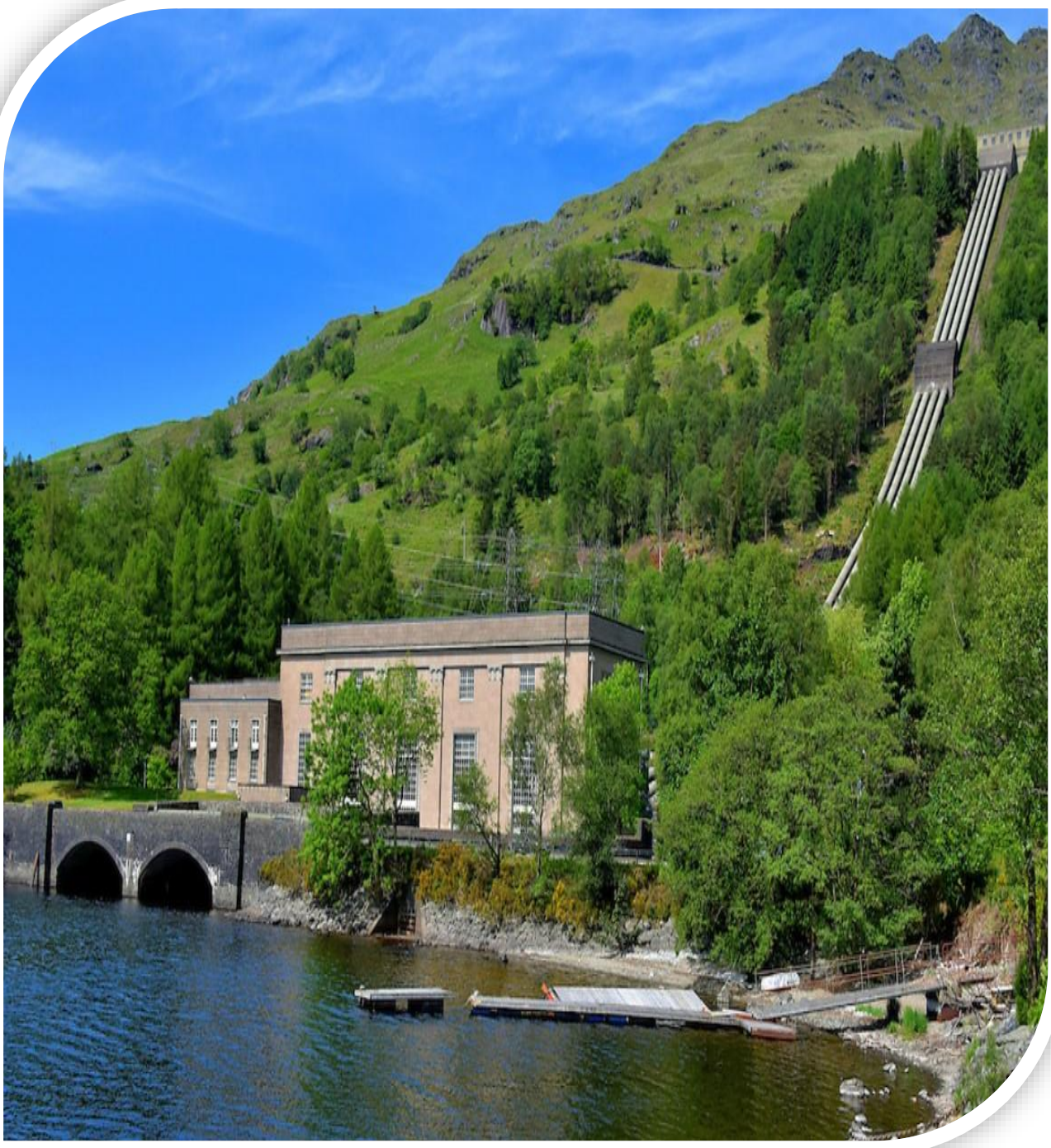
# Appendix 4.2: Sloy Pumped Hydro Storage Scheme: Outline Construction Environmental Management Plan (CEMP)

# OUTLINE - CONSTRUCTION ENVIRONMENTAL MANAGEMENT PLAN (CEMP)
# **SLOY PUMPED HYDRO STORAGE PROJECT**



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# Glossary

The following defines terms used throughout this document:

**The Development** – All aspects of the Sloy Pumped Hydro Storage development, commitments and mitigations outlined in the accompanying EIA Report shall be transposed into the Construction Environmental Management Plan (CEMP).

**The Employer** – The entity commissioning the construction of the Hydroelectrical Business and associated civil infrastructure. That is, SSE Generation Ltd.

**The Contractor / Principal Contractor (PC)** – The Contractor responsible for Civil Infrastructure and the Principal Contractor as defined in the Construction (Design & Management) Regulations 2015.

**Development Runoff** – Surface water runoff from site infrastructure that may contain suspended solids, silt or other organic matter that requires treatment before discharging to the water environment.

**Greenfield Runoff** – Surface water runoff from adjacent undisturbed land that does not require treatment prior to discharging to the environment.

**Environmental / Ecological Clerk of Works (ECoW)** – The ECoW is an independent specialist appointed by the Employer, typically with an ecological background, albeit with practical experience of broad environmental issues associated with construction. In accordance with relevant planning conditions, applicable regulations, and best practice, the ECoW monitors environmental compliance and provides advice to the Employer and Contractor where required. The ECoW role and associated responsibility is outlined in this document.

**Reinstatement** – Reinstatement works are generally undertaken during construction and aim to redress damage inflicted on the landscape as part of the construction process. Reinstatement is undertaken as soon as possible following the construction works in each area, such as reprofiling of disturbed areas as a result of the construction process. Re-seeding / hydro-seeding may be part of reinstatement measures where redressing proves unsuccessful.

