan Deposits)						
No Exceedances						

Elevated (but not exceeding) concentrations of lead were recorded in the soil present above and below the exceeding sample noted in Table 2 with concentrations between 1630 (TP03 at 2.55m) to 1880 mg/kg (TP03 at 1.4). Despite only a single exceedance of the lead GAC, it was concluded that due to the occurrence of similar Made Ground across the site that lead concentrations exceeding the GAC may therefore be present in other untested areas of the site. Slightly elevated concentrations (but below the GAC), of petroleum hydrocarbons were recorded across the site with concentrations of TPH ranging between 60 mg/kg to 1886 mg/kg. No further consideration for hydrocarbon impacted soils is required.

Asbestos was detected in above the limit of detection (0.001%) in two samples in the form of chrysotile fibre bundles. Given the severity of exposure, and the likelihood for more asbestos to be present in the made ground across the site (due to the limited nature of ground investigation) it is considered that a moderate risk to human health from asbestos is likely to be present and will require mitigation.

3.1.2 Phytotoxicity Assessment

Given the inclusion of areas of soft landscaping within the proposed development, a risk assessment has been produced comparing priority phytotoxic chemical concentrations against published generic assessment criteria to determine the likely risk to plant growth.

A total of 35 soil samples from Made Ground, Tidal Flats and Alluvial Fan Deposits were collected and tested for metals and pH. The table below summarises the recorded exceedances:

Table 3.2: Hydrock GIR Recorded Exceedances of Phytotoxic GAC

Contaminant of concern	Generic criterion (mg/kg)	Basis for generic criterion	No. samples	Min. (mg/kg)	Max. (mg/kg)	No. samples exceeding
Made Ground						
Chromium (III)	400	MAFF 1998	24	24	715	3
Copper	200	BS 3882:2015	24	15	503	1
Zinc	300	BS 3882:2015	24	68	537	4
Tidal Flat Deposits						
Zinc	300	BS 3882:2015	5	45	366	1
Alluvial Fan Deposits						
No Exceedances						

Within the Made Ground, concentrations of Chromium (III) and Copper significantly exceed the GAC. It should be noted that many of the GAC for phytotoxicity are based on agricultural crop yields rather than harm to particular plant species. However, due to the significance of the exceedances recorded within the Made Ground it was therefore concluded that the Made Ground would not constitute a suitable growing medium for the soft landscaped areas of the site.

3.2 Groundwater Risk Assessment

A total of six leachate samples were collected from Made Ground and six groundwater samples were collected from the Alluvial Fan groundwater body for comparison to selected Water Quality Targets (WQT). Environmental Quality Standards (EQS) for the protection of aquatic ecosystems were selected as the Water Quality Targets for the site due to the nearby surface waters that were identified as the relevant controlled waters receptors.

The test results were screened against EQS inland (freshwater) and EQS other (coastal/transitional) values due to the short distance from the coastline and presence of the former docklands and likely continuity of the groundwater bodies.

Exceedances of the WQT based on EQS for inland freshwater were recorded within for the Made Ground leachate samples for Silver, Copper, Mercury, Vanadium, Zinc, Anthracene, Benzo(a)pyrene, Fluoranthene, Naphthalene and Benzene and within the groundwater samples for Copper, Mercury, Manganese, Nickel, Vanadium, Fluoranthene, Naphthalene, Benzene, Toluene, Ethylbenzene, O-Xylene, M,P-Xylene and Aromatic Petroleum Hydrocarbons (EC5-EC7, >EC7-EC8, >EC10-EC12 and >EC35-EC44).

Exceedances of WQT based on EQS for coastal/transitional waters were similar to those recorded for EQS inland WQT with no exceedances recorded for Silver or Nickel, but with exceedances recorded for arsenic from leachate results.

No free phase product was recorded during the groundwater monitoring and sampling visits.

The recorded exceedances of the groundwater samples (with the exception of vanadium concentrations) were minor and therefore considered to represent natural background concentrations associated with the heavily industrial history of the site and immediate surrounding area.

The exceedances of Vanadium recorded within the leachate sampling is considered to pose a risk to controlled waters (30 times the EQS (inland) criteria), however it should be noted that concentrations within the groundwater beneath the site were significantly less (only 4 times the EQS (inland) criteria). Further to this, Vanadium concentrations within the groundwater did not exceed the WQT for EQS (other).

It was concluded that the perched water within the Made Ground soils are likely to be contaminated with metals, PAH and petroleum hydrocarbons. Given the shallow nature of the Alluvial Fan groundwater body, it is considered that the perched water is in hydraulic continuity with the underlying Alluvial Fan Deposits groundwater and that as the water migrates downwards, and then laterally away from the site, dilution and degradation of the leachate is likely to be occurring.

Previous remediation of the site has occurred and has been accepted by the Local Planning Authority with the discharge of contamination conditions of Planning Application P2022/0823 relating to remedial and enabling works completed on site to facilitate the regeneration of the former brownfield land for future commercial development.

Therefore, despite the recorded exceedances of the EQS, it was concluded that the site does not pose a significant risk to controlled waters, with no requirement for any further remediation.

3.3 Ground Gas Risk Assessment

Ground gas monitoring was undertaken on 3 occasions between 5th October and 6th November of 2023. The monitoring recorded positive flow and elevated concentrations of methane and concluded a BS 8485 Characteristic Situation (CS) of CS2.

No formal hydrocarbon vapour assessment has been completed as this was beyond the scope of the GIR. Therefore, to maintain conservatism, it was recommended that a vapour membrane be included within the design for the ground gas protection, due to the unknown potential for vapour migration of identified petroleum hydrocarbon contamination in the underlying groundwater.

3.4 Construction Materials Risk Assessment

Based on recorded concentrations of organic contamination (PAH, TPH, VOC, SVOC and BTEX) a preliminary screening against Table 1 of the Water UK HBF (2014) to assess the likelihood for the requirement of barrier pipe for incoming potable water supply was carried out. The recorded levels exceeded PE threshold values and it was concluded that barrier pipe would be required (subject to confirmation from the water supply company).

In addition to this, plastic pipes for drains and sewers may also be affected by the presence of organic compounds in the soil. In accordance with the British Plastics Federation Guidance (2018), recorded concentrations of petroleum hydrocarbons exceed the 200 mg/kg threshold and it was therefore concluded that the pipework manufacturer should be consulted in regard of the suitability of the pipework.

3.5 Identified Pollutant Linkages Requiring Remediation

Source-Pathway-Receptor				Comments	
Pollutant Linkage	**Source**	**Pathways**	**Receptors**	**General**	**Mitigation**
PL1	Made ground containing ad hoc significant lead concentrations	Ingestion, direct skin contact, inhalation of dust indoors and outdoors Uptake via roots	Site end-user (human health) Plant life	Significant exceedance of GAC recorded in one location	Engineered clean cover system to remove pathway.
PL2	Asbestos fibres in soil within Made Ground and reworked Alluvial Fan Deposits	Inhalation of fugitive dust outdoors	Site end users Neighbouring Properties (Human health)	Asbestos fibres detected in approximately 10% of soil samples.	Engineered clean cover system to remove pathway.
PL3	Elevated concentrations of methane with concurrent depleted oxygen and with positive flow and possibility of hydrocarbon vapours.	Migration through soils or groundwater and ingress into buildings via foundation entry points	Site end-user asphyxiation and explosive risk (human health) New buildings explosive risk	BS8485 Characteristic Situation 2.	Detailed design required by a specialist. Inclusion of vapour membrane for conservatism
PL4	Elevated concentrations of organic contaminants	Ingress via incoming water supply pipes	Site end user (human health)	Elevated organic contamination	Installation of barrier pipe (subject to confirmation from water supply company)

4. Geotechnical Recommendations

A number of geotechnical hazards were concluded to be present on site following the ground investigation. The only substantial hazard identified was from the presence of uncontrolled, laterally and vertically variable Made Ground (2,8m thick) with the risk of bearing capacity failure and settlement identified.

Due to the variation in strength, composition and compressibility of the Made Ground it was recommended that the foundations be either founded below the Made Ground (i.e. piled foundations) or founded within the Made Ground following ground improvement. It was also recommended that floor slabs be suspended to mitigate the risk of floor slab failure.

It was considered likely that Vibro Stone Columns (VSC) would be a viable solution for ground improvement of the Made Ground with an anticipated allowable net bearing pressure of 150 kN/m^2 following the treatment of the ground. In order for ground improvement to be completed, a piling mat would be required to support the ground improvement machinery during the remedial works.

5. Remediation Strategy

5.1 Objectives

The stated objectives for this project are as follows:

- Make the site suitable for use in terms of human health (within the intended end-use of commercial/industrial);
- Using best, practicable means to remediate contamination without compromising safety; and,
- Wherever technically or financially possible, utilise sustainable solutions.

5.2 Summary of Remediation Stages

Based upon the findings of the ground investigation and risk assessment, the following works will be undertaken to create a site which is suitable for its proposed commercial end use.

At this stage, no final cut and fill has been produced for the development. It is understood that site levels are unlikely to change significantly. It should be noted that import of material for filling to provide a temporary piling platform (for ground improvement works) is required and a clean cover system in soft landscaped areas will be required (detailed in Section 11 below). It has been assumed that where any cut of Made Ground occurs, these soils are to be sent for disposal off-site.

In the event that a more significant cut and fill is proposed, this RS+VP will require amendment and reissue.

5.2.1 Enablement Phase

The following works are considered necessary during the Enablement Phase of works:

- Import of geotechnically and chemically suitable material for placement within piling mat;
- Completion of ground improvement works through the installation of Vibro-Stone Columns (design and verification by others);
- Cut to required formation levels (600mm below final level) in areas of soft landscaping (where required) and stockpiling of material with subsequent stockpile testing for waste classification (prior to off-site disposal);
- Off-site disposal of waste material to appropriate off-site facilities.

5.2.2 Construction Phase

The following works are considered necessary during the construction phase of works:

- Installation of barrier pipe for incoming water supply pipes;
- Installation of ground gas protection measures (including a vapour membrane);
- Placement of clean imported material for cover system in soft landscaping areas; and,
- Validation during construction works.

5.2.3 General note

The contractors for each stage of works must manage the risks in accordance with their legal requirements and produce appropriate health and safety documentation. In addition, appropriate working methods, monitoring and reassurance testing will need to be undertaken during the works.

All works on site during any phase of work will require the use of suitable air, dust and noise monitoring and the provision and use of personal protective equipment in accordance with current guidance and legislation.

