



Natural Resources Wales

Rhymney Great Wharf Polders Installation

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Construction Environmental Management Plan (CEMP)

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1	First Issue – Draft circulated for comment

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This Construction Environmental Management Plan will be added to, reviewed and updated as the project develops, further information is received, details of the confirmed programme are developed, unforeseen circumstances or variations to planned circumstances arise or where the operations management team deem it is necessary.

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1 Introduction

1.1 Intent and purpose

This Construction and Environmental Plan (CEMP) has been produced to set out our environmental policies and outline how the construction works will be planned, managed and carried out to avoid, minimise or mitigate effects on the environment and surrounding area. It highlights the key activity specific risks, details control measures, and refers to all associated forms and registers where required. All items specifically required by the Client in the CEMP are covered.

In summary, the purpose of the plan is to:

- Identify and highlight stakeholder requirements.
- Ensure that the construction works comply with current environmental legislation.
- Outline the Environmental Management System requirements (in accordance with ISO 14001).
- Detail the mitigation committed to within the Environmental Statement and how it will be implemented on site.
- Ensure that any adverse effects are minimised during construction.
- Describe any site-specific method statements required.

1.2 Issue and revision

An electronic version of this plan, together with the Construction Phase Plan (CPP) will be issued and controlled by the Project Manager. This plan will be reviewed by the Project Manager at least every 3 months, or where the project is less than 3 months in duration, at least once during the project.

Reviews shall also be undertaken when there has been a change in work scope; change in key personnel; new hazards have been identified; as a result of findings of inspections or audits requiring changes to risk control measures; or following the investigation of any health and safety events requiring changes to the risk control measures.

1.3 Responsibilities

The Project Manager approves and supports this CEMP as the principal document demonstrating a planned and systematic approach to implementing environmental policy through an effective environmental management system.

The Site Manager is responsible for authorising and maintaining this document and ensuring it is implemented. The Project Manager is responsible for ensuring it complies with legal and contractual amendments and ensures that all project personnel are aware of the contents of this CEMP and understand their role in fulfilling the project's obligations. The Project Manager is responsible for ensuring that the Client is informed of any amendments.

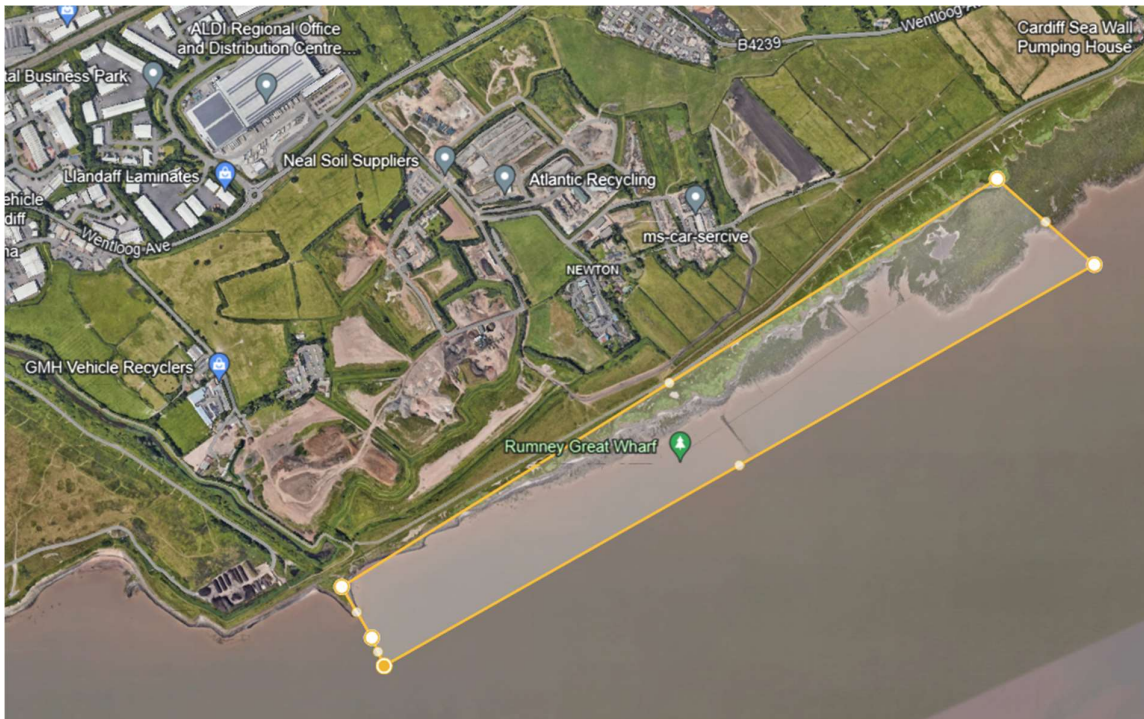
The Compliance Manager is responsible for ensuring it complies with all relevant environmental legal requirements and offering advice in best practice.

The Project Team will comply with the requirements of this plan.

2 Project Information

2.1 Project description and scope of work

NRW have engaged EDS to install approximately 2km of fencing in the mudflats directly east of the Rhymney River. The site is seawards of the Neal Soils Yard



Photographs 1 to 2 showing main areas of work.

Photograph 1 – Approximate working area; Photograph 2 – Drone photograph looking west of the working area. Drone positioned approximately central in relation to working area.