**Restoration** – Restoration works are generally defined as long-term measures aimed to restore (and in some instances improve / enhance) the ecological status of the development with regard to species and / or habitat. Restoration measures will be largely covered in the site's Habitat Management Plan (HMP), where applicable. Re-seeding / hydro-seeding may be part of restoration works where reinstatement works are found to have been unsuccessful with regard to establishing plant growth.

**Ground Water Dependent Terrestrial Ecosystem** – wetlands which are ecologically critically dependent on groundwater.

# Part 1: Construction Environmental Management Plan (CEMP)

# 1. Introduction

## 1.1. CONSTRUCTION ENVIRONMENTAL MANAGEMENT: AIMS AND OBJECTIVES

1.1.1 This document provides information relating to Construction Environmental Management (Part 1: CEMP) and Construction Method Statements (Part 2: CMS) for the Sloy Pumped Hydro Storage Project. This will hereafter be referred to as the Development. This document has been prepared to inform the Planning Authority and statutory consultees of the proposed management method to be employed during the construction of the Development.

1.1.2 The principal objective of this document is to provide information on the proposed infrastructure and to detail appropriate measures in the avoidance, minimisation and control of adverse, environmental impact associated with the Development. Furthermore, this document aims to define good practice as well as specific commitments relating to environmental protection as identified in the EIA Report and associated conditions of consent.

1.1.3 The CEMP forms part of the Civils Works Contract (hereafter, the Contract). The methods and principles contained herein, as well as within referenced legislative instruments and published guidance documents, are adhered to by the *Contractor* in developing and refining the detailed design, construction method statements and other plans relating to environmental management as required by the Contract.

1.1.4 The *Contractor* submits all relevant information as detailed in this document to the *Employer* for acceptance in accordance with the Contract provisions. No works will commence prior to the *Employer's* acceptance.

1.1.5 Once approved, the *Employer* provides the *Contractor* with an electronic copy of the CEMP which the *Contractor* maintains for the duration of the works.

1.1.6 This document is read and implemented onsite in conjunction with industry best practice, published guidance documents, and other documents referred to within the CEMP (Section 15 Reference Documentation).

## 1.2. ROLES, RESPONSIBILITIES AND STRUCTURE OF THE CEMP

1.2.1 The *Contractor* appoints an appropriately competent person or persons (*Contractor's* Site Environmental Representative) to undertake relevant environmental tasks as detailed in this document prior to, during and upon completion of the construction works.

1.2.2 The *Contractor* demonstrates the competence of the Site Environmental Representative to the *Employer* via submission of relevant information (e.g. CV, training records, membership records) for acceptance prior to commencement of construction works.

1.2.3 The *Client / Contractor* is responsible for obtaining all necessary consents, licences and permissions for their activities as required by current legislation governing the protection of the environment.

1.2.4 A copy of this document and related files and documents will be kept in the site offices for the duration of the site works and will be made available for review at any time.

Upon completion of the construction works, the *Contractor* submits a complete electronic copy of the final set of information to the *Employer* for their records.

1.2.5 Where the *Contractor* has standard documents within their own company / corporate Environmental Management Plan which might cover a particular requirement of this CEMP, these will either be inserted or cross referenced within the relevant Section of the final CEMP (produced following consent to include further commitments).

1.2.6 A Checklist has been included in Section 16, providing the *Contractor* with a summary of the minimum information to be provided to the *Employer* pre- during and post-construction.

1.2.7 The information / documents listed in the Checklist represent the minimum information to be provided to the *Employer* / Planning Authority at the stages indicated in the Checklist.

# 2. Project Environmental Constraints

## 2.1. SCHEDULE OF MITIGATIONS COMMITMENTS REGISTER AND PLANNING CONDITIONS

2.1.1 A range of mitigation measures, designed to avoid or minimise potential environmental impacts conveyed by construction, are detailed within the EIA Report and Schedule of Mitigation for the Proposed Development.

2.1.2 Following receipt of Section 36 consent, the Schedule of Mitigation will be updated and incorporated into the Commitments Register which will detail all mitigation measures referred to in the EIA Report, any EIA Report Addendum, and additional documentation provided to and approved by the Planning Authority.

2.1.3 The Commitments Register will also include all Consent Conditions.

2.1.4 The Contractor will adopt and implement the measures outlined in Part 2: Outline Construction Method Statements (CMS).

# 3. Correspondence, Records and Reporting

3.1.1 The *Contractor* provides a complete record of all relevant communication, and reports associated with all aspects of environmental management and implementation of this document. As a guide, the following records will be maintained:

- **Minutes and attendance record** of start-up meeting (onsite meeting prior to commencement of construction works). Attendance required by *Employer*, *Contractor*, ECoW and all other relevant personnel responsible for environmental management during the project.
- Weekly rolling **Environmental Risk Log** including look ahead activities with required mitigation (including weather forecasts). This is required to be discussed and recorded at scheduled weekly construction meetings. This will cover all environmental sensitivities, including ecology and water quality. This will include a supporting Environmental Risk Map.
- **Communication Plan** (Section 14.3.2)
- *Employer and Contractor* **Audit Reports** (Section 3.2)
- **Record of Toolbox Talks and Training** (Section 4.2)
- **Dust / noise monitoring records**
- **Waste Management Records**, as defined in (Section 8.2)
- **Drainage Maintenance Register**
- **Water Quality Monitoring Records**, documenting the *Contractor*'s visual checks of waterbodies as outlined in the Pollution Prevention Plan (PPP) (Section 7.4).
- **Excavation Register** (Section 12.3)
- **Geotechnical / Peat Risk Register** (Section 12)
- **Licenses and Consents** - copies of all permissions, consents, licenses, and permits, including related correspondence. (Section 1.2.3)
- **Regulatory Authority visits (e.g. SEPA, Nature Scot), observations and communications**
- **Environmental Departure Register**, as defined in Section 4.3.
- **General Correspondence** - all other relevant internal and external communication records relating to environmental management issues and implementation of the CEMP.