6. Enablement Phase

6.1 Use of imported materials

It is understood that a requirement for the importation of material has been identified on site in order to form a suitable piling platform to facilitate ground improvement works. Any importation of materials for earthworks should be detailed within a Materials Management Plan (MMP) and validated as per the MMP unless they comprise the following:

- Virgin quarried aggregate; or,
- Recycled aggregate from inert waste under WRAP Quality Protocol.

Prior to import from a commercial supplier, certification should be obtained detailing the source site, previous and current land use and relevant test results. A copy of this should be forwarded to the Consultant for review and comparison against the import criteria.

Chemical criteria for imported material are attached in Appendix D.

Geotechnical testing should also be completed for the imported material and screened as per the Geotechnical Design Report for the site (separate to this Remediation Strategy).

6.2 Re-Use of Site Won Materials

It is concluded that in-situ shallow soils are not suitable for re-use in areas of soft landscaping on site due to the contamination previously recorded. It is therefore expected that any material that may be cut will require disposal of off-site to a suitably licensed facility.

No formal earthworks classification has been undertaken on Made Ground soils at present and this is not likely to be required due to the proposed use of ground improvement on site. It is considered that near surface Made Ground soils are chemically suitable for to remain beneath areas of hardstanding.

The natural geology on site is suitable for re-use from a human health point of view, however given the depth to the natural deposits (c. 5m), this is not deemed to be reasonably practicable.

This above is subject to agreement from the Local Authority.

6.3 Off-site disposal of waste material

Any excavated material may be classified as a waste and it is the responsibility of the holders of the material to determine what material will require disposal. All arisings should be regarded as contaminated unless proven otherwise.

Any material to be disposed off-site must be sent to a licensed waste management facility by a registered waste carrier in accordance with applicable Waste Management Regulations.

Waste consignment / transfer notices will be required for all disposed material and are to be retained by the Contractor.

Any soils allocated for disposal will, once classified as hazardous or non-hazardous, require representative samples to be tested for Waste Acceptance Criteria (WAC) prior to their acceptance at a licensed landfill.

6.4 Mitigation measures during enablement works

6.4.1 Asbestos

Asbestos has been detected within the made ground soils on site as loose fibres between 0.001% and 0.005% by weight. Despite only three detections of asbestos across 24 samples, there is still the possibility for more asbestos to be present on site within the Made Ground.

As such, consideration for the presence of asbestos should be completed by the contractor through the production of an asbestos risk assessment and management plan in accordance with the Control of Asbestos Regulations 2012. The risk assessment is to be included within the site Health and Safety file. The asbestos risk assessment should establish what will be required to make sure that as far as is reasonably practicable, in the event asbestos is encountered:

- The spread of asbestos is prevented (airborne fibres and asbestos in soils);
- That people not involved in the works are excluded from the area; and.
- The works area is totally cleaned after works are completed.

6.4.2 Dust

To reduce the potential for dust generation, it is recommended that any double handling of soils is kept to a minimum. Soils designated for disposal should be by direct transfer to wagons and measures to minimise dust should be undertaken.

Appropriate risk assessment and mitigation measures should be in place throughout the development. As a minimum this should include damping down of the site surface, excavation and stockpiles to prevent the generation of dust.

6.4.3 Groundwater

There will be a requirement to appropriately manage any accumulation of groundwater in excavations. The Contractor will be required to make arrangements for the treatment and disposal of groundwater during excavation works.

If treatment is required, the Contractor is responsible for obtaining all necessary licences and consents.

7. Construction Phase

7.1 Installation of barrier pipe for incoming water supply

It is recommended that the Contractor is to install Protectaline (or similar) pipework for potable water supply in areas where the made ground is present. This is to be confirmed with the water supply company at the earliest opportunity.

Where barrier pipework is required, it is to be validated through the provision of delivery notes of the barrier material to site and photographic evidence of the installation of the barrier material for collation within the Validation Report.

7.2 Installation of ground gas protection measures

The proposed development requires ground gas protection measures in line with CS2, with the addition of a hydrocarbon vapour membrane.

The final construction details of ground gas protection measures is to be specified by the designer and the protection will need to be achieved by a combination of two or more of the following three types of protection measures:

- Structural barrier of the floor slab;
- Ventilation measures; or,
- Gas resistant membrane (vapour resistant).

Where a gas resistant membrane is required as part of the design, all joints and penetrations are to be sealed and the installation verified in accordance with CIRIA C735 (Mallet et al 2014). This will involve independent verification by a qualified independent third party.

The installer of the gas membrane is to present an installation methodology and a quality assurance/ quality control plan for the installation to a qualified third-party verification engineer for comment.

7.3 Installation of a clean cover system

Hydrock understands that soft landscaping is likely to consist of grassed areas with the planting of trees, meadow seeds, wetland areas and swales with no private gardens as per the landscape proposals drawing by fenton+reece (SWI-FEN-XX-XX-DR-L-1001) in Appendix A**.** Because of this variety of soft landscaping there is an allowance of different thicknesses of clean cover.

Where clean imported stone/soils are placed as part of the site land raise and are >600mm thick, this is considered to be a suitable clean cover system and the requirement for sufficient sub-soil and topsoil to provide the necessary substrate for planting should be set out by the landscape designer/architect.

7.3.1 Soft Landscaping Grassed areas, Planting of trees and meadow seed

For the protection of human health, the clean cover system as a minimum should comprise the following when directly placed onto the contaminated Made Ground soils:

- 150mm thickness of clean topsoil over;
- 450mm thickness of clean subsoil over;
- Basal membrane at 0.60m bgl to prevent mixing of clean soils and possible contaminated soils below.
- Lined tree pits may be required at greater depths than the 600mm specified above. This should be guided by the landscape architect requirements for supporting tree growth.

7.3.2 Soft Landscaping Wetland Areas and Swales Grassed areas, Planting of trees and meadow seed

For the protection of human health, the clean cover system as a minimum should comprise the following when directly placed onto the contaminated Made Ground soils, as shown in drawing 26CB02-HYD-53-ZZ-D-C-0400 swale + wetland plan.

- 150mm thickness of clean topsoil over;
- 300mm thickness of clean subsoil over;
- 300gsm protective matting over geomembrane
- EDPM Geomembrane liner
- Total Thickness 450mm plus matting and membrane

7.3.3 Hard Landscaping

All hard landscaping does not require a clean cover system as described above, provided the surfacing prevents human interaction with the underlying Made Ground Soils. The build up of hard landscaping should be as per the Civil Engineers requirements to meet performance requirements.

7.3.4 Clean cover materials

Criteria for imported sub- and topsoil is detailed in sections 6.3.3 and 6.3.4 below. Any imported soils should be from a natural source not expected to be contaminated.

Prior to import from a commercial supplier, certification should be obtained detailing the source site, previous and current land use and relevant test results. A copy of this should be forwarded to the Environmental Consultant for review and comparison against the import criteria.

Following import to site, chemical testing of the imported soils will be required to confirm the imported soils are the same as those sampled at the donor site or for the supplied certification.

7.3.5 Stockpiling of materials

On importation of Topsoil and Subsoil, the materials should be stockpiled at a suitable location and copies of the carrier consignment notes should be retained and a copy forwarded to the Environmental Consultant. Clean imported material should be stockpiled away from areas designated for storing other materials or potential sources of contamination. Soils should be stockpiled on geotextile separator layers to prevent cross contamination with underlying made ground soils. Site-won material should be stockpiled away from imported material.

Stockpiles should also be created for each different source of material with topsoil stockpiles to be kept below 2.0m in height with traffic on the stockpile kept to a minimum.

7.3.6 Physical Requirements

Imported topsoil should conform to the requirements of BS3882:2015 Specification for Topsoil and requirements for use.

Imported clean cover soils should be free of asbestos, metal, plastic, wood, glass, tarmac, brick, paper, concrete or other potentially hazardous foreign material which could cause injury. Additionally, all materials must be free from invasive and/or non-native species.

7.3.7 Chemical Requirements

For all imported soils, certification from the commercial supplier should be review prior to import.

Chemical testing of the imported material should be undertaken at a frequency of 1 per 250m3 with a minimum of 3 samples per source.

Dependent on the source and/or variability of the imported material, the Consultant may request additional testing to be undertaken.

The results of all material to be used in landscaped areas are to be compared with the import criteria presented in Appendix D. If any of these thresholds are exceeded the material shall be considered to be unsuitable and disposed of off-site.

8. Verification Plan

8.1 Objectives

This RS&VP has identified the requirement for mitigation measures at the subject site in order to provide a development that is fit for purpose / suitable for use.

These remedial works described require verification of completeness and suitability for future use. The verification of the works must be suitable to demonstrate to the regulating bodes that the RS&VP has been complied with, and ultimately such that any planning conditions relating to land quality can be discharged.

The verification process is also required to provide a permanent record of the remedial works undertaken at the subject site. The sections below summarise the various activities requiring verification and also comment upon the verification reporting process.

Verification visits shall be made by a suitably experienced and qualified independent geo-environmental consultant who shall undertake the necessary works outlined below.

8.2 Construction Phase Verification

8.2.1 Ground gas protection measures

The installation of the ground gas membranes is to be verified by a suitably qualified third party. Particular focus should be given to joins and any service pipe entry points. A copy of the membrane verification report should be issued by the verification company to the client to assist in discharging relevant planning conditions.

8.2.2 Verification of Clean Cover system

To verify the suitability of the clean cover system, each area of soft landscaping will require the following:

- Screening of the chemical test results against the import criteria contained within Appendix D prior to importation / placement commencing; and,
- Confirmation of the presence of a minimum 150mm topsoil over 450mm subsoil or 150mm over 300mm subsoil. No verification is required in areas of hard landscaping. Such as pathways roads and car parking.

8.3 Verification Report

A verification report is required to show that the site is suitable for use.

It is recognised that visits to assess the completed works will be undertaken on a phased basis and are unlikely to be undertaken in one visit. The reporting will be completed once all verification visits are complete, however, interim technical notes of site visits can be provided if required.

The verification report shall include the following;

- Assessment of chemical properties on requisite frequency for all identified sources of imported materials;
- Consignment notes for all imported topsoil and sub-soil materials provided by the groundworker.
- A written summary of works verified.
- Cover thickness verification, supported by a photographic record of each verification location.

- A written statement that the supervising consultant believes remedial works were undertaken in accordance with this RS&VP.

9. Reuse of Soils and Materials Management

At the time of writing, it is considered that all cut materials are to be disposed of off-site (unless it can be verified that the cut materials are suitable for re-use on site) and the upfilling for the piling rig working platform and clean cover system is to be completed with imported clean naturally occurring soils. As such an MMP is not considered necessary. If this changes an MMP may be required prior to any excavation on site.