The works involve the following key activities:

- A site walkover will take place prior to mobilisation, with a pre-condition report compiled to demonstrate the condition pre-works. Establishment of site compound, plant compound and material delivery areas. Appropriate fencing, security and welfare provisions to be made by EDS.
- The delivery of the plant will be made during the first 2 weeks on site. The delivery of the materials will take place during wk2 and continue weekly throughout the project. There will be unloading and sorting of materials in the material delivery and plant compound areas.
- An engineer will then set out the layout of the polders fencing using stakes
- Installation of access from compounds to working area. This may include the placement of stone or track matting to protect the ground and smooth level track. The batters of the sea wall and the rock revetment will be shallowed using rock bags, stone, and track mats to allow plant to safely access the working area on the mud flats.
- Polder fencing will then be installed in 2 rows, following the design detail and layout. This will follow the design of hardwood stakes, driven into the mudflats using an excavator post knocking attachment. Following this, a separate gang will install brushwood bundles (faggots) in between the two rows, polypropylene rope will then be used to fix the brushwood down.
- Once the client has signed off the works, the plant will be used to clear all temporary access ramps and tracks. All areas used for access or storage will be made good and photographs taken. Cabins will be off-hired and all plant off-hired.

The Client will assume responsibility for the following items including those that are required under the Health and Safety at Work Act 1974 and the CDM Regulations 2015:

- Environmental and ecology surveys and watching briefs.

2.2 Project location

The project is located at Rumney Great Wharf, Cardiff. The 6-figure grid reference is OS GR ST 23899 77875 (51.494677 , -3.097605; [///zest.pint.margin](#)). Access to the site is from by taking the turning from Wentloog Avenue into Newton Road (see below figure). Construction work is currently programmed for commencement 15 July 2024, with a duration of 10 weeks.

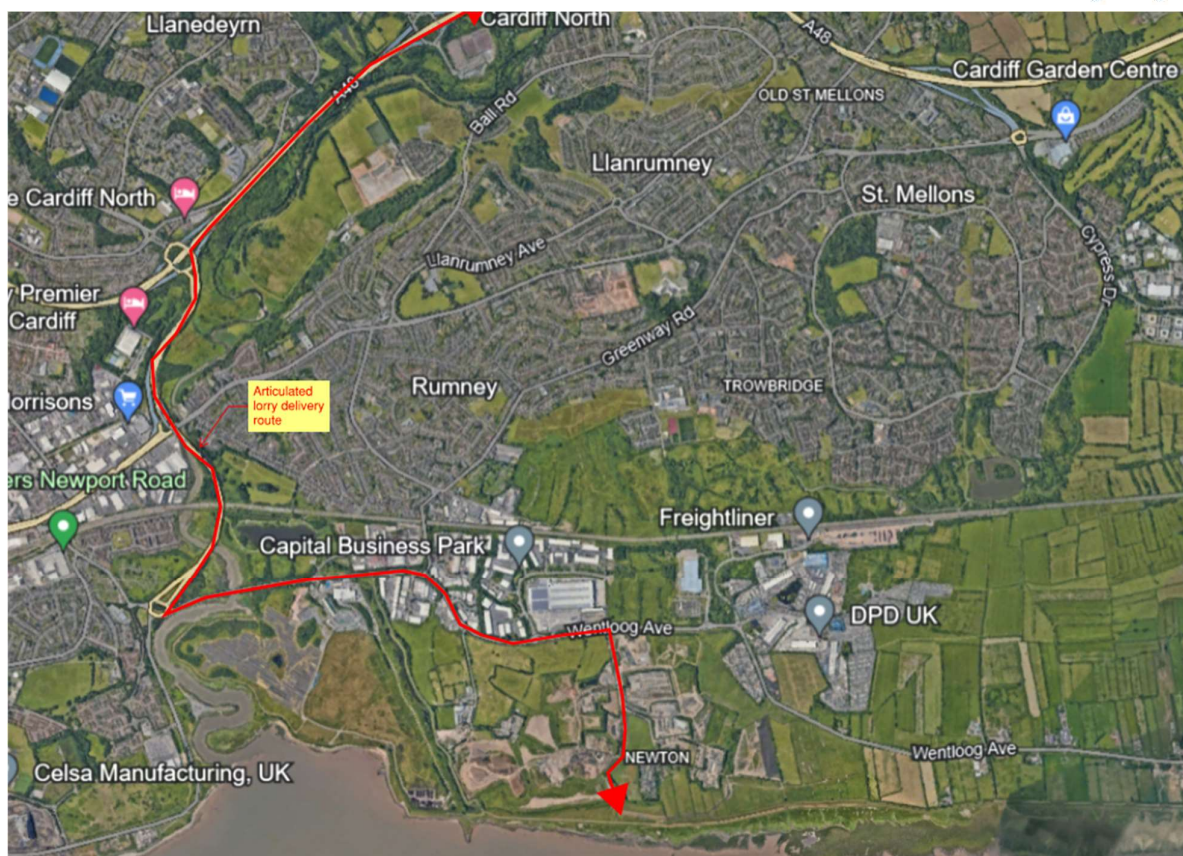


Figure 1 & 2: Upper: HGV access route to site; Lower: Site location plan (agreed with Neal Soils)

2.3 Project Programme

Construction start date:	15/07/2024
Construction programme:	Approximately 10 weeks (weather dependent)
Planned Completion date:	Provisionally 16/09/2024
Contract Completion date:	Provisionally 14/10/2024

Completion of the works will be dependent on suitable weather conditions for the placement and compaction of materials).

The working hours are:

- Monday – Friday: 06:00am – 20:00pm
- Saturday: 06:00am – 13:00pm

No working outside of these hours is envisaged. Weekends may be implemented if the weekday weather is bad, but this will be agreed with the Client in advance.