## 3.2. ENVIRONMENTAL AUDITS

3.2.1 Audits may be completed at any time by the *Employer*, but at least one per quarter. All completed audit forms (and records of corrective action and close outs) must be filed. The *Contractor* undertakes a programme of environmental audits to satisfy conformity with CEMP principals, including audits of their sub-contractors.

## 3.3. RISK ASSESSMENT & METHOD STATEMENTS

3.3.1 The *Contractor* provides Risk Assessments and Method Statements (RAMS) for all works and tasks prior to these being undertaken. These documents will consider all of the environmental aspects of the planned works and shall address all committed mitigation measures as a minimum.

## 3.4. NOTICE BOARDS

3.4.1 The *Contractor* provides and maintains project environmental notice board(s) which are positioned to ensure that all operatives have the opportunity to review a notice board on a daily basis. As a minimum this will include one notice board to be placed in each compound.

3.4.2 The environmental notice boards are maintained by the *Contractor's* Site Environmental Representative and shall be updated at least monthly. As a minimum, the notice boards contain:

- Description of the key environmental risks and intended risk mitigation measures.
- Accompanying Environmental Constraints Map illustrating the location of the key risks and required exclusion zones / buffer zones and location of emergency response equipment, as required by the CEMP; and
- Key contact numbers and responsible personnel identified within the Environmental Incident and Emergency Response Plan (EIERP).

# 4. Site Induction

4.1.1 The *Contractor* ensures that all contractor employees, sub-contractors, suppliers, and other visitors to the site are made aware of the content of this document that is applicable to them. Accordingly, environmental specific induction training will be prepared and presented to all categories of personnel working and visiting the site.

4.1.2 As a minimum, the following information will be provided to all inductees:

- Identification of specific environmental risks associated with the work to be undertaken on site by the inductee (e.g. exclusion zones, fuel handling, spill kit locations, sensitive habitats, drainage control/mitigation, spill control, silt pollution control, waste minimisation and recycling, reporting of environmental observations).
- Environmental Incident and Emergency Response Procedures (including specific Environmental Communication Plan requirements and reporting of incidents).

4.1.3 Based on survey data collected throughout the planning and pre-commencement Development phases, the *Employer* develops an **Environmental Constraints Area Map** illustrating land constraint by environmental sensitivities (e.g. exclusion zones) and provides these maps to the *Contractor*. The *Employer* provides updated survey data to the *Contractor* when available, e.g. throughout the ecological survey season.

4.1.4 Informed by the Environmental Constraints Area Map, the *Contractor* provides an Environmental Risk Map illustrating environmentally sensitive areas and potential sources of pollution (e.g. water buffers, designated refuelling areas, location of spill kits, concrete wash out areas, fuel tanks etc.). The Environmental Risk Map will be used during the induction and prominently displayed in the compound areas. In consultation with the ECoW, the *Contractor* updates the map as required. In accordance with Section 4.2.3, any update will trigger a toolbox talk to clearly communicate the change and offer opportunity for any necessary clarifications.

## 4.2. TOOLBOX TALKS & TRAINING

4.2.1 During construction, in order to provide on-going reinforcement and awareness training, the above topics, along with any other environmental issues which arise onsite, will be discussed at regular toolbox talks.

4.2.2 Toolbox talks and training will be delivered by *Contractor* and specialist personnel onsite (e.g. ECoW, Construction Supervision Staff, *Contractor's* Site Environmental Representative, etc.) as required.

4.2.3 The *Contractor* submits a schedule for toolbox talks at least one week prior to commencement of works. The proposed schedule – to be considered as a live document - shall be consistent with the programme of works. Additional toolbox talks shall be added as required based on circumstances such as unforeseen risks, repeated observation of bad practices, perceived lack of awareness and pollution event.

4.2.4 Specifically, the *Contractor* provides, as a minimum, the following environmental training:

- Training on the use of spill kits (on ground and in surface waters), to be provided on a regular basis (to account for staff/subcontractor changes etc). Training to be undertaken by a suitably qualified individual; and
- Training on silt mitigation e.g. installation of silt fencing etc., silt mitigation measures to relevant construction / site staff.

4.2.5 The *Contractor* maintains records of all Toolbox talks and training and makes these records available to the *Employer* if so requested

## 4.3. MANAGEMENT OF CHANGE

4.3.1 During the construction of the Development, it is considered reasonable to presume that certain eventualities will partially or fully preclude the implementation of specific standards and processes outlined herein. In these events, the *Contractor* provides justification to the *Employer* outlining the reasons for any departure and details a proposed alternative approach that does not compromise environmental protection. The alternative proposals shall only be adopted following consideration and acceptance of the *Employer* and the ECoW where relevant.

# 5. Pollution Prevention and Mitigation

## 5.1. CAR LICENSING & POLLUTION PREVENTION PLAN (PPP)

5.1.1 All site discharges are regulated under the Water Environment (Controlled Activities) (Scotland) Regulations 2011 (as amended) (the "CAR" Regulations) and the Water Environment (Miscellaneous) (Scotland) Regulations 2017. A licence will be sought from SEPA prior to the commencement of any operations on-site.

5.1.2 A PPP will be prepared for development in accordance with guidance provided by SEPA for Construction Sites[1] and will include (not be limited to) the measures set out within this section of the CEMP.