9.1 Sourcing of Imported Materials

The import of suitable topsoil for use in landscaped areas will be required. Import of geotechnically suitable material will also be required for the piling platform to facilitate ground improvement.

Soils to be imported should be accompanied with proof of provenance. This is to demonstrate that there is a low risk that the soils have been contaminated as a result of past land uses. This information should be obtained in advance of chemical testing on the imported material so a suitable testing regime can be adopted.

The following protocol applies to all imported soils:

- The soil is from an identified site, which has no history of potentially contaminative uses;
- A map and site plan showing the location of the source site and a grid reference for the site must be provided to the relevant Local Authority;
  - When checking the source site, accurate details of where the soil was actually stripped from are required, not just the site where it has been stockpiled or screened.
- The material should be free from obvious anthropogenic (man-made) material including but not limited to glass, brick, concrete and asphalt etc. and be free from obvious staining and odours;
- If there is any doubt about the material, written confirmation from the relevant Local Authority may be required to confirm that the source site has no known history of contamination;
- In addition to the above, any imported material must be chemically suitable for use and meet the criteria as outlined in Appendix D;
- Testing frequency required for the material is as follows:
  - **1 sample per 500m^3** for a natural source (with a minimum of three tests per source); and,
  - **1 sample per 250m^3** for a product (i.e. a blended/manufactured topsoil, or recycled 6F5 aggregate with a minimum of three tests per source).

9.2 Stockpiling of Materials

Any material generated from construction activities shall be stockpiled separately by material type (i.e., Made Ground, and natural Tidal Flat Deposits). Similarly, any materials being imported to site, for example clean topsoil, or construction aggregates, shall likewise be stockpiled separately. Stockpile management shall be undertaken in accordance with the following protocol.

- Separate stockpiles shall be created for each material type, whether site won materials or imported materials and shall be appropriately labelled/identified on site.
- Stockpiles shall not be cross-contaminated, double handling shall be avoided and stockpiles shall remain quarantined until ready for use.
- Topsoil shall not be placed during or after heavy or prolonged periods of rainfall.

- For imported materials, copies of the carrier's Consignment Notes shall be retained on site and made available for inspection by the supervising consultant and for including within the verification report.
- A record of all imported materials (i.e. deliveries) shall be maintained by the Site Manager recording details of material type, source of the imported material, and consignment note reference numbers.
- In addition, the Site Manager shall record the status of each stockpile, in terms of material type, source site, volume, and intended use on site.

10. Protocol for discovery of unexpected contamination

There is the potential that unexpected contamination will be encountered during the remedial and construction works. Should any previously unidentified suspected (by visual or olfactory means) contaminated material be encountered during the development of the site, then the Discovery Strategy included in Appendix C should be followed.

A copy of the Discovery Strategy should be on site at all times and displayed in a prominent area (e.g. Health and Safety Notice board) where all site staff are able to take note of, and consult the document at any time. Any member of the workforce undertaking any excavation must be made aware of the potential to discover contamination and the requirement to follow the Discovery Strategy.

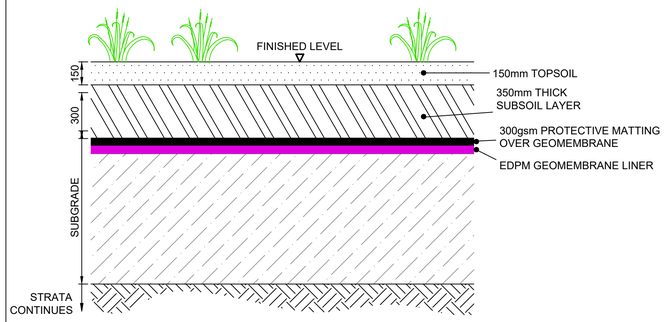
In the event of the discovery of unexpected contamination, a report will be prepared by the Consultant and submitted to the regulatory parties, namely the Local Planning Authority and Natural Resources Wales where groundwater may potentially have been impacted.

It should be noted that in the event of the discovery of unexpected contamination, as a minimum the following will be required:

- Site activities in the immediate vicinity shall cease and an independent geo-environmental consultant shall be contacted and provided with a summary of the observations made;
- Neath Port Talbot Council may require contact depending on the find and its perceived risk;
- If required, a geo-environmental consultant shall attend site and undertake appropriate investigations to establish the extent of the contamination;
  - Depending on the extent and volume of material present, the materials shall be removed and temporarily stockpiled (on suitable plastic sheeting) to enable construction activities to continue;
- The geo-environmental consultant shall identify an appropriate scope of chemical analysis and if required, agree this with the relevant regulator(s);
- The resultant chemical analyses shall be compared with the adopted acceptance criteria. and where appropriate be re-used on site or transferred to a suitable soil treatment facility or landfill (as applicable); and,
- Update the RS&VP.

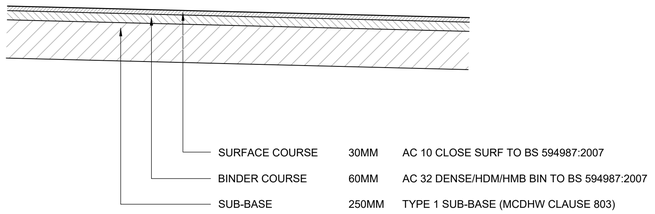
Prior to implementing an amendment to the remedial strategy, as presented within this RS&VP Neath Port Talbot Council may be consulted for agreement pending the level of risk.

Appendix A Drawings



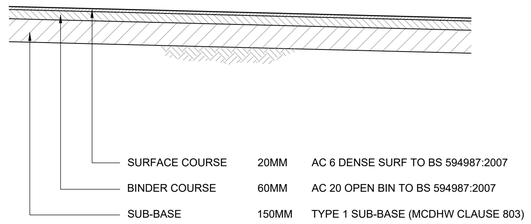
DRAINAGE WETLAND MAKE-UP

SCALE 1:20



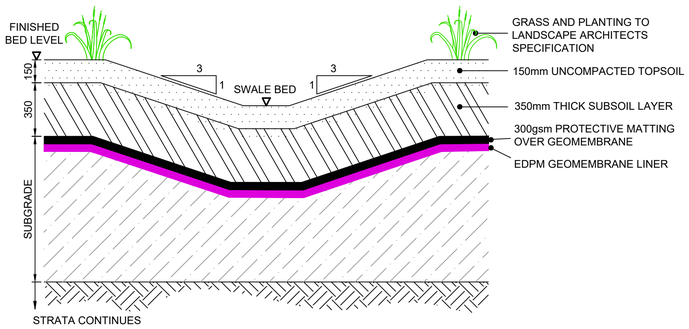
TARMAC (PARKING BAY)

SCALE 1:20
BASED ON >5% CBR



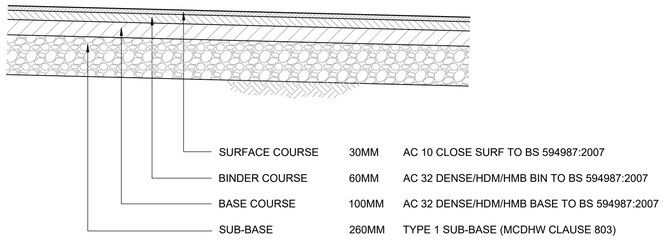
TARMAC - FOOTPATH

SCALE 1:20
BASED ON >5% CBR



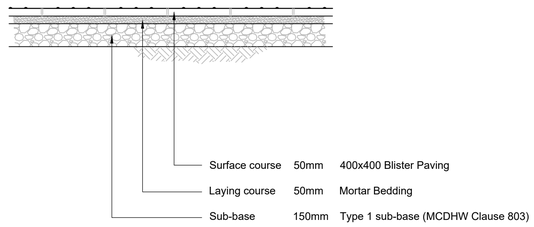
SWALE MAKE-UP

SCALE 1:20



TARMAC (CAR PARK ACCESS)

SCALE 1:20
BASED ON >5% CBR

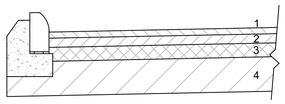


TACTILE PAVING

SCALE 1:20
BASED ON >5% CBR

GENERAL NOTES:

1. DRAWING TO BE READ IN CONJUNCTION WITH ALL OTHER RELEVANT PROJECT DRAWINGS AND WITH THE HEALTH AND SAFETY INFORMATION PROVIDED AND/OR WITHIN THE PRE-CONSTRUCTION INFORMATION.
2. USE OF THIS DRAWING DOES NOT ABSOLVE THE CLIENT FROM HIS RESPONSIBILITIES UNDER THE HEALTH AND SAFETY: THE CONSTRUCTION DESIGN AND MANAGEMENT REGULATIONS 2015. THE PRINCIPAL DESIGNER IS REQUIRED TO CONTACT HYDROCK CONSULTANTS PRIOR TO PERMITTING THIS DRAWING TO BE USED IN CONNECTION WITH ANY CONSTRUCTION WORKS.
3. BEFORE COMMENCEMENT OF ANY WORKS ASSOCIATED WITH THE DRAWING REFER TO ALL RELEVANT HEALTH AND SAFETY INFORMATION FOR THE WORKS INCLUDING RESIDUAL RISK INFORMATION.
4. THE CONTRACTOR SHOULD COMPLY WITH HS(G) 47 "AVOIDING DANGER FROM UNDERGROUND SERVICES" WHEN PLANNING, LOCATING AND EXCAVATING AROUND EXISTING SERVICES. IT IS KNOWN THAT EXISTING UTILITY COMPANY UNDERGROUND SERVICES AND APPARATUS ARE PRESENT WITHIN THE PROPOSED WORKS AREA AND IT IS THE CONTRACTORS RESPONSIBILITY TO LOCATE EXISTING SERVICES ON SITE ACCURATELY.
5. INFORMATION REGARDING THE LOCATION AND DEPTH OF EXISTING SERVICES CANNOT BE GUARANTEED BY THE STATUTORY UNDERTAKER.
6. THE CONTRACTOR SHALL CONDUCT THE WORKS WITH DUE REGARD FOR THE ECOLOGICAL AND ENVIRONMENTAL REQUIREMENTS OF THE SCHEME.
7. THE DRAWING SHALL BE USED FOR THE INTENDED PURPOSE ONLY AND THIS DRAWING HAS BEEN BASED ON INFORMATION PROVIDED BY OTHER PARTIES AND HYDROCK DO NOT WARRANT THE ACCURACY OF THIS INFORMATION. DIMENSIONS SHALL NOT BE SCALED FROM THE DRAWING AND THE CONTRACTOR SHALL BE RESPONSIBLE FOR OBTAINING ALL DIMENSIONS AND LEVELS ON SITE FOR THE ACTUAL SETTING OUT OF THE WORKS. DIMENSIONS MARKED 'DIMENSIONS TO BE SITE CHECKED' ARE SUBJECT TO CONFIRMATION BY THE CONTRACTOR BEFORE THE WORKS COMMENCE.
8. HYDROCK IS NOT RESPONSIBLE FOR CHECKING DIMENSIONS ON SITE.
9. HYDROCK IS NOT RESPONSIBLE FOR SETTING OUT GRID LINES, BUILDING LINE ETC
10. HYDROCK IS NOT RESPONSIBLE FOR DIMENSIONS USED IN THE ORDERING AND MANUFACTURING OF EQUIPMENT AND THIS SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR.
11. ALL FIGURED LEVELS ARE IN METRES AND RELATED TO EXISTING SURVEY GRID & DATUM UNLESS NOTED OTHERWISE
12. ALL FIGURED DIMENSIONS ARE IN METRES UNLESS NOTED OTHERWISE.
13. TEMPORARY WORKS DESIGN ASSOCIATED WITH THE CONSTRUCTION OF THE WORKS SHALL BE RESPONSIBILITY OF THE CONTRACTOR.
14. THE CONTRACTOR SHALL MAINTAIN FREE AND OPEN ACCESS TO PUBLIC HIGHWAY AND ADJACENT LANDS AT ALL TIMES DURING THE COURSE OF THE WORKS UNLESS OTHERWISE AGREED IN WRITING WITH THE INTERESTED PARTIES.
15. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE DESIGN OF ALL TRAFFIC MANAGEMENT PROPOSALS & PHASING. SUCH DETAILS SHALL BE SUBMITTED TO THE LOCAL HIGHWAY AUTHORITY FOR APPROVAL PRIOR TO THE START OF THE WORKS. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ALL ASSOCIATED COSTS AND ORDERS.
16. CONFLICTING INFORMATION SHOWN ON THE ENGINEER'S DRAWINGS OR DISCREPANCIES BETWEEN THE INFORMATION GIVEN BY THE ENGINEER AND THAT PROVIDED BY OTHERS MUST BE REFERRED TO THE ENGINEER BEFORE THE WORKS COMMENCE.