3 Management Framework

3.1 Employer's environmental policy

The project will comply with the EDS Environment and Sustainability Policy and the Clients Environmental Policy (as applicable). The project shall ensure that the policies and their requirements are made known to all personnel involved in the project. This will be carried out through site inductions, method statements and risk assessment briefings and toolbox talks.

Any sub-contractors engaged by EDS will be provided with a copy of the policies and briefed on the requirements.

3.2 Environmental risk assessment

Activity specific method statements and risk assessments will be developed to cover each element of the works being carried out. The environmental aspects and impacts associated with each element of the works will be assessed. A risk scoring system will be implemented to identify likely severity of the impacts with respect to the following receptors (as a minimum) and how these impacts can be reduced through the implementation of mitigation measures and controls.

- Air
- Dust, Noise & Odours
- Nuisance
- Waste
- Archaeology & Built Environment
- Flood Risk & Drainage
- Ecology
- Landscape and Visual

3.3 Legislation, regulation and other requirements

The project will comply with all relevant legislation, regulations and Client standards. This will include for any planning requirements and conditions and all necessary consents and permissions to ensure legal construction works.

The permanent works in the mudflats are within the Severn Estuary SSSI. The temporary ramp over the rock revetment also falls within the Severn Estuary SSSI. Assents for the works in the Severn Estuary SSSI are not needed as the Marine Licence supersedes this requirement. The Marine Licence has been acquired by the Client. Temporary tracks and ramps will be required landwards of the rock revetment. These works will fall within the Gwent Levels - Rumney and Peterstone SSSI. NRW will gain Assent for the temporary installation of these access tracks and ramps, routes will also be agreed with landowners. As part of the induction to the work site, the team will be briefed on the conditions of SSSI.

The Site Manager is responsible for ensuring that the project complies with all relevant environmental legislation, regulations and other requirements, including any regulations from Local Authorities, Highways Agencies or other Statutory Bodies, as applicable.

All work carried out will be conducted in accordance with Client stands and construction industry best practice.

3.4 Environmental objectives and targets

EDS has established a framework of environmental objectives and targets as we are committed to reducing our environmental impact through continual improvement of our operations, and to the promotion of sustainable practices within our industry.

Key Performance Indicators (KPIs) form the basis of achieving these environmental and sustainability targets and will be monitored at a project level. The outputs will be provided by the Site Manager to the IMS and Technical Co-ordinator responsible for monitoring compliance with and achievement of our objectives. This will enable the project performance and compliance to be reviewed at monthly team meetings and to discuss and identify any further measures to be implemented for continuous improvement.

3.5 Training, awareness and competence

EDS is committed to investing in our personnel to raise awareness, encourage participate and provide training in environmental matters, as shown in the table below.

Training and awareness topic	Participants
Environmental and sustainability element of company induction	All personnel, at induction
Managing water pollution on construction sites	Site Manager (SMSTS), Site Supervisors (SSSTS), Skilled and General Operatives
Environmental element of the CITB Site Management Training Safety Scheme (SMSTS)	Site Manager (SMSTS)
Environmental element of the CITB Site Supervisor Training Safety Scheme (SMSTS)	Site Supervisor (SSSTS)
Compliance updates – Environmental elements.	All personnel
TBT HS 32 Environmental awareness general	All personnel
TBT HS 12 Pollution prevention and emergency spill response	All personnel
TBT HS 29 Housekeeping – Pests and vermin	All personnel
Check Clean Dry	All personnel
CIRIA's 'Environmental Good Practice on Site' training	Site Manager (SMSTS)
Site Induction – to cover issues in the Environmental Action Plan	All personnel
Biosecurity and Plant Health Induction – covering NRW's biosecurity policy	All personnel
Spill Kit Training	All operatives

All training is recorded and monitored by the HR department to enable progress against training targets to be measured. Briefings such as toolbox talks are conducted internally and delivery by the IMS and Technical Co-ordinator and Site Manager / Supervisor with evidence of attendance in the form of signed certification sheets.

3.6 Internal communication

Communication of environmental issues within the project will be maintained through monthly project meetings, chaired by the Project Manager.

The environmental section of the agenda for the monthly team meetings will primarily address the future month's activities and will review events and actions arising from the previous month's activities. Other items covered will include:

- Progress and compliance with consents and licences
- Progress with method statements and risk assessments for each element of the construction works.
- Public consultation
- Reporting of environmental and sustainability monitoring results.
- Actions arising from site inspections, incidents and complaints and site audits.

Newsletters, bulletins, posters etc. will be produced and displayed throughout site offices on a regular basis to raise awareness of current issues within the project team.

Benefits can be gained from close co-operation with the client, and other contractors in achieving best practice. The Project Manager and the project team will ensure that meetings and discussions are carried out in a spirit of openness and co-operation to determine lesson learnt from any incident to take action to mitigate similar risks.

3.7 External communication

The Project Manager and Project Team will work collaboratively with the Client to ensure that residents, landowners, schools and general members of the public will be suitably informed of the works and the project will mitigate and control environmental impacts. This will include for the following activities as deemed necessary:

- Consultation with the relevant statutory bodies (e.g. Local Authority, Natural Resources Wales) in conjunction with the Client.
- Advance notification to those most affected by particular environmental effects will be discussed with the Client whose responsibility it is for letter drops to the local community.
- Provision of appropriate signage and scheme information board.

Where disturbance to local residents or business is likely, the project team, in conjunction with the Client will inform occupiers in advance of the work, with the strategy for external communication led by the Client.

The project team will, in partnership with the Client, consult with third parties e.g. Statutory Utilities orders where it is considered the works will cause any impact or where access or storage may be required, or to gain permission to carry out surveys.