5.1.3 Depending on the time available between contract award and construction start, the developer of the site may act as Responsible Person until such time as a *Contractor* is appointed, at which point the license and Responsible Person nomination will be transferred to the *Contractor*. Upon transfer of the license, the *Contractor* will prepare any further site/works-specific plans, and documents to update the PPP dependent on their design of the Works.

5.1.4 The *Client / Contractor* submits all temporary drainage designs and drawings as required to comply with conditions of the CAR Construction Runoff Permit as amended (2021 update) and PPP.

## 5.2. RESPONSIBILITY

5.2.1 The *Client / Contractor* is responsible for pollution prevention for the duration of the contract and until such time as permanent measures, such as permanent drainage and silt mitigation controls, are deemed to be adequate and appropriately constructed.

5.2.2 The *Client / Contractor* undertakes a regular programme of dust and noise monitoring, including the inspection of relevant plant and vehicle parts.

5.2.3 This responsibility will include the actions of any third party who is sub-contracted by the *Contractor* or otherwise involved in the project.

5.2.4 It is the responsibility of the *Client / Contractor* to contact SEPA, other statutory and non-statutory bodies in the vicinity of and downstream of the proposed project so that the requirements and interests of these parties are adhered to and protected throughout the duration of the Contract.

5.2.5 The *Client / Contractor* is familiar with and executes works in accordance with the guidance provided in the SEPA Pollution Prevention Guidelines and other guideline documents as detailed in Section 15.

5.2.6 The *Client / Contractor* ensures that all staff and subcontractors working on site will be familiar with pollution prevention and mitigation measures as detailed in this document; this includes subcontractors, *Employer's* direct contractors and other *Employer's* representatives working on the site.

[1] https://www.sepa.org.uk/media/340359/wat-sg-75.pdf

## 5.3. GENERAL POLLUTION PREVENTION MEASURES

5.3.1 The following points (not exhaustive) indicate general pollution prevention measures in accordance with those highlighted within the guidelines referenced in this document and the EIA Report. Pollution Prevention measures relating to specific tasks are also detailed in the respective sections of this document.

- Any material or substance which could cause pollution, including fuels/oils, wet cement, raw concrete or silty water will be prevented from entering groundwater, surface water drains or watercourses by the appropriate use of and appropriate placement of (temporary) silt fences, cut-off drains, silt traps and drainage to vegetated areas where appropriate. Any sign of failing water treatment measures or sight of silted or contaminated water entering any watercourse on site will be reported immediately.
- Any silty water generated on site will ideally be settled out as much as possible through drainage mitigation measures (silt traps, etc.) and, where appropriate, released back into the watercourse.
- External fuel delivery lorries will only be allowed as far as the site compound where there will be a covered refuelling area equipped with an impermeable base.
- Fuel transfer / refuelling will be undertaken by specifically trained and competent staff or undertaken under competent supervision.
- Areas of waste oil / fuel / chemical storage and permanent refuelling will be located at least 10m away from watercourses or drainage paths. Where this is not possible, advice will be sought from the ECoW, and a minimum distance will be agreed with the *Employer*. Such storage areas will be sited on an impervious base to prevent the downward percolation of contaminants to natural soils and groundwater.
- All refuelling will be carried out at least 10m from watercourses. Where this buffer distance cannot be achieved a minimum distance will be agreed with the ECoW. Fuel pipes on plant, outlets at fuel tanks etc will be regularly checked and maintained to ensure that no drips or leaks to ground occur.
- Spill kits will be available within each plant on site and also located close to identified pollution sources or sensitive receptors (fuel storage areas, water course crossings, etc).
- Irrespective of the buffer distance and location of refuelling, interceptor drip trays (or similar, e.g. plant nappies, – open metal drip trays are not acceptable) will be available. Interceptor drip trays will be positioned under any stationary mobile plant to prevent oil contamination of the ground surface or water.
- All stockpiled materials will be stored in designated areas and isolated from any surface drains. Aggregate or fine materials storage with dust or run off potential will be enclosed and screened/sheeted.
- Washing-out of concrete wagons on site shall only be permitted when the *Contractor* has provided a designated, suitably prepared wash-out area with signage identifying the area as suitable for concrete wagon wash-out.
- The concrete ‘washout’ in the designated area shall not be emptied into any watercourse and shall be appropriately treated or disposed of in accordance with the Site Waste Management Plan.
- Tools, equipment, or materials will not be washed in watercourses. Mortar mixing and material storage areas must be away from watercourses.

## 5.4. DUST MANAGEMENT PLAN

5.4.1 The Contractor implements the following mitigation measures to minimise dust emissions during the Works:

5.4.2 Wheel cleaning and lorry sheeting measures are employed to prevent mud, debris or other loose or deleterious material being deposited on the local road network. Similarly, any hardstanding areas for vehicle parking are kept clean and, if unsealed, are kept damp during prolonged spells of dry weather or as required to suppress dust emissions.

5.4.3 Site entrances and the adjacent local road network are kept free of mud and other loose or deleterious material arising from construction traffic through use of a road sweeper where required.

5.4.4 Dust generation on site haul roads and hardstanding areas is avoided or minimised by regular water spraying in dry weather spells or as required to suppress dust emissions.

5.4.5 Excavations and excavated materials are kept damp by water spraying or misting and stockpiles are dampened down and if necessary, covered or screened. Waste material is stored in a controlled manner in a designated area.

5.4.6 Adequate supplies of water are made available for use in dust suppression units/bowsers.

5.4.7 Dust collection systems and / or dampening systems are used on all blast-hole drilling machines (if used). Borrow pit working areas are kept damp by water spraying or misting if required to suppress dust emissions.