CARRIAGEWAY CONSTRUCTION TO ADOPTABLE STANDARD

SCALE 1:20

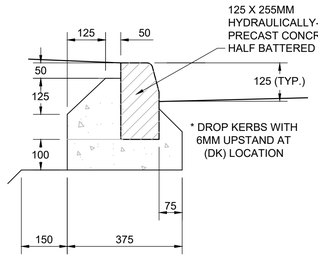
1. SURFACE COURSE: HRA 30/14 F surf 40/60 or HRA 30/14 C surf 40/60 des (to BS 13108-4; PD 6691 Annex C).Minimum PSV of course aggregate: 45. Aggregate Types: Crushed rock or Slag (Blast Furnace or Steel Slag). Coated chippings: 14/20mm (to BSI PD 6682-2) and Clause 915 (BS 13108-4; PD 6691 Annex C). Minimum PSV: 65. Maximum AAV: 12 - CLAUSE 911 (BS 13108-4; PD 6691 ANNEX C).
2. BINDER COURSE: 60mm HOT ROLLED ASPHALT 40/60 CLAUSE 905, HRA 60/20 BIN 40/60 TO BS 13108-4 (PD 6691 ANNEX C).
3. ROAD BASE: 150mm DENSE BASE ASPHALT CONCRETE 100 /150 906, AC 32 DENSE BASE 100/150 TO BS 13108-1 (PD 6691 ANNEX B), WHERE BLUE PENNANT GRITSTONE IS USED THE BINDER CONTENT SHALL BE: 4.7 ± 0.5%.
4. SUB BASE: SUB-BASE 250mm GRANULAR SUB-BASE TYPE 1, MINIMUM CBR: 5%, NOTE: CAPPING REQUIRED AS SHOWN IN DESIGN GUIDE FOR RESIDENTIAL, INDUSTRIAL AND COMMERCIAL ESTATE ROADS WHERE CBR VALUES LOWER THAN 5%.

NOTE
ROAD CONSTRUCTION BASED ON CBR VALUE OF GREATER THAN 5% AS RECOMMENDED ON GROUND INVESTIGATION REPORT

TABLE 7.3

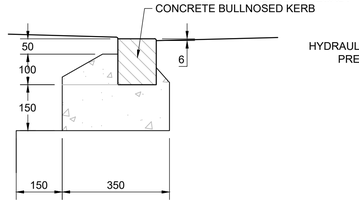
CBR of Sub-Grade	Capping Layer (mm)	Sub-base (mm)	Overall Thickness (mm)
Under 2%	600	150	750
2% - 5%	350	150	500
Above 5%	0	250	250

CAPPING MATERIAL SHALL BE A MINIMUM CLASS 6F1 OR 6F2 MATERIAL AS SPECIFIED IN TABLE 6/1 OF THE SPECIFICATION OF HIGHWAY WORKS.



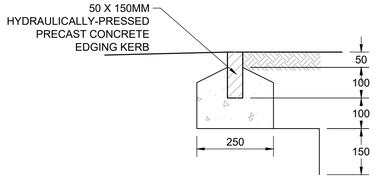
KERB DETAIL (HB2)

SCALE 1:10



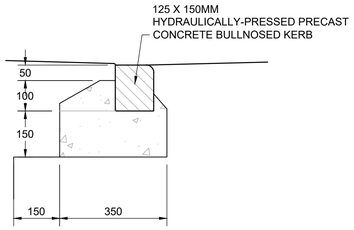
KERB DETAIL (BN3 6mm UPSTAND)

SCALE 1:10



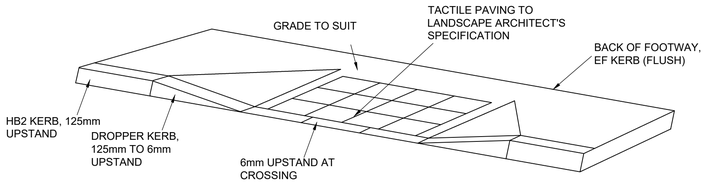
KERB DETAIL (EF)

SCALE 1:10



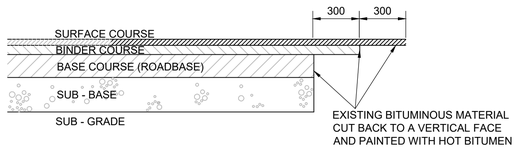
KERB DETAIL (BN3 FLUSH)

SCALE 1:10



INDICATIVE PEDESTRIAN CROSSING DROPPED KERB DETAIL

SCALE 1:20



STAGGERED JOINTS IN FLEXIBLE CARRIAGEWAYS

SCALE 1:20

Notes:
All dimensions are to be checked on site before the commencement of works. Any discrepancies are to be reported to the Architect & Engineer for verification. Figured dimensions only are to be taken from this drawing.This drawing is to be read in conjunction with all relevant Engineers' and Service Engineers' drawings and specifications. This drawing is copyright.

REVISIONS

Rev	Date	Description	By	Ckd	App
P01	19/04/2024	SuDS feature topsoil depth updated	JH	RB	RB
P01	25/03/2024	First Issue	JH	RB	RB

Hydrock
FIRST FLOOR, CASTLEBRIDGE 5
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5-19 COWBRIDGE ROAD EAST
CARDIFF
CF11 9AB
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e: cardiff@hydrock.com

CLIENT
MORGAN SINDALL

PROJECT
SWITCH

TITLE
CONSTRUCTION DETAILS
SHEET 1

HYDROCK PROJECT NO.
C-26279

SCALE @ A1
AS SHOWN

STATUS DESCRIPTION
FOR INFORMATION

STATUS
S2

DRAWING NO. (PROJECT CODE-ORGINATOR-ZONE-LEVEL-TYPE-ROLE-NUMBER)
26CB02-HYD-53-ZZ-D-C-0400

REVISION
P02

Legend

Hardworks:

Existing Vehicular Tarmac:
Roads retained and repaired as necessary

Existing Pedestrian Tarmac:
Paths retained and repaired as necessary

Proposed Pedestrian Tarmac (active travel route):
Permeable tarmac - Buff coloured
To Engineers build-up specification

Proposed Pedestrian Block Paving:
Permeable paving units - Dark Grey colour
To Engineers build-up specification

Proposed Vehicular Tarmac (to highway):
Permeable tarmac - Black/ grey colour
To Engineers build-up specification

Proposed Vehicular Tarmac (to building apron):
Permeable tarmac - Light Grey colour
To Engineers build-up specification

Proposed Vehicular Block Paving (parking bays):
Permeable block paving - Black/ grey colour
To Engineers build-up specification

Proposed Vehicular 'Grasscrete' (parking bays):
Open 'grasscrete' to edge parking for staff areas
To Engineers build-up specification

Softworks:

Proposed Grass Seed Mix:
Semi-improved grass seed mix.
Locally sourced

Proposed SUDs Features:
Wet-meadow seed mix with supplementary native marginal
Locally sourced

Proposed Meadow Mix:
Grass and wildflower seed mix to macth previous biodiversity mitigation areas

Proposed Pollinator & Foraging Mix:
Native whip mix, flowering native species for berries & pollinators
1m centres, 80-100cm whips

Proposed Tree Planting Mix:
Tree planting, focussed on native flowering species beneficial to pollinators, standard trees, rootball and staked

Site Features:

Cycle Storage:
Covered shelter, cycle hoops
Habitat intergrated features & growing fence walls

Bee Towers:
Feature concrete solitary bee posts
Green and Blue Beeposts or equal

Undisturbed Mitigation Planting:
Area of site to remain untouched as to not affect existing mitigation planting implemented on site in previous works

0m 10m 20m 30m 40m

VISUAL SCALE 1:500 @ A2

Notes

- Drawing is copyright of fenton+reece
- Only labelled dimensions are to be taken from this drawing. Do not scale from this drawing.
- Contractor is responsible for taking and checking all dimensions, below ground services and setting out.
- All elements of design should be checked on site and conflicts reported to responsible designer..**If in doubt ask**