3.8 Records

This document is the overarching document for environmental management of the project. This CEMP defines policies and arrangements for the main environmental issues. Other supporting documents will be developed to include:

- Construction Phase Plan
- Risk Assessment Method Statement covering all site activities (RAMS)
- Environmental procedures and bulletins.

3.9 Management review

The Project Manager will undertake a review of the project and include information pertinent to environmental performance and include for input into the annual management review.

3.10 Incident Reporting

All environmental incidents and significant near misses must be reported in accordance with NRW's Environmental Incident Reporting Procedure. The following steps will be taken in the event of an emergency:

1. STOP - Before you report the incident, stop the work.
2. CONTAIN - Where safe to do so, carry out any local site pollution prevention or emergency incident measures to prevent any further damage to the environment and to contain the release and remove any ignition sources (if flammable).
3. NOTIFY - Immediately after the work has been stopped, a risk assessment has been completed and the pollution contained if safe to do so, report the incident, giving full details (including location / contact details) to:
 - **The NRW 24-hour incident hotline 03000 65 3000;**
 - your line manager
 - any facilities team local contacts
 - a member of the EMS team

EMS Team: EMS.Team@cyfoethnaturiolcymru.gov.uk

Initial and final reports will be submitted as for a health and safety incident.

All environmental incidents must be reported at the earliest opportunity to the ECSC Project Manager, Site Supervisor, NRW Project Manager and NRW Environmental Advisor. In addition, near misses must be reported via the hotline where there was/is the potential for a significant impact and where lessons can be learned.

Initial reports for such incidents and near misses must be followed by a written report using the contractor's in-house forms. This must include the following information:

- project/location
- date
- contractor
- details of what happened
- cause of incident
- lessons learned

This final and comprehensive investigation report is to be provided by the Contractor to the ECSC Project Manager and NRW Project Manager within 14 days.

The Site or Project Manager will complete an EDS F030 Incident / Near Miss Form and an internal investigation will then take place.

4 Emissions, monitoring and measurement

The emissions arising from the project will likely form a significant proportion of the potential for environmental impact during the works. The below table describes the type and level of these emissions from the work site. Monitoring regimes and control measures are also detailed.

Emissions	Potential Receptor	Monitoring & Control Measures	Level of Emissions
Oil / fuel	Ground & surface water	Fuels to be stored within the site compound, in bunded containers, away from the water's edge. Bio oil used in machines working in the intertidal zone.	Low
Other chemicals	Ground & surface water	Control of Substances Hazardous to Health (COSHH) assessment to be undertaken for all chemicals and control measures applied. Specific monitoring regimes to be implemented as required.	Low
Silt run off	Ground & surface water	Measures to be deployed to prevent run-off onto the site access tracks and surface water. Provision of silt fences. Daily site monitoring of conditions. Stockpiled materials to be positioned away from watercourse	Medium
Dust	Air, land & water	Site traffic access the site via a compacted stone / hardcore track. Daily site monitoring of conditions. Dust suppression methods to be deployed if required.	Medium
Non-native species	Air, land & water	All plant, machinery and equipment must be cleaned when accessing and leaving the site to prevent the spread of signal crayfish and crayfish plague. Operatives to follow the Check, Clean, Dry principles.	High
Mud on plant and vehicle wheels	Access Track & Local Roads	Deliveries to be restricted to compound area reducing mud deposition. Track mats used in areas where vehicles cross grass / earth verges. Monitoring activities. Plant to be washed down after operations cease for the day to remove mud from tracks Daily site monitoring of main roads adjacent to site access.	Medium
Plant machinery & vehicles	Air	Idling of plant and vehicles to be restricted. Maintenance regime in place, with daily pre-use checks.	Low

4.1 Vermin and pest control

Welfare facilities, including canteen / mess room, toilet and washroom will be provided within the site compound in the form of mobile welfare units. The facilities will be kept in a good working order and cleaned daily.

Food and drink will be consumed within the welfare facility. Waste will be disposed of in a lidded receptacle. Consuming food outside of this area could encourage vermin, which increases the potential of occupational hazards, such as leptospirosis.

The Project Team will monitor vermin levels throughout the works. If required, vermin/rodent controls will be deployed.

4.2 Prevention, containment & spillages

Liquid storage & Refuelling

Preventative measures will be deployed to prevent polluting materials entering the environment. This will include measures to prevent silt escaping from stockpiled materials and other measures to reduce run-off into the wider environment, including the Severn Estuary.

All oils and fuels will be stored in compliance with The Water Resources (Control of Pollution) (Oil Storage) (Wales) Regulation 2016. The below controls will be deployed;

- Fuel shall be stored in dedicated bunded, impervious storage areas, away from drains, sea and watercourses. Any fuel/ plant storage or refuelling shall be undertaken in accordance with relevant Guidance for Pollution Prevention (PPG's 1, 6 & 7; GPP's: 2, 5, 7, 8, 13, 19, 21 & 22).
- Drums over 200 litres shall be stored on drip trays capable of holding 25% of the drum's maximum capacity.
- Fuel tanks shall be stored within a bund capable of holding 110% of their capacity. All pipes and gauges shall be within the wall of the bund.
- Bowsers shall be double skinned and shall be stored in a bund capable of holding 110% of the volume of the bower.
- Small mobile plant shall be placed on drip trays.
- Spill kits will be available at the site welfare facility.
- COSHH Assessments available within the site management file.
- No storage of materials or refuelling will be permitted outside of the designated site compound/

Solids

Spillages of dry and dusty materials will be avoided by good housekeeping methods including appropriate management of soils in accordance with the Soils Management Plans. Skips will be covered where there is a risk of material becoming airborne. Vehicle wheels will be cleaned onsite if required, access roads will be cleaned as required. Timber bog mats and track mats will be used to protect ground and service crossings, which will reduce the risk of tracking of mud and debris onto surrounding routes.