5.4.8 Site speed limit will be enforced.

5.4.9 No burning of materials is permitted on site.

## 5.5. CONSTRUCTION NOISE MITIGATION PLAN

5.5.1 Two properties have been identified as sensitive, insert properties in proximity

5.5.2 Due to ecological sensitivity, any works which may involve large scale noise or vibration (such as pile driving or blasting) will be undertaken, only with prior consultation with the ECoW.

5.5.3 Construction activities will be limited to between 07.00- and 19.00 hours Mondays to Saturdays, and 08.00 to 16.00 hours on Sundays. In the event of work being required outwith these hours, e.g. abnormal load deliveries, commissioning works, or emergency mitigation works, the Planning Authority will be notified prior to these works taking place, wherever possible.

5.5.4 Operation of crushing equipment located within the development will generally be limited to 08.00 to 18.00 hours Mondays to Fridays and 08.00 to 14.00 hours Saturdays, with no operation on Sundays.

5.5.5 Any blasting on site shall only take place between the hours of 10.00 to 16.00 on Monday to Friday inclusive and 10.00 to 12.00 on Saturdays with no blasting taking place on a Sunday or on National Public Holidays, unless otherwise approved in advance in writing by the Planning Authority.

5.5.6 To reduce the potential effects of construction noise, the *Contractor* will apply the following types of mitigation:

- All construction activities shall adhere to good practice as set out in BS (British Standards) 5228.
- All equipment will be maintained in good working order and any associated noise attenuation such as engine casing and exhaust silencers shall remain always fitted.
- Where flexibility exists, activities will be separated from residential neighbours by the maximum possible distances.
- Construction plant capable of generating significant noise and vibration levels will be operated in a manner to restrict the duration of the higher magnitude levels.

## 5.6. COSHH

5.6.1 The *Contractor* is responsible for ensuring that all materials ordered or brought to site listed as hazardous under the Control of Substances Hazardous to Health (COSHH) Regulations are accompanied with a hazardous information sheet. The *Contractor* complies with the COSHH Regulations.

## 5.7. POLLUTION MONITORING & CONTROLS

5.7.1 The *Contractor* carries out regular inspections of oil/fuel storage areas and plant. The frequency and responsibility for undertaking these inspections will be recorded by the *Contractor* and communicated to the *Employer* prior to commencement of the works.

5.7.2 To ensure compliance of the works with this document and pollution prevention requirements, the *Employer* regularly monitors the *Contractor's* works. **Should the *Employer* identify any failure to comply with the requirements of this document or the *Contractor's* own method statements the *Employer* may stop the associated works until such time as the failure is rectified.** Any associated cost or time delay incurred will be borne by the *Contractor.*

# 6. Temporary Drainage

## 6.1. SCOPE AND MINIMUM REQUIREMENTS

6.1.1 The *Contractor* complies with conditions of the CAR Construction Site License and PPP, see 5.1.

6.1.2 The *Contractor* undertakes maintenance of all temporary and permanent drainage solutions as and when required at a frequency at least weekly whilst *Contractor* maintains a **Drainage Maintenance Register** and issues this to the Project Manager on a weekly basis.

6.1.3 Temporary drainage should be as required to comply with SEPA guidance and must be designed to accommodate larger flows depending on the specific site conditions.

6.1.4 The *Contractor* designs and constructs a drainage system including all silt mitigation measures necessary to prevent the pollution of existing drainage systems and watercourses for construction and post construction activities.

6.1.5 As a minimum all temporary drainage is installed as the track is constructed, where possible the permanent drainage is installed as the works progress. In the event that temporary drainage is installed at the time of construction the permanent drainage is installed within 3 months of that section of track being completed.

6.1.6 All drainage associated with the works, with the exception of that carrying purely Greenfield run-off, is not permitted to discharge directly into any existing drainage or watercourse without agreement with the ECoW.

6.1.7 The *Client / Contractor* does not discharge water on either a temporary or permanent basis unless they have acceptance from the relevant stakeholders and the ECoW, and complied with the requirements of the relevant Authorities, Utilities and Service Providers.

## 6.2. CLEAN WATER DIVERSION

6.2.1 Where possible, green field run-off will be kept separate from silty water or other potentially contaminated water. Where appropriate, interceptor ditches and other drainage diversion measures will be installed – in advance of any excavation works – in order to collect and divert green field run-off away from construction disturbed areas.

6.2.2 The *Contractor* channels silty and clean water drainage separately to designated areas (approved by ECoW) to allow the settlement of solids. Where settlement over vegetation is not practical or adequate to deal with the volume of silt generated, the *Contractor* provides and maintains silt traps or settlement lagoons.

## 6.3. SILT MITIGATION AND SETTLEMENT PONDS

6.3.1 The *Contractor* erects and maintains silt fences to protect all watercourses, which may be affected by the works. The *Contractor* maintains these weekly to the satisfaction of the Project Manager and the ECoW.

6.3.2 Silt laden run off should be expected from any areas of recently exposed soil or rock. This silt laden run-off will be captured and directed towards specially constructed sediment control structures.

6.3.3 Where required siting of settlement ponds will take into consideration access requirements for reinstatement and maintenance (for example: periodic silt removal, expansion of ponds or incorporation of additional silt mitigation measures, etc.).

6.3.4 The *Client / Contractor* discusses and agrees the location of lagoons and other drainage mitigation measures with the ECoW prior to associated works taking place.

6.3.5 Details of typical settlement ponds and silt mitigation measures are indicated in Section 6.3 in this CEMP. Additional filtration measures may include flow attenuation measures such as weirs, rock bars and / or anchored and embedded straw bales within settling ponds or between series of ponds.