Rev.	Revision description	Drawn	Checked	Date
P04	Updated with Architects comments	MR	RF	240205
P03	External VE changes & G.I. requirements	MR	RF	240201
P02	Amended reduced hard standing around building	RF	RF	231010
P01	Stage 2 Issue	RF	RF	230914

fenton+reece

www.fentonreece.com | hello@fentonreece.com

Project
SWITCH HARBOURSIDE
for MORGAN SINDALL

Title
Landscape Masterplan

Project Status
S1 - For Co-Ordination

Drawing Number
SWI -FEN -XX -XX -DR -L -1001

Rev.
P04

C:\Users\matth\OneDrive\CompanyData\001_Projects\23_008 Switch Swansea Uni\003 Design\RVT\SWI_FEN_XX_XX_M3_L_1000.rvt

CUT AND FILL DATA

No surface edits

NUMBER	MINIMUM LEVEL	MAXIMUM LEVEL	COLOUR	VOLUME	TOTAL
1	-1.50	-1.00		1m3	1,048m3 CUT
2	-1.00	-0.50		125m3	
3	-0.50	0.00		922m3	
4	0.00	0.50		2841m3	3,116m3 FILL
5	0.50	1.00		275m3	
6	1.00	1.50		0.1m3	
				TOTAL FILL	2,068m3

CUT AND FILL NOTES:

1. DRAWING TO BE READ IN CONJUNCTION WITH ALL OTHER RELEVANT PROJECT DRAWINGS
2. THIS BULK EARTHWORKS EXERCISE PRODUCED FOR COSTING PURPOSES AND INDICATES THE POTENTIAL FINAL EARTHWORKS RESULT BASED ON A SIMPLIFIED SURFACE COMPARISON BASIS ONLY. IT IS SUBJECT TO DETAILED DESIGN AND FULL REASSESSMENT AGAINST PROPOSED FORMATION LEVELS DURING THE NEXT STAGE.
3. THIS PLAN SHOWS A CUT AND FILL VOLUME COMPARISON BETWEEN THE FOLLOWING TWO SURFACES,
   (EXISTING GROUND LEVELS) &
   (PROPOSED FINISHED GROUND LEVELS MINUS 450mm
   WHICH IS THEN SPLIT IN A SUMMARY TABLE.
4. THIS IS GEOMETRIC VOLUME ANALYSIS AND THEREFORE NO ALLOWANCE HAS BEEN MADE FOR BULKING AND SHRINKING OF ANY MATERIAL OR GEOTECHNICAL SUITABILITY OF MATERIAL REUSE IN THE FINAL CONSTRUCTION. CONTRACTOR TO CONSULT THE GROUND INVESTIGATION AND INSTRUCT A DETAILED EARTHWORKS STRATEGY AND MATERIALS MANAGEMENT PLAN, BASED ON THE FINAL CUT AND FILL VOLUME ASSESSMENT TO DETERMINE FINAL SOLUTION.
5. NO REFERENCE HAS BEEN MADE TO INTERPRETATIVE OR FACTUAL GROUND INVESTIGATION AND NO CONSIDERATION HAS BEEN MADE IN RELATION TO THE GEOTECHNICAL ACCEPTABILITY OF EXISTING EXCAVATED MATERIALS FOR REUSE IN FILL AREAS
6. CUT FILL VOLUMES HAVE BEEN DERIVED BETWEEN EXISTING GROUND LEVELS AND FINISHED GROUND LEVELS TAKING NO ALLOWANCE FOR TOP SOIL, DEMOLITION OR ANY OTHER CONSTRUCTION VOLUMES (INCLUDING BUT NOT LIMITED TO FEATURES SUCH AS SOFT SPOTS, BURIED OBSTRUCTIONS, CONSTRUCTION MAKE-UP, FOUNDATIONS, DRAINAGE, ARISING ETC)
7. ALL EXCAVATED MATERIALS SHOULD BE DISPOSED OF BY A SUITABLY LICENSED WASTE CARRIER WITH APPROPRIATE TESTING. IF EXCAVATED MATERIALS ARE TO BE RE-USED ON SITE THEN A MATERIALS MANAGEMENT PLAN MIGHT BE REQUIRED.

EARTHWORKS NOTES:

1. DRAWING TO BE READ IN CONJUNCTION WITH ALL OTHER RELEVANT PROJECT DRAWINGS
2. CONFLICTING INFORMATION SHOWN ON THE ENGINEER'S DRAWINGS OR DISCREPANCIES BETWEEN THE INFORMATION GIVEN BY THE ENGINEER AND THAT PROVIDED BY OTHERS MUST BE REFERRED TO THE ENGINEER BEFORE THE WORKS COMMENCE.
3. THE CONTRACTOR SHALL USE SETTING OUT COORDINATES AND DIMENSIONS PROVIDED WHICH TAKE PREFERENCE OVER ANY LESS ACCURATE SCALED DIMENSIONS.
4. TEMPORARY WORKS DESIGN ASSOCIATED WITH THE CONSTRUCTION OF THE WORKS SHALL BE RESPONSIBILITY OF THE CONTRACTOR.
5. PRIOR TO THE START OF THE WORKS THE CONTRACTOR SHALL AGREE A REGIME OF FORMATION TESTING WITH THE ADOPTING AUTHORITY. THE FINDINGS OF SUCH TESTING (FOR EXAMPLE CBR READINGS) SHALL BE AGREED WITH THE ADOPTING AUTHORITY AND THE CAPPING / SUB BASE DESIGN REVIEWED ACCORDINGLY.
6. FOR DETAILS OF LANDSCAPING REFER TO THE ARCHITECT'S DRAWINGS AND SPECIFICATION
7. ALTERNATIVE DESIGNS FOR THE REQUIRED GROUND IMPROVEMENTS MAY BE PRESENTED BY THE CONTRACTOR FOR CONSIDERED.
8. CALCULATIONS AND DRAWINGS OF ALL CONTRACTOR DESIGNED ITEMS SHALL BE SUBMITTED TO THE OVERSEEING ORGANISATION AND THE CLIENT FOR COMMENTS / APPROVALS NOT LESS THAN 10 WORKING DAYS PRIOR TO CONSTRUCTION. ANY COMMENTS MADE BY THE ABOVE PARTIES SHALL NOT ABSOLVE THE CONTRACTOR OF HIS DESIGN RESPONSIBILITIES.

REVISIONS

Rev	Date	Description	By	Ckd	App
P01	15/02/24	First Issue	JB	RB	MA

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e: cardiff@hydrock.com

CLIENT
MORGAN SINDALL

PROJECT
SWITCH HARBOURSIDE

TITLE
PROPOSED LEVELS v EXISTING LEVELS ISOPACHYTES

HYDROCK PROJECT NO.
C-26279

SCALE @ A1
1:500

STATUS DESCRIPTION
FOR INFORMATION

STATUS
S2

DRAWING NO. (PROJECT-ORIGINATOR-ZONE-LEVEL-TYPE-ROLE-NUMBER)
SWI-HYD-XX-XX-DR-C-1041

REVISION
P01

Filename: Y:\26000-26999\26279 - SWITCH\01 WIP\DR Drawing\CS\WI-HYD-XX-00-DR-C-1041 Earthworks outline.dwg

Appendix B Planning Consent

NEATH PORT TALBOT COUNTY BOROUGH COUNCIL
CYNGOR BWRDEISTREF SIROL CASTELL-NEDD PORT TALBOT

TOWN AND COUNTRY PLANNING ACT 1990
THE TOWN AND COUNTRY PLANNING (DEVELOPMENT MANAGEMENT PROCEDURE)(WALES) ORDER 2012

APPROVAL OF FULL PLANNING PERMISSION

Name and address of the applicant
NPTCBC Engineering & Transport -
Amanda Philips
The Quays
Brunel Way
Baglan Energy Park
Neath
Neath Port Talbot
SA11 2GG

DATE REGISTERED:	15 April 2020
APPLICATION NO:	P2020/0294
LOCATION:	Harbourside Strategic Employment Site, Harbourside Road, Port Talbot
PROPOSAL:	Construction of an access road, flood mitigation works, land contamination remediation works, improving the load capacity of the ground and associated works to facilitate the regeneration of a former brownfield land for future commercial development.

NEATH PORT TALBOT COUNTY BOROUGH COUNCIL as the Local Planning Authority in pursuance of its power under the above mentioned Act and Order hereby **GRANTS PLANNING PERMISSION** for the development as described above to be carried out in accordance with the application and the plans submitted therewith, subject to compliance with the following conditions:

This Decision Notice is REVISION NUMBER 5, issued on 11/11/2022

Conditions:-

Time Limit Conditions

1 The development shall begin no later than five years from the date of this decision.
Reason:
To comply with the requirements of Section 91 of the Town and Country Planning Act 1990.

List of Approved Plans

2 The development shall be carried out in accordance with the following approved plans and documents:

C2014B-LOC-001-P Location Plan (Rev B)
C2014B-CR-0001-P Contractor Routes
C2014B-GA-0101-P General Arrangement- Access Road
C2014B-GA-0104-P General Arrangement Standard Details
C2014B-SC-0201-P Site Clearance main development site and carpark extension
C2014B-F-0301-P Accommodation Works
C2014B-DR-0501-P Drainage Main Development
C2014B-DR-0504-P Drainage Long section and Control Camber Details
C2014B-DR-0505-P Drainage Construction Details and Typical sections
C2014B-DR-0506-P Drainage Standard Details
C2014B-DR-0507-P Drainage Gulley Types and Gulley Connections
C2014B-EW-0601-P Earthworks
C2014B-EW-0602-P Biodiversity Mitigation Areas (Rev A)
C2014B-RP-0701-P Road Pavements
C2014B-K-1101-P Kerbs Footways and paved Areas
C2014B-RM-1201-P Traffic Signs and Road Markings
C2014B-PL-1301-P Lighting Design
C2014B-PL-1302-P Lighting Standard Detail
C2014B-CU-1701-P Flood mitigation Culvert General Arrangement 1 of 2
C2014B-CU-1702-P Flood mitigation Culvert general arrangement 2 of 2
C2014B-SU-2701-P Existing Services
C2014B-SP-0101-P Swept Path Analysis
C2014B-XS- 0001 Cross section location
C2014B-XS- 0002 Cross section 1 of 2
C2014B-XS- 0003 Cross section 2 of 2
C2014B-DR-WW-0001 Drainage main Development
C2014B-SU-AWM-D-001 Afan water Main

Reason:
In the interests of clarity.

Pre-Commencement Conditions

3 Prior to any development commencing on site, the developer must do the following:-

a)Notify the Local Planning Authority in writing that you intend to commence development by submitting a Formal Notice under Article 24B of the Town and Country Planning (Development Management Procedure) (Wales) Order 2012 (DMPWO) in the form set out in Schedule 5A (a newly inserted Schedule) of the DMPWO (or in a form substantially to the like effect); and
b)Display a Site Notice (as required by Section 71ZB of the 1990 Act) in the form set out in Schedule 5B (a newly inserted Schedule) of the DMPWO (or in a form substantially to the like effect), such Notice to be firmly affixed and displayed in a prominent place, be legible and easily visible, and be printed on durable material. Such Notice must thereafter be displayed at all times when development is being carried out.