Dealing with spills

Firstly, all steps should be taken to ensure spills do not occur. All hired plant and machinery will be sourced from reputable providers. Any subcontractors performing works on site will have passed an in-house PQQ to ensure compliance. Operators (either EDS or subcontracted) will perform daily checks of plant which will cover checks of hydraulic and oil systems, to ensure faults are picked up and preventative maintenance can take place.

Should there be a spill, spill kits will be located in the welfare unit or on each piece of plant.. In the event of a spill the following plan should be followed:

- Stop work to contain the spill
- All possible ignitions will be extinguished if the spilt material is flammable
- Ensure nearby surface water drains are sealed, to avoid surface water contamination
- Use the contents of the spill kit to contain and mop up the spill
- The source will be identified and sealed as practical
- The Site Manager will be informed of the spill
- If the spill enters the watercourse the Compliance Director must be contacted immediately who will notify Natural Resources Wales

The granular material, pads, socks and any containment items will be treated as hazardous waste and disposed of accordingly.

The Project Manager will complete an EDS F030 Incident / Near Miss Form. If the event is significant a full investigation will be carried by the Compliance Department to establish a root cause and share lessons learned with the team and wider business.

Fire Control

Fire Extinguishers are carried in EDS vehicles and in the welfare units. A fire will be tackled only if it is safe to do so. The fire and emergency procedures shall be reviewed at regular intervals throughout the project's duration or following any incident and communicated during site induction. Regular workplace fire inspections shall be carried out by the Site Manager.

In the event that a fire occurs, the alarm will be raised and communicated to the team who will leave the area immediately in an orderly manner via the nearest safe egress location and convene at the designated fire assembly point. The alarm signal will be verbal signals or using hand-held radios (where suitable). The call 'Fire-Fire-Fire' will be sounded, and the working party will respond with an acknowledgement by returning the same call. The Site Manager will be responsible for ensuring that the emergency services are called, and rescue procedures (if required) invoked. All measures, where safe to do so, will be taken to prevent the spread of the fire and to protect the workforce and public until the emergency services arrive and take control of the situation.

Waste Management and Storage of Materials

All waste will be handled and disposed of in line with current Duty of Care Regulations. A waste management area will be created, and it will be the responsibility of site personnel to correctly dispose of waste in the correct receptacles. Opportunities to minimise waste through the planning phase will be considered and actions taken where identified. The project aims to minimise the amount of waste generated, seeking opportunities to reuse and recycle.

The Environmental Risk Assessment will highlight the potential environmental impacts and how they will be effectively mitigated. Complaints will be retained in the site file and be shared with the Compliance Department.

Traffic

Traffic movements will be limited to the agreed site working hours and in accordance with the Traffic Management Plan (TMP). Traffic and vehicles arriving and leaving site will be managed to minimise impacts on the local community. Works should avoid tracking / spillage of mud; soil etc by construction vehicles onto public roads. Where this does occur, measures are to be taken to clear up excessive spillage/tracking. Further to this all plant, machinery and equipment will be cleaned when accessing and leaving the site to prevent the spread of non-native species e.g., signal crayfish and crayfish plague.

4.3 Dust & odours

Dust as a fugitive emission is a potential. Appropriate controls will be deployed, and it is not anticipated that the works will impact the nearby receptors of commercial premises.

The Construction Phase Plan and method statements and risk assessments will detail appropriate dust control procedures for the site, so that it does not pose a nuisance.

To prevent unacceptable levels of dust generations controls on site, measures could include dampening down of dusty surfaces, controlling the speeds of mobile plant traffic and vehicles, covering dusty material deliveries, dampening of road surfaces.

Should site activities give rise to unacceptable levels of dust at the nearest sensitive receptor, the activity giving rise to the emission will be modified, suppression controls deployed or activities suspended until conditions have been resolved.

There is no anticipated release of odours that would affect any nearby receptors.

4.4 Noise & vibration

Some noise and low-level vibration related to the use of standard construction machinery can be expected and is unavoidable in carrying out the works. Any such noise will be kept to within the standard site working hours and will be localised to the working area which is well away from the receptors.

Well maintained and good quality construction equipment will be utilised, with low-vibration options chosen where available. Plant will not be left idling when not in use.

Installation of the polder fencing is away from settlements and as such should not create disturbance to local residence. The land side operations (unloading of materials deliveries) shall take place inside the Neal Soil's yard. This site has much larger plant operating throughout the whole site, as such, EDS' machinery is unlikely to cause excess noise pollution. Deliveries will also only take place during work hours. Suitably modern equipment will be used for plant and site compound. Generators will not be run overnight and will be low noise output specification.

4.5 Air pollution

Air pollution arising from odour, fumes and smoke, may arise from the following activities:

1. Use of heavy plant, machinery and vehicles
2. Road vehicles, particularly HGVs

Pollution to air will be managed to reduce impacts to a minimum, and to eliminate where practicable. Management will be achieved through:

- No fires permitted on site.
- All fuels, oils, lubricants will be stored in sealed, labelled and secured containers.
- Idling of vehicles will be restricted, with machines switched off when not in use.
- Overloading of vehicles and plant will be prevented to ensure plant is working at its optimum efficiency.
- Modern, well-maintained plant and equipment is used.
- Light vehicle parking is to be at the site office compound, on a stone surface
- Heavy vehicles (curtain sided lorries) will be within the tarmacked area in Neal Soils Yard.