## 6.4. FOUNDATIONS AND HARDSTANDINGS

6.4.1 Foundation excavations for the proposed development is below the level of the surrounding ground and hence surface water ingress from up slope or groundwater seepage may occur, leading to standing water within the base of the excavation. A 'permit to pump' procedure will be in place prior to water being pumped from an excavation. The *Contractor* seeks the Site Environmental Representative's and/or ECoWs (Environmental Clerk Of Works) approval prior to granting a 'permit to pump'.

## 6.5. CONSTRUCTION COMPOUNDS, AND CONTROL BUILDINGS

6.5.1 As with all construction activities, green field run-off and development run-off will be kept separate and appropriate silt mitigation measures will be deployed. Pumping of water from excavations is subject to a 'permit to pump' (see 6.4.1).

6.5.2 The construction compound(s) is/are free draining and contain a bunded area draining to oil interceptor (or similarly robust alternative) for bulk fuel storage and maintaining vehicles and plant, or other pollution control measures, as appropriate / required to protect existing water courses and private water supplies. Any alternative to a bunded area suggested by the *Contractor* must be agreed with the *Employer*.

6.5.3 The laydown area(s) are free draining for maintaining vehicles and plant, or other pollution control measures, as appropriate / required to protect existing water courses and private water supplies.

# 7. Water Quality Monitoring

## 7.1. GENERAL REQUIREMENTS

7.1.1 In line with best practice, the *Employer* undertakes surface water quality monitoring where an impact on surface water bodies cannot be ruled out. The *Employer* considers it best practice to obtain baseline surface water quality data prior to commencement of the works, and to monitor water quality during the works in order to identify any significant changes of water quality which may be attributed to the construction works.

7.1.2 The surface water monitoring programme is implemented and maintained by the *Employer* and either undertaken by the *Employer's* environmental staff or by an environmental consultant appointed by the *Employer*.

7.1.3 Where a decrease in water quality resulting from construction works is observed the *Contractor* will undertake remedial measures and will bear the costs of all associated sampling and investigation. The *Contractor* may wish to undertake confirmatory sampling and analysis at any point during the works at his own cost.

7.1.4 A surface water monitoring plan will be prepared following receipt of planning consent. The plan will detail proposed monitoring locations, monitoring frequency and analytical parameters based on the findings of the EIA Report and any subsequently submitted documents / information. The Water Quality Monitoring Plan will be submitted to the Planning Authority post-consent / pre-commencement of works as part of the updated CEMP.

## 7.2. SURFACE WATER QUALITY MONITORING LOCATIONS

7.2.1 Monitoring of water quality will be carried out on selected watercourses; specific monitoring locations will be identified post-consent during the detailed design phase (pre-commencement of works).

## 7.3. MONITORING FREQUENCY AND ANALYTICAL PARAMETERS

7.3.1 Pre-construction monitoring is likely to be undertaken at least monthly for at least 3 months prior to construction to establish a baseline.

7.3.2 Construction phase monitoring is likely to be undertaken at least monthly commencing within 2 weeks of start of works, and ad-hoc if deemed necessary, e.g. following a pollution incident.

7.3.3 Post-construction monitoring is likely to be undertaken monthly for at least 3 months following completion of the main civil construction works.

7.3.4 Monitoring of specific locations may cease within 3 months of works ceasing in a particular area, following consultation with SEPA where necessary.

7.3.5 Where necessary surface water quality monitoring will include the monitoring of field parameters at each location prior to the collection of water samples at each location for analysis at a UKAS accredited laboratory.

7.3.6 The field parameters monitored during each monitoring round and obtained via use of a hand-held monitoring device, are pH, electrical conductivity, temperature, and dissolved oxygen. Monitoring results will be recorded in the field.

7.3.7 Water samples at each location will be obtained and submitted to a UKAS accredited laboratory. Generally, analysis for the following parameters will be undertaken:

**Table 1: Proposed Laboratory Analytical Parameter**

| Analytical Test | Rationale |
|---|---|
| Electrical Conductivity | Useful indicator of the overall salinity of surface or spring water. |
| pH | Overall water quality parameter which could indicate effects on water acidity due to changes in land use and disturbance of peatlands. |
| Temperature | General physical indicator. |
| Dissolved Oxygen | Likely to be high in all streams but needs determining as an important indicator of water quality. |
| Turbidity | Measurable on site, and the most noticeable indicator of impact to a water course. |
| Total Suspended Solids (TSS) | TSS: measure of water quality for construction developments and hence a TSS limit is generally specified for discharges from construction sites. |
| Chemical Oxygen Demand (COD) | Measure of possible releases from disturbed peat turf and peat. |
| Dissolved Organic Carbon (DOC) | Key components of carbon cycle and known to be sensitive to development on peatland. Organic carbon can help to reduce metal toxicities. May correlate closely with colour. |
| Soluble Iron | Solubility can be affected by pH. High iron concentrations may precipitate out if physical conditions change. |
| Ammoniacal Nitrogen | Nutrient, known to occur as pulse after ecosystem disruption. |
| Total Reactive Phosphorus (Orthophosphate) | Standard nutrient parameter, known to occur as pulse after ecosystem disruption and may lead to eutrophication (algal blooms). |
| Nitrate | End product of nitrogen pollution. Principal nutrient and standard nutrient parameter. Indicator of background pollution and needed for assessing any impact of ground disturbance during construction. |
| Soluble Aluminium | Solubility affected by pH. Of concern in forested areas where low pH of surface water can lead to significant levels of aluminium. |

| Analytical Test | Rationale |
|---|---|
| Chloride as Cl | Indicator of rainfall inputs and site weathering, often related to geology of catchments, partly controls electrical conductivity readings. |
| Total Petroleum Hydrocarbons (TPH) (CWG by GC-FID) | Monitor impact from potential hydrocarbon releases on site during construction works. |

## 7.4. *CONTRACTOR'S* VISUAL AND FIELD WATER QUALITY MONITORING

7.4.1 The *Contractor* ensures that all personnel and visitors on site are encouraged (at site inductions) to report visual indications of changes in water quality (e.g. discolouration or other evidence of contamination) in any watercourses on site.