Reason:
To comply with procedural requirements in accordance with Article 24B of the Town and Country Planning (Development Management Procedure) (Wales) Order 2012 (DMPWO) and Section 71ZB of the Town and Country Planning Act 1990.

NOTE: Templates of the required Notice and Site Notice are available to download at www.npt.gov.uk/planning
The applicant notified Local Planning Authority in line with the above condition under planning permission ref. P2021/0201 on the 26/02/2021

4 No development shall commence on site, including site clearance, until a Construction Environmental Management Plan (CEMP) has been submitted to and approved in writing by the Local Planning Authority. The CEMP shall be made with reference to the requirements of British Standard BS5228-1:2009 - "Code of practice for noise and vibration control on construction and open sites". The CEMP should include the following information: -

(a) Construction methods: details of the extent and phasing of development; details of construction materials or techniques to be used; details for the storage and management of plant and materials used in constructing the development and details, waste and contaminated land.

(b) General Site Management: details of the construction programme including timetable; details of site clearance; construction drainage, site setup plan detailing sensitive receptors, buffer zones and relevant protection measure maintenance of security hoarding including decorative displays and facilities for public viewing; details of complaint investigation procedures.

(c) Control of Nuisances: Identification of the significant construction and demolition noise & vibration sources; details of physical and operational management controls necessary to mitigate noise & vibration emissions; A dust management plan (in accordance with the IAQM guidance on demolition and construction) and measures to control light spill.

(d) Traffic Management: details of site deliveries; details for the loading and unloading of plant and materials; details of wheel wash facilities; details for the parking of vehicles of site operatives and visitors; The erection and maintenance of security hoarding; A scheme for recycling/disposing of waste resulting from demolition and construction works and a scoping route for all deliveries to and from the development.

(e)Hours of working on site, including specified hours for deliveries; details of restrictions to be applied during construction and demolition works (including timing, duration and frequency of works) to prevent noise or nuisance amenity issues to surrounding properties.

(f) Biodiversity Management: tree and hedgerow protection, invasive species management (to include Himalayan balsam and Japanese knotweed), species/habitats protection and mitigation measures.

(g) Water Framework Directive (WFD) Assessment: details of the proposal to be assessed against the Water Framework Directive's objectives.

(h) Soil management: topsoil stripping, storage and amelioration for re-use.

(i) CEMP masterplan: detailing the development, location of landscape and environmental resources, design proposals and objectives for integration and mitigation.

(j)Resource Management: fuel and chemical storage, waste management, water consumption and energy consumption.

(k) Pollution Prevention: demonstrate compliance with relevant Guidelines for Pollution Prevention, incident response plan and site drainage plan.

(l)Responsible Persons: details of the persons and bodies responsible for activities associated with the CEMP and emergency contact details

The CEMP shall be implemented as approved throughout the site preparation and construction phases of the development.
Reason:
In order to ensure necessary management measures are agreed and implemented to protect local amenity, especially for people living and/or working nearby, highway safety during construction, biodiversity, controlled waters, human health and to accord with Policies BE1, EN7, EN8 and TR2 of the Local Development Plan.
Details in respect of the above conditon were approved by planning permission ref. P2021/0073 on the 25/02/2021

5 Notwithstanding the submitted information, No construction works to the road shall commence until a scheme which shall include the following components to deal with the risks associated with contamination of the site is undertaken by competent persons in accordance with the following document:-Development of Land Affected by Contamination: A Guide for Developers (WLGA & EAW, 2012) and shall each be submitted to and approved, in writing, by the Local Planning Authority:

1. A preliminary risk assessment of the application site and the biodiversity mitigation area 2 shown on drawing C2014B / EW / 0602 which has identified:

a) all previous uses
b) potential contaminants associated with those uses
c) a conceptual model of the site indicating sources, pathways and receptors
d) potentially unacceptable risks arising from contamination at the site.

2. A site investigation scheme, based on (1) to provide information for a detailed assessment of the risk to all receptors that may be affected, including those off site.
3. The site investigation results and the detailed risk assessment (2) and, based on these, an options appraisal and remediation strategy giving full details of the remediation measures required and how they are to be undertaken.
4. A verification plan providing details of the data that will be collected in order to demonstrate that the works set out in (3) are complete and identifying any requirements for longer-term monitoring of pollutant linkages, maintenance and arrangements for contingency action.

Any changes to these components require the express consent of the Local Planning Authority. The scheme shall be implemented as approved.
Reasons
To ensure that information provided for the assessment of the risks from land contamination to the future users of the land, neighbouring land, controlled waters, property and ecological systems is sufficient to enable a proper assessment, and to ensure that risks from land contamination to the future users of the land and neighbouring land are minimised, together with those to controlled waters, property and ecological systems, and to ensure that the development can be carried out safely without unacceptable risks to workers, neighbours and other offsite receptors. Natural Resources Wales considers that the controlled waters at this site are of high environmental sensitivity due to proximity to surface water and being situated on a Secondary A aquifer. Contamination is known/strongly suspected at site due to historical contaminative uses, and to ensure compliance with Policies SP16 and EN8 of the Neath Port Talbot Local Development Plan.
Details in respect of the above conditon were amended by a non-material Amenment under planning permission ref. P2021/0072 on the 26/02/2021
Details in respect of the above conditon were approved by planning permission ref. P2021/0569 on the 20/07/2021

6 Notwithstanding the submitted information, prior to the first beneficial use of the road, a verification report demonstrating completion of the works set out in the approved remediation strategy and the effectiveness of the remediation is submitted to and approved, in writing, by the Local Planning Authority. The report shall include results of sampling and monitoring carried out in accordance with the approved verification plan to demonstrate that the site remediation criteria have been met. It shall also include any plan (a "long-term monitoring and maintenance plan") for longer-term monitoring of pollutant linkages, maintenance and arrangements for contingency action, as identified in the verification plan, and for the reporting of this to the Local Planning Authority.
Reasons
To ensure that risks from land contamination to the future users of the land and neighbouring land are minimised, together with those to controlled waters, property and ecological systems, and to ensure that the development can be carried out safely without unacceptable risks to workers, neighbours and other offsite receptors, and to demonstrate that the remediation criteria relating to controlled waters have been met, and (if necessary) to secure longer-term monitoring of groundwater quality. This will ensure that there are no longer remaining unacceptable risks to controlled waters following remediation of the site, and to ensure compliance with Policies SP16 and EN8 of the Neath Port Talbot Local Development Plan.
Details in respect of the above conditon were amended by a non-material Amenment under planning permission ref. P2021/0072 on the 26/02/2021

Details in respect of the above conditon were approved by planning permission ref. P2022/0823 on the 11/11/2022.

7 No development shall commence until details of a method statement and risk assessment for the protection of the structural condition of the water main assets crossing the site has been submitted to and approved in writing by the Local Planning Authority. The approved protection measures shall be implemented in full before any other development hereby permitted has commenced, and shall be

retained at all times for the duration of the approved operations including the restoration works.
Reason:
To ensure that the proposed development does not affect the integrity of the public water supply system in the interests of public health and safety, and to and ensure the development complies with Policy SP16 and BE1 of the Neath Port Talbot Local Development Plan
Details in respect of the above conditon were approved by planning permission ref. P2020/1006 on the 20/11/2020

8 Notwithstanding the submitted information, no development shall commence until a scheme is submitted to and approved in writing by the Local Planning Authority detailing the Tata pipe diversion having regard to Welsh Waters apparatus which is in the vicinity. The pipe shall be diverted in accordance with the agreed details
Reason
To ensure the Tata water pipe diversion does not have any unacceptable impact upon welsh waters apparatus and public health and safety and ensure the development complies with Policy SP16 and BE1 of the Neath Port Talbot Local Development Plan
Details in respect of the above conditon were approved by planning permission ref. P2020/1006 on the 20/11/2020

9 Notwithstanding the submitted information, no development shall commence until a scheme has been submitted to and approved in writing by the Location Planning Authority detailing landscaping and biodiversity mitigation measures on both the application site and the biodiversity mitigation areas identified on Dwg. C2014B/EW/0602 Rev A, along with a timescale for their implementation and completion. The mitigation shall be implemented in accordance with the agreed timescale and maintained as such thereafter.

Reason:
In the interest of biodiversity enhancement and mitigation and visual amenity, and to ensure the development complies with Policies SP15 and EN6 of the Neath Port Talbot Local Development Plan.
Details in respect of the above conditon were approved by planning permission ref. P2021/0124 on the 24/02/2021

10 Notwithstanding the submitted information, prior to the commencement of development, a landscape management plan, including management responsibilities and maintenance, for all landscaped and biodiversity mitigation areas (as identified on Dwg. C2014B/EW/0602 Rev A), to also include how the site will be managed post construction, shall have been submitted to and approved in writing by the Local Planning Authority. The landscape management plan shall be implemented and adhered to in accordance with the approved details thereafter.

Reason:
In the interest of visual amenity, and to ensure the long term management and maintenance of all landscaped areas that lie outside of the curtilage of individual properties, and to ensure the development complies with Policies SP15 and BE1 of the Neath Port Talbot Local Development Plan.

Details in respect of the above conditon were approved by planning permission ref. P2021/0124 on the 24/02/2021

Action Conditions

11 In the event that contamination is found at any time when carrying out the approved development that was not previously identified, work on site shall cease immediately and shall be reported in writing to the Local Planning Authority. A Desk Study, Site Investigation, Risk Assessment and where necessary a Remediation Strategy must be undertaken in accordance with the following document:- Development of Land Affected by Contamination: A Guide for Developers (WLGA & EAW, 2012). This document shall be submitted to and agreed in writing with the Local Planning Authority. Prior to occupation of the development, a verification report which demonstrates the effectiveness of the agreed remediation, shall be submitted to and agreed in writing with the Local Planning Authority.
Reasons
To ensure that risks from land contamination to the future users of the land and neighbouring land are minimised, together with those to controlled waters, property and ecological systems, and to ensure that the development can be carried out safely without unacceptable risks to workers, neighbours and other off site receptors. Given the complexity of the site it is considered possible that there may be unidentified areas of contamination at the site that could pose a risk to controlled waters if they are not remediated, and to ensure compliance with Policies SP16 and EN8 of the Neath Port Talbot Local Development Plan.