All work will be carried out in accordance with relevant legislation statutory guidance and industry best practice.

4.6 Archaeology and the built environment

Initial searches and information provided by the Client, makes no reference to any known Archaeology on the site. If, during works, any archaeological artefacts are found, the Project Manager shall cease works immediately and contact the Client, EDS Compliance Director and Local Authority as soon as practicable to seek suitable advice and ascertain how work can progress.

Any modifications installed by EDS (including access ramps, stoned tracks or temporary site compounds) will be removed after works have been complete. The routes for delivery lorries will follow the existing access route taken by Neal Soils lorries, as such, the roads should be of sufficient quality to withstand deliveries.

4.7 Ecology

There are no known protected species on site. Disturbance or unexpected discovery of protected or invasive species will be reported to EDS Compliance Director and the Contract Administrator. In all instances, works will stop until guidance is provided to the Project Team.

A Habitats Regulations Assessment (stage 1 and 2) has been produced. EDS will ensure compliance with the HRA Screening Assessment and Appropriate Assessment throughout the works.

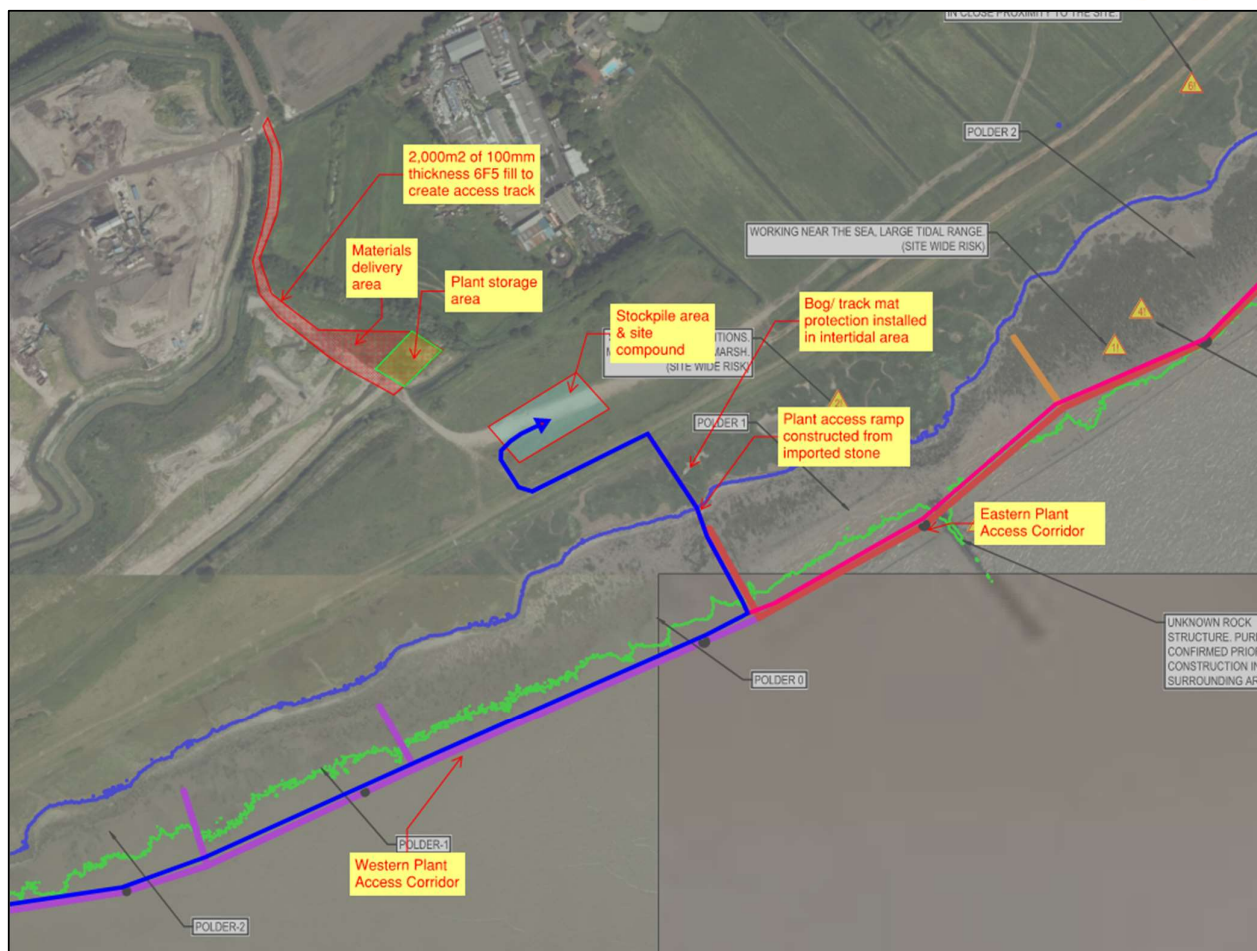
In accordance with the EAP objective B3 to '*maintain the quality of Transitional Water Body*' EDS will look to use the plant (excavators, tracked dumpers & argocats) only on the plant corridors that access the working area. These plant corridors will run adjacent and parallel the line of the polder fencing (within 5m

The proposed plant will limit ground bearing pressures to an absolute minimum e.g. the proposed WK90 amphibious excavator exerts a ground pressure under normal operating conditions of 11.9kN/m², which is expected to be well below the bearing capacity of a firm to stiff clay. The tracked dumper trucks that will be utilised will have a ground pressure (loaded) of 45kN/m². The table below displays the ground pressure of various clay types, all plant is below the threshold for firm clay, which will mean that the mudflats will be able to support the machinery, therefore machinery shouldn't sink into the clay and damage will thus be limited.