7.4.2 The *Contractor* undertakes visual inspections of the watercourses on site, including the monitoring locations referred to in section 7.2 above, at least once a week. The *Contractor's* monitoring records will include the following minimum information:

- Antecedent and current weather conditions.
- Current construction activities within the vicinity and in particular up stream or up gradient of the observation point.
- Visual assessment of water colour, turbidity, and flow rate.
- Evidence of chemical contamination.
- Visual evidence of silt or sediment pollution within the water column or on the bed of the watercourse/standing water body.
- Details on any communication, corrective action and / or mitigation undertaken as a result of any water quality issues observed during the monitoring visit.

7.4.3 Where evidence of pollution is observed to the water environment, emergency response procedures will be implemented, and the incident will be reported to the *Employer* within 30minutes (Section 14). Remedial measures will be implemented immediately, and details of action taken will be recorded.

## 7.5. PRIVATE WATER SUPPLIES (PWS)

7.5.1 Private Water Supplies within 500m of the construction area will be assessed to determine whether they are at risk from contamination due to construction activities. If required, the PWS will be diverted and/or safeguarded and baseline water quality monitoring of the properties downstream on the PWS will be undertaken. Monitoring would continue during construction and for a period following completion so that in the event of effects on the PWS they could be identified and further mitigation measures put in place.

# 8. Waste Management

## 8.1. SITE WASTE MANAGEMENT PLAN (SWMP) IMPLEMENTATION AND RECORDS

8.1.1 In accordance with best practice, the *Employer* requires a Site Waste Management Plan (SWMP) to appropriately document and control waste at construction sites. The SWMP will record all waste arising from the Development.

8.1.2 The SWMP provides details on how waste reduction shall be implemented at the site and how this shall be monitored throughout the construction phase. The *Contractor's* nominated Site Environmental Representative takes responsibility for implementation and monitoring of the SWMP.

8.1.3 The *Contractor* utilises only certified waste carriers / waste contractors and maintains records of these contractors (carriers, transfer station, waste recipient etc) as part of the SWMP documentation onsite.

8.1.4 The requirements of the SWMP are communicated to all site operatives during their induction. Furthermore, all operatives onsite attend waste reduction toolbox talks on a regular (e.g. quarterly) basis to increase awareness of recycling / waste reduction.

8.1.5 The SWMP includes the following as a minimum:

- Identification of the *Employer*, the *Contractor*; the person(s) who drafted the SWMP and the person(s) who will be responsible for its implementation, monitoring, and review during and upon completion of construction works.
- The minimum percentage recycling level expected by the *Employer* of all materials removed from the site (measured in terms of tonnage).
- Various materials that will be required to facilitate construction and support the provision of welfare at the site. In the interests of promoting sustainability via the supply chain and minimisation of waste, the *Contractor* investigates opportunity for procurement of materials with reduced or reusable/returnable packaging. Where such opportunities are realised, the *Contractor* provides details in the SWMP.
- Waste inventory and procedures to address the following:
  - a description of each waste type expected to be produced in the course of the project, with the relevant European Waste Catalogue code assigned to it.
  - an estimate of the quantity (tonnage) of each different waste streams / type of waste expected to be produced during each construction activity.
  - a written statement demonstrating what actions are to be taken to minimise the volume of each type of waste produced prior to commencement of the activity generating the waste.
- Identification of the waste management actions proposed for each different waste type, including re-using, recycling, recovery, and disposal. For example, minimum provisions should include:
  - provision of bins to segregate waste and recyclable materials within all welfare facilities in-line with the preliminary, non-exhaustive waste streams identified in Section 8.3;
  - provision of separate, suitably robust skips for general waste and separate recyclable materials within the main site compound in-line with the preliminary, non-exhaustive waste streams identified in Section 8.3;

  - management of expected and unexpected hazardous/special waste. i.e. provision of secure bunded containers to store waste oils / fuels / lubricants and oily rags prior to removal from site.
  - re-use of materials such as concrete formwork and reinforcement “seating” steel.
  - material arising from excavation works may be reused as fill material where suitable (and not posing environmental risks);

- A site plan showing all waste disposal/recycling locations and material storage areas.
- Identification of the proposed Waste Contractor(s) and the requirements imposed on them, i.e. completion of Waste Transfer Notes (WTN).
- WTN for all materials removed from site comprising the following information:
  - European Waste Catalogue (EWC) codes.
  - description of waste removed from site.
  - date and time waste removed from site.
  - weight (in tonnes) of waste removed from site.
  - name of Waste Contractor Operative.
  - location of waste disposal site which is to be used; and
  - weigh of waste / recyclable material, i.e. waste facility will include weight bridge.
- All estimated and actual waste itemised (by waste stream as a minimum) in cubic meters or tonnes and the recovery rate.

## 8.2. SWMP MONITORING AND AUDITING

8.2.1 For monitoring and auditing purposes, the *Contractor’s* Site Environmental Representative implements and maintains a Waste and Recycling Record under the SWMP. As a minimum, this includes a record of all waste leaving the site for either landfill disposal or recycling, including copies of all WTN in-line with the requirements of Section 8.1. The Waste and Recycling Record will be maintained and kept up to date by the *Contractor’s* Site Environmental Representative.