12 All works shall be subject to Road Safety Audits, stages 2, 3 and 4 in accordance with the Design Manual for Roads and Bridges. Each stage of the Road Safety Audit shall be submitted to and approved in writing by the Local Planning Authority. Stage 2 shall be submitted prior to the first beneficial use of the development; Stage 3 shall be submitted upon completion of the development, and stage 4 shall be submitted 1 year after the completion of the development. All issues highlighted at each stage shall be addressed to the written approval of the Local Planning Authority within 3 months of approval of that stage of the Road Safety Audit .
Reason
In the interest of highway and pedestrian safety and to ensure accordance with Policies TR1, TR2 and BE1

Details in respect of the above conditon in relation to the stage 3 safety Audit were approved by planning permission ref. P2022/0823 on the 11/11/2022.

Regulatory Conditions

13 No surface water and/or land drainage shall be allowed to connect directly or indirectly with the public sewerage network.
Reason:
To prevent hydraulic overloading of the public sewerage system and highway drainage network, to protect the health and safety of existing residents and ensure no pollution of or detriment to the environment, and to and ensure the development complies with Policy SP16 and BE1 of the Neath Port Talbot Local Development Plan.

Details in respect of the above conditon were amended by a non-material Amenment under planning permission ref. P2021/0072 on the 26/02/2021

14 No infiltration of surface water drainage into the ground is permitted other than with the express written consent of the Local Planning Authority, which may be given for those parts of the site where it has been demonstrated that there is no resultant unacceptable risk to controlled waters. The development shall be carried out in accordance with the approval details.
Reason
There is an increased potential for pollution from inappropriately located infiltration systems such as soakaways, unsealed porous pavement systems or infiltration basins and to and ensure the development complies with Policy SP16 and BE1 of the Neath Port Talbot Local Development Plan.

Informatives:

1 Please note that SAB approval will be required prior to any work commencing. It is a breach of approval required under Paragraph 7 (1) Schedule 3 of the Flood and Water Management Act 2010 whereby action will be taken by the Authority under The Sustainable Drainage (Enforcement) (Wales) Order 2018.

2 As of 7th January 2019, this proposed development may be subject to Schedule 3 of the Flood and Water Management Act 2010. In the event this proposed development amounts to a total impermeable area of 100sqm or more, approval of Sustainable Drainage Systems (SuDS) features will be required in accordance with the Statutory standards for sustainable drainage systems - designing, constructing, operating and maintaining surface water drainage systems. It would therefore be recommended that the developer engage in consultation with the Council's drainage team, as the determining SuDS Approval Body (SAB), in relation to proposals for SuDS features. Please note, Dwr Cymru Welsh Water is a statutory consultee to the SAB application process and will provide comments to any SuDS proposals by response to SAB consultation. The applicant may need to apply to Dwr Cymru / Welsh Water for any connection to the public sewer under S106 of the Water industry Act 1991. If the connection to the public sewer network is either via a lateral drain (i.e. a drain which extends beyond the connecting property boundary) or via a new sewer (i.e. serves more than one property), it is now a mandatory requirement to first enter into a Section 104 Adoption Agreement (Water Industry Act 1991). The design of the sewers and lateral drains must also conform to the Welsh Ministers Standards for Gravity Foul Sewers and Lateral Drains, and conform with the publication Sewers for Adoption- 7th Edition. Further information can be obtained via the Developer Services pages of www.dwrcymru.com.The applicant is also advised that some public sewers and lateral drains may not be recorded on our maps of public sewers because they were originally privately owned and were transferred into public ownership by nature of the Water Industry (Schemes for Adoption of Private Sewers) Regulations 2011. The presence of such assets may affect the proposal. In order to assist us in dealing with the proposal the applicant may contact Dwr Cymru Welsh Water to establish the location and status of the apparatus. Under the Water Industry Act 1991 Dwr Cymru Welsh Water has rights of access to its apparatus at all times.

The decision to recommend planning permission has been taken in accordance with Section 38 of The Planning and Compulsory Purchase Act 2004, which requires that, in

determining a planning application the determination must be in accordance with the Development Plan unless material considerations indicate otherwise. The Development Plan comprises the Neath Port Talbot Local Development Plan (2011-2026) adopted January 2016.

It is considered that the proposal development would help bring this designated strategic regeneration area to fulfilment with an aim to provide a mixed use development that will increase employment opportunities within Port Talbot and surrounding areas. The proposal therefore represents an appropriate form of development that would have no unacceptable impact on visual amenity and the character of the area as a whole. Highway and pedestrian safety, residential amenity, pollution, flooding and biodiversity. Accordingly, the proposed development is in accordance with Policies SP1, SP2, SP3 SP4, SP5, SP7, SP11, SP12, SP15, SP16, SP20, SP21, SRA2, SC1, I1, H1/17, EC1/4, EN6, EN8, TR1, BE1 and R1/3 of the Neath Port Talbot Local Development Plan.

It is further considered that the decision complies with the Council's well-being objectives and the sustainable development principle in accordance with the requirements of the Well-being of Future Generations (Wales) Act 2015.

Signed:
Ceri Morris – Head of Planning & Public Protection

Date: 5 October 2020

IMPORTANT:

(1) Please note that for all decisions issued after 16th March 2016 for outline or full planning permission, a revised decision notice will be issued whenever a subsequent consent is given, for example providing details of any Reserved Matters approvals (outline applications only) and/or approval of conditions (including on Reserved Matters). This will ensure that the current status of the conditions applied to a consent is clear. Accordingly you are advised to visit www.npt.gov.uk/planning to view the application documentation to see if this is the current version, or whether it has been superseded by a more up-to-date revision of this Decision Notice. For Reserved Matters approvals the revised Decision Notice will only be shown under the Outline approval.

(2) Please note that this consent is specific to the plans and particulars approved as part of the application. Any departure from the approved plans will constitute unauthorised development and may be liable to enforcement action. You (or any subsequent developer) should advise the Council of any actual or proposed variations from the approved plans immediately so that you can be advised how to best resolve the matter.

(3) In addition, any conditions that the Council has imposed on this consent will be listed above and should be read carefully. It is your (or any subsequent developers) responsibility to ensure that the terms of all conditions are met in full at the appropriate time (as outlined in the specific condition). Please note that any works carried out without compliance with the conditions attached to this approval will be entirely at the risk of the persons involved and may result in formal action being taken by the Local Planning Authority.

(4) The developer should have regard to Sections 4, 7, 8 and 8A of the Chronically Sick and Disabled Persons Act 1970 and to the British Standards Institution's Code of Practice for "Design of buildings and their approaches to meet the needs of disabled people" (BS 8300:2009+A1:2010).

(5) From 1st October 2012 it has been an offence to install a public sewer or lateral drain without having an adoption agreement in place. From the 1st October 2012 the vast majority of all existing private sewers and lateral drains which link with the public sewer network were transferred to Welsh Water. For further details on how this will affect your development please contact: Welsh Water Developer Services, PO Box 3146, Cardiff, CF30 0EH. Telephone No. 0800 9172652 or email: developer.services@dwrcymru.com.

IMPORTANT INFORMATION: TOWN AND COUNTRY PLANNING ACT 1990

The applicant's attention is drawn to the notes below.

(1) If the applicant is aggrieved by the decision of the Local Planning Authority to refuse permission for the proposed development or to grant it subject to conditions, then you can appeal to the Welsh Government under Section 78 of the Town and Country Planning Act 1990 (as amended).

(2) You can also appeal to the Welsh Government against a decision to refuse permission or grant subject to conditions in respect of applications made for :- Listed Building or Conservation Area Consent; Consent under a Tree Preservation Order; Advertisement Consent.

(3) You can also appeal If your application for a Certificate of Lawful Existing Use or Lawful Proposed Use is partly or wholly refused or is granted differently from what you asked for (under Section 195/196) of the Town and Country Planning Act 1990 (as amended).

(4) If you are aggrieved of the LPAs decision, the following deadlines apply for appeals to be submitted to the Welsh Government (from the date of the Council's decision):-

(1) Planning Permission (with the exception of Minor Commercial and Householder applications – see below)	Within 6 Months
(2) Householder Appeal see endnote i	Within 12 weeks
(3) Minor Commercial Appeal see endnote i	Within 12 weeks
(4) Listed Building or Conservation Area Consent appeals	Within 6 months
(5) Tree Preservation Order (TPO) Consent	Within 28 days
(6) Advertisement Consent	Within 8 weeks
(7) Certificate of Lawfulness of Existing (Section 191) or Proposed (Section 192) Use or Development	Within 6 months
(8) Hazardous Substances Consent	Within 6 months

(5) Appeals must be made on a form which is obtainable from the Planning Inspectorate, Crown Buildings, Cathays Park, Cardiff, CF10 3NQ – Tel 0303 444 5940, or online at www.planningportal.gov.uk/pcs .

(6) The Welsh Government has power to allow a longer period for the giving of notice of appeal but they will not normally be prepared to exercise this power unless there are special circumstances which excuse the delay in giving notice of appeal.

(7) The Welsh Government is not required to entertain an appeal if it appears to them that permission for the proposed development could not have been granted having regard to the statutory requirements to the provisions of the development order, and to any directions given under the Order. They do not in practice refuse to entertain appeals solely because the decision of the Local Planning Authority was based on a direction given by them.

(8) If permission to develop land is refused or granted subject to conditions, whether by the Local Planning Authority or by the Welsh Government, and the owner of the land claims that the land has become incapable of reasonable beneficial use in its existing state and cannot be rendered capable of reasonable beneficial use by the carrying out of any development which has been or would be permitted, he may serve on the County Borough Council, in which the land is situated, as the case may be, a **purchase notice** requiring that Council purchase his interest in the land in

accordance with the provisions of Part VI of the Town and Country Planning Act 1990.

Making an Appeal

(9) Please note that for all applications received by the LPA after 5th May 2017, it is now a requirement that any appeal made to the Planning Inspectorate (other than Householder and Minor Commercial Appeals, and appeals against refusal to grant advertisement consent) must be accompanied by all the information and evidence you intend to rely upon (**a "full statement of case"**). You must also send a copy of the notice of appeal and full statement of case to the LPA.

(10) In addition, for 'planning appeals' an amendment to an application following notice of appeal may only be made to correct an error.

(11) Additional details and information on making an appeal to the Welsh Government is available from the Planning Inspectorate at the above address and website. The relevant documents are entitled "making your planning appeal" and "planning appeals Public Local Inquiries".

(12) Further correspondence regarding this application should bear the reference number quoted on the top of the decision notice.