Type of Soil	Bearing Capacity
Very stiff bolder clays & hard clays	300 to 600 kN/m ²
Stiff clays	150 to 300 kN/m ²
Firm clay	75 to 150 kN/m ²

360 degree tracked dumpers will also be used and fully loaded with the requisite materials to service each gang for the expected shift outputs, this will limit the plant movements below MWHS and enable the materials to be tipped at any radius. These dumpers are particularly suited to sites where plant movements are confined to a restricted access corridor. The need for turning and reversing is omitted, providing safety and environmental benefits as the operator never needs to reverse or skid steer. Resultantly, the footprint of the area that is tracked over will be limited to the access corridors adjacent to the polders (see below image for diagram).

A washdown station will be in place above the HW line to clean plant before it is tracked to the site compound. After each shift, the operators will use an appropriate ecologically friendly disinfectant (Virkon S) to clean the tracks of machinery and operatives boots. A pre-commencement survey of the access route will be performed to ensure no invasive species will come into contact with machinery during transit. The Non-Native Species' 'Check-Clean-Dry' protocol will be followed for plant and equipment to reduce the risk of introduction of invasive species.



In accordance with the design and item B12 of the EAP, the openings in the polders fencing will be installed in alignment with the existing channels to reduce entrapment of fish on an ebb tide.

4.8 Landscape and visual

The project will take measures to control the visual impact of the works, where reasonably practicable. The works are taking place in an industrial area, it's not envisaged the local environment will be impacted by the works.

In the unlikely event that overnight lighting is required for security, this will be directed away from sensitive areas. Temporary boundary fencing such as Heras fencing will be used, this will reduce the visual intrusion of the works, assist in noise suppression and ensure public safety, providing a clear barrier between public areas and our work site. Site information, including the Project Manager and Site Manager contact details will be displayed at the point of entry on a scheme board.

Good housekeeping arrangements will be maintained on site. The site will be kept in a tidy manner to prevent accidental releases of litter and accumulation of mud on access and public roads. All reasonable measures will be taken to control the visual aspects of the park. Daily site monitoring will be undertaken to ensure controls are suitable.

On project completion, all construction materials, and plant will be removed from site and the site will be left clean and tidy and in accordance with the pre-commencement survey.

4.9 Flood risk, drainage & tides

Natural Resources Wales Flood Risk Assessment Map shows the work site is at a high risk of flood from the sea. The site office compound and delivery area in Neal Soil's land is at low risk.

During the works the water levels and weather will be monitored, necessary action taken if required. The team will have a daily tidal working window which will allow enough time for the team to transit out/ back to the 'working face' and will take into account a safety margin.

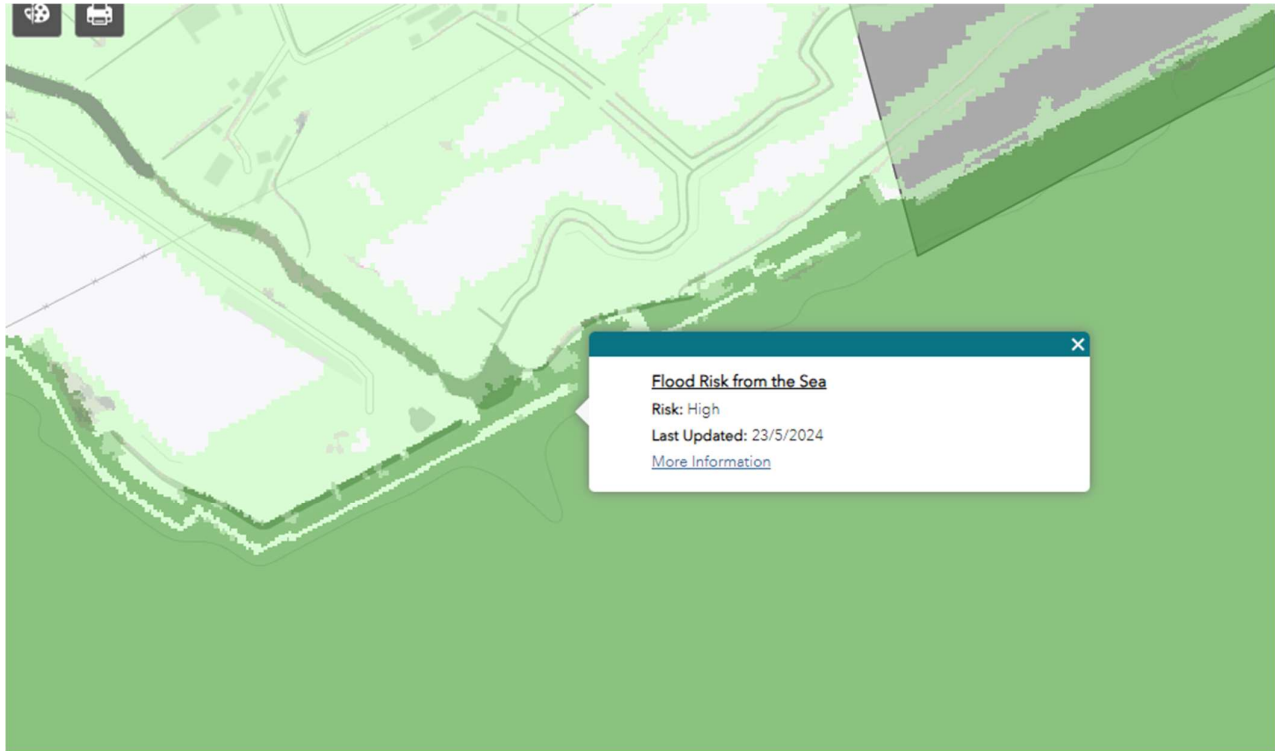


Figure 3: Site location and Natural Resources Wales Flood Risk Assessment Map

4.10 Waste

Waste generated at site will be monitored and recorded within the site documentation. Copies of waste transfer notes (WTNs) shall be stored within the site file. Non-hazardous WTNs will be retained for 2 years, and hazardous WTNs for 3 years, in line with statutory requirements.