THIS NOTICE RELATES ONLY TO A PLANNING DECISION AND DOES NOT RELATE TO OTHER LEGISLATION INCLUDING ANY LEGISLATION UNDER:

- BUILDING REGULATIONS – Please contact buildingcontrol@npt.gov.uk or 01639 686949 to discuss all aspects of the service that is offered by Building Control
- HIGHWAY LEGISLATION

IF PLANNING CONSENT HAS BEEN GRANTED IT IS ADVISABLE TO ESTABLISH WHETHER ANY OTHER FORM OF CONSENT IS REQUIRED AND TO OBTAIN SUCH CONSENT BEFORE COMMENCING DEVELOPMENT

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[i] Please see the Town and Country Planning (Referred Applications and Appeals Procedure) (Wales) Regulations 2017 for appeal procedures and for full definitions of:

- *"householder application"* (essentially an application for the enlargement, improvement or other alteration of a dwellinghouse, or development within the curtilage of such a dwellinghouse, or change of use to enlarge the curtilage of a dwelling house)
- *"householder appeal"* means an appeal in relation to a householder application, but excludes an appeal against conditions on the grant of planning permission; or an appeal which is accompanied by an enforcement or listed building consent appeal.
- *"minor commercial application"* (essentially relates to existing buildings of no more than 250 square metres gross external floor space at ground floor level, currently in use for any of the purposes set out in Schedule 1A to The Town and Country Planning (Development Management Procedure) (Wales) (Amendment) Order 2015 which is an application for change of use from Class A1 to A2 or A3; or Class A2 to A3); or the carrying out of building or other operations to a shop front.
- *"minor commercial appeal"* means an appeal in relation to a minor commercial application but excludes an appeal against conditions on the grant of planning permission; or an appeal which is accompanied by an enforcement or listed building consent appeal.

NEATH PORT TALBOT COUNTY BOROUGH COUNCIL
CYNGOR BWRDEISTREF SIROL CASTELL-NEDD PORT TALBOT

TOWN AND COUNTRY PLANNING ACT 1990
THE TOWN AND COUNTRY PLANNING (ENVIRONMENTAL IMPACT ASSESSMENT) (ENGLAND AND WALES) REGULATIONS 1999

SCREENING OPINION – ENVIRONMENTAL STATEMENT NOT REQUIRED

Name and address of the applicant

Liam Griffiths
Asbri Planning
Unit 9 Oak Tree Court
Mulberry Drive
Cardiff Gate Business Park
Cardiff
CF23 8RS

DATE REGISTERED:	4 March 2024
APPLICATION NO:	P2024/0155
LOCATION:	Land At Harbour Side, Regeneration Area, Port Talbot
PROPOSAL:	Request for Screening Opinion under Regulation 6 of the Town and Country Planning (Environment Impact Assessment) (Wales) Regulations 2017 for the Construction of a new building comprising offices, research and development and light industry (B1 use) alongside reconfiguration of the highway, parking, access, landscaping, drainage, plant, substation, sprinkler store, gas store and associated works.

THE NEATH PORT TALBOT COUNTY BOROUGH COUNCIL AS THE LOCAL PLANNING AUTHORITY IN PURSUANCE OF ITS POWER UNDER THE ABOVE MENTIONED ACT AND REGULATION HEREBY ADOPTS THE FOLLOWING SCREENING OPINION THAT THE DEVELOPMENT IS NOT AN E.I.A. DEVELOPMENT AND THAT THE APPLICATION NEED NOT BE ACCOMPANIED BY AN ENVIRONMENTAL STATEMENT. THE REASONS FOR THIS OPINION ARE SET OUT IN THE ATTACHED REPORT.

REASONS:-

Signed:
Ceri Morris – Head of Planning & Public Protection

Reference No: P2024/0155

Date: 20 March 2024

Appendix C Discovery Strategy

Discovery Strategy

How to identify potential contamination

The following list are examples of common contamination, it is not exhaustive and if in doubt ask the Site Manager:

- Looks oily and has an oily odour
- Solvent odour
- Man-made materials e.g. paint cans, car parts, glass fragments and slag
- Evidence of asbestos containing materials
- Unusual colour e.g. blue, red or green

Procedure

If unexpected contamination is found, the following procedures should be adhered to:

1. All site works at the location of suspected contamination should stop.
2. Site personnel to inform the Site Manager,
- Visual and olfactory observations of the ground conditions and extent of contamination should be made and notification given to the Consultant.
    a. The Consultant will inform the Local Authority within 24 hours of the discovery.
    b. Should contamination be likely to impact controlled waters, Natural Resources Wales.
3. In the presence of a suitably qualified geo-environmental engineer, investigation works shall commence to recover samples for testing and delineation of the area where contaminated material is present.
4. If deemed appropriate by the Consultant, the impacted material may be excavated and placed in a stockpile on a suitably impermeable surface.
    a. The stockpile should be suitably quarantined with no addition to, or removal of the stockpile while chemical analysis is conducted.
    b. Alternatively, the material can remain in-situ until laboratory test results have been obtained.
5. A photographic record should be made of relevant observations, including the extent of the excavation of contaminated soils.
6. The samples should be tested based on visual and olfactory observations.
7. Test results should be screened against the assessment criteria included within Appendix D.
8. If after testing the ground is found to be contaminated, the relevant regulators shall be informed. After consultation materials should either be removed for disposal to a licensed waste management facility or remediated to agreed clean-up criteria.
9. If the evidence for contamination is severe and may lead to pollution of water courses, Natural Resources Wales shall be informed immediately.

Appendix D Soil Import and Re-use Criteria

Import Criteria

Contaminant	Proposed Criteria (mg/kg)	Comment
Asbestos	<LOD and no visible ACM	Below laboratory limit of detection.
Arsenic	16	Natural Background Concentration1.
Beryllium	2.5	Maximum site concentration and below maximum acceptable limit of GAC2
Boron	5	Maximum acceptable concentration in line with phytotoxic GAC pH >7
Cadmium	0.4	Natural Background Concentration1 and site average
Chromium (III)	50	Natural Background Concentration1.
Chromium (VI)	2 (<LOD)	Below laboratory limit of detection.
Copper	30	Natural Background Concentration1.
Lead	62	Natural Background Concentration1.
Mercury, inorganic	1 (<LOD)	Below laboratory limit of detection.
Nickel	20	Natural Background Concentration1 and site average concentrations
Selenium	8	Natural Background Concentration1 and site average
Vanadium	60	Natural background concentrations1.
Zinc	100	Natural Background Concentration1.
Cyanide (free)	1 (<LOD)	Below laboratory limit of detection.
Phenol (total)	1 (<LOD)	Below laboratory limit of detection.
Total TPH	100	-
Total PAH	6	Natural Background Concentration1.

Notes to table:

1. *Natural background concentrations sourced from https://www.ukso.org/ and the UK Soil and Herbage Pollutant Survey report June 2007.*
2. *Generic Assessment Criteria for Residential without home-grown produce end-use scenario*

In addition to the chemical criterion set-out above, the topsoil/subsoil shall:

- Contain no visible asbestos containing materials;
- Be free from anthropogenic materials;
- Be free from visual and / or olfactory evidence of contamination, e.g. free-phase fuels/oils;
- Contain no visible organic or putrescible material which could constitute a potential source of ground gas; and,
- Meet any additional requirements set by the landscape architect.

Import Criteria Justification

The import criteria above have been established based on the understanding that imported material may be required as part of the proposed soft-landscaped areas where Made Ground is present.

The most appropriate value, based on the following hierarchy has been taken:

- Generic Assessment Criteria protective of the relevant (commercial) end use, based on 1% SOM as this is the most conservative approach;
- Regional and / or local background concentrations (where available); and,
- Range of concentrations recorded in soil samples tested from the site.

The use of the above values will ensure that soils imported will not significantly increase contamination loading to the site.

The import criteria are qualitatively derived to strike a balance between waste legislation, sustainability for the re-use of non-natural materials and the protection of human health, and are subject to regulatory approval.

Re-use Criteria - beneath Clean Cover System

Contaminant	Proposed Criteria (mg/kg)	Comment
Asbestos	<LOD and no visible ACM	Below laboratory limit of detection.
Arsenic	16	Natural Background Concentration[1] and site average
Beryllium	3	Maximum site concentration and below maximum acceptable limit of GAC[2]
Boron	3	Maximum site concentration
Cadmium	1.5	Maximum site concentration
Chromium (III)	50	Natural Background Concentration[1].
Chromium (VI)	2 (<LOD)	Below laboratory limit of detection.
Copper	50	Natural Background Concentration[1].
Lead	200	Natural Background Concentration[1].
Mercury, inorganic	1 (<LOD)	Below laboratory limit of detection.
Nickel	20	Natural Background Concentration[1] and site average
Selenium	8	Natural Background Concentration[1] and site average
Vanadium	60	Natural background concentrations[1].
Zinc	75	Natural Background Concentration[1].
Cyanide (free)	1 (<LOD)	Below laboratory limit of detection.
Phenol (total)	1 (<LOD)	Below laboratory limit of detection.
Total TPH	1000	Hydrock derived value[3]
Total PAH	50	Natural Background Concentration[1] and site average

Notes to table:

1. *Natural background concentrations sourced from https://www.ukso.org/ and the UK Soil and Herbage Pollutant Survey report June 2007.*
2. *Generic Assessment Criteria for Residential without home-grown produce end-use scenario*
3. *Site data indicates that although the theoretical saturation limits for TPH fractions are lower, these are not reflective of actual data where free phase is actually present. Therefore soils with total TPH concentration up to 1000mg/kg are considered to be suitable to be placed beneath a clean cover system without casing a constraint to the construction of foundations, the installation of underground services, or pose an odour risk.*

In addition to the chemical criterion set-out above, the re-used material shall:

- Be free from visual and / or olfactory evidence of contamination, e.g. free-phase fuels/oils;
- Contain no visible organic or putrescible material which could constitute a potential source of ground gas; and,
- Meet any additional requirements set by the earthworks specification.

Re-use Criteria Justification

The reuse criteria above have been established based on the understanding that some made ground soils may be used in areas of soft landscaping where site levels are to be increased, on the provision that these are to remain beneath the 600mm thick clean cover layer.

The most appropriate value, based on the following hierarchy has been taken:

- Generic Assessment Criteria protective of the relevant (commercial) end use, based on 6% SOM as this is reflective of current site conditions;
- Regional and / or local background concentrations (where available); and,
- Range of concentrations recorded in soil samples tested from the site.

The use of the above values will ensure that soils reused will not pose a significant risk to the identified receptors.

The re-use criteria are qualitatively derived to strike a balance between waste legislation, sustainability for the re-use of non-natural materials and the protection of human health, and are subject to regulatory approval.