All waste will be handled and disposed of in line with current "Duty of Care" Regulations. It is the responsibility of all persons on site to dispose of waste in the correct receptacles and to report any waste being stored incorrectly or escaping from the site area.

Opportunities to minimise waste will be documented in the Construction Phase Plan. Reuse of materials on site will be encouraged where practicable to avoid waste transfer to landfill, which is in accordance with EDS Environment & Sustainability objectives.

4.11 Highways

Traffic marshals will be in place whenever vehicles are crossing the public footway at the site compound entrance, ensuring the safety of the public at all times. Site access gates will be closed whenever not in use.

All loading and unloading of vehicles and deliveries will be within the secure site compound and not in publicly accessible areas.

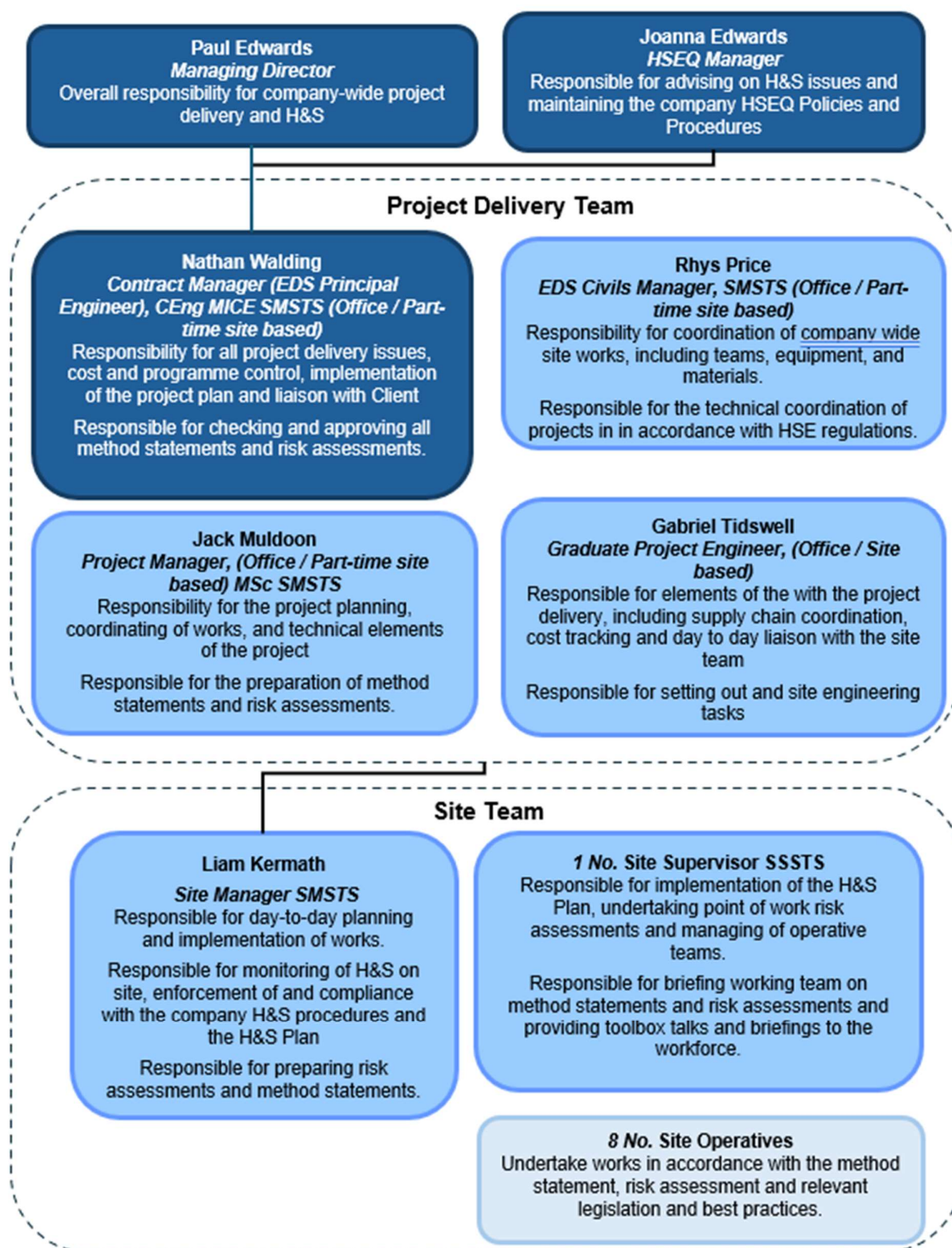
All parking for staff will be within the site compound. Any vehicles leaving the site compound will be wheel-washed, to prevent the spread of any mud, dust and non-native species entering the wider environment. The compound will be kept clean and tidy to prevent mud and dust accumulating.

5 Site Specific Consents and Permissions

Marine Licence will be acquired by NRW for these works to cover the permanent and temporary works in the intertidal zone. Assents will be acquired by NRW to cover any temporary access provisions above the highwater mark

No ordinary watercourse consent or flood risk activity permit is required for the works.

Appendix A: EDS project organisation chart



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