8.2.2 The *Contractor’s* Site Environmental Representative checks the contents of the site waste and recycling skips on a weekly basis to ensure waste is being correctly segregated. Non-compliance will be highlighted at the weekly progress meeting and appropriate actions taken e.g. a toolbox talk to all site operatives. Furthermore, the *Employer* and *Contractor* audit the waste disposal chain to demonstrate compliance with the responsibilities outlined in Duty of Care for Waste and refers to the good practice principals detailed in A Simple Guide to Site Waste Management Plan, especially the *Contractor* audits against the checklist in Part Three of the guide.

8.2.3 Waste management will be a recurring agenda item for all regular meetings as required by this document. The *Contractor’s* Site Environmental Representative provides an update on the achieved percentage of recycling and any actions that are required to be implemented.

8.2.4 Waste management is monitored by the *Contractor’s* Site Environmental Representative and reviewed monthly against the estimate set within the *Contractor’s* detailed SWMP. Where necessary, changes are implemented in order to revise site activities if performance is below the set recycling target.

8.2.5 Upon completion of works, the Site Waste Management Plan will be provided to the *Employer.* This will contain pre-construction estimated and actual waste itemised (by waste stream as a minimum) in cubic meters or tonnes and the recovery rate of each waste, including waste quantities for recovery / diversion from landfill.

## 8.3. ANTICIPATED CONSTRUCTION WASTE STREAMS

8.3.1 A number of difference waste streams are likely to arise during construction. The *Contractor* identifies all waste streams and provides an estimate of expected waste volumes for each waste type generated within the waste stream.

8.3.2 The *Contractor* ensures all relevant information is taken into account in preparing their SWMP (for example intrusive ground investigation data, supply chain assessments, options appraisals etc).

8.3.3 The section below sets out a non-comprehensive list of waste streams that typically arise during construction of the development:

- waste from welfare facilities, e.g. food waste, paper, plastics, glass, and other typically domestic refuse and sewage.
- concrete wash water
- waste chemicals, fuel and oils.
- packaging, e.g. paper, plastics and wood.
- waste metals; and
- cleaning activities, e.g. polluted water from plant and vehicle washdown

# 9. Ecological Protection

## 9.1. RESPONSIBILITIES

9.1.1 Implementation and monitoring of Habitat and Species Protection Plans will be the responsibility of the Environmental / Ecological Clerk of Works (ECoW).

9.1.2 The ECoW is appointed and employed by the *Employer*, the appointment being subject to approval by the Planning Authority after submission of details of qualifications and experience. The role and duties of the ECoW are further detailed in Section 9.5 below.

9.1.3 The *Contractor* is required to comply with all control measures detailed within any Habitats or Species Protection Plans.

## 9.2. HABITAT AND SPECIES PROTECTION PLANS: DEFINITIONS, COVERAGE AND SCOPE

9.2.1 Species protection may be defined as the set of measures used to minimise the risk of disturbance, injury, or death to species of nature conservation interest. Particular attention is paid to species protected under EC and/or UK legislation.

9.2.2 Habitat protection may be defined as the set of measures used to minimise the risk of damage or destruction to the terrestrial and aquatic habitats in proximity of the site.

9.2.3 The generally applicable and best practice protection and mitigation measures to be applied at the site are summarised below. Following receipt of Planning Consent, the relevant habitat and species protection plans will be revised and updated to incorporate site specific requirements as detailed in the EIA Report and stipulated in relevant consent conditions, together with any mitigation requirements identified during post-consent (pre-works) species surveys.

## 9.3. HABITAT PROTECTION PLANS

### Aquatic Habitats

9.3.1 The purpose of the aquatic habitat protection plan is to maintain a high-water quality to support adjacent aquatic habitat used by any existing aquatic species and associated eco systems downstream of the site.

### Terrestrial Habitats

9.3.2 All site working practices will to consider their possible effects on sensitive habitats and soils and mitigate significant negative effects as far as is reasonably possible.

### Habitat Protection Measures

9.3.3 Proposed measures for both aquatic and terrestrial habitat protection are generally as follows:

- Where necessary a buffer zone will typically be maintained between working areas, machinery, and watercourses where possible except at watercourse crossing points (all buffer zones have to be authorised by the ECoW). Buffer zones will be demarcated, where necessary, by the ECoW. The *Contractor* will

discuss and agree the requirement for demarcation with the ECoW and the *Employer* prior to commencement of any works.

- Construction activities around watercourses will adhere to general good practice measures and Pollution Prevention Guidance produced by SEPA. Relevant guidance documents are referenced in Section 15 of this CEMP.
- Pollution prevention measures will be installed and maintained as appropriate, Sections 5 and 6 provide details on pollution control and drainage mitigation measures.

9.3.4 The *Contractor* ensures the protection of habitats as detailed in this CEMP. The *Contractor*:

- Includes information on habitat and species protection and legal requirements in the daily inductions and toolbox talks, in consultation with the ECoW (see Section 9.5).
- Ensures that all staff, contractor's subcontractors and visitors are aware of the emergency response procedures to be followed in the event of a pollution incident.
- Microsites development infrastructure to reduce the damage to sensitive habitats, in consultation with the ECoW, as necessary.
- Makes best use of excavated turf as part of reinstatement procedures (see Sections 12 and 13 (Excavated Materials and Reinstatement).
- Adheres to buffer distances relating to watercourses / lochs / springs and species as detailed in this CEMP and revisions thereof.
- Prevents discharge or run-off of silty or polluted water to ground / habitat / watercourses.
- Consults the ECoW ahead of any clean water discharge to ground / habitat / watercourses.

## 9.4. SPECIES PROTECTION PLAN

### Birds

9.4.1 All bird species are protected by law. All breeding birds encountered within the development area access site or at pinch points are protected.

9.4.2 Under the Wildlife and Countryside Act 1981 (Appendix 1) it is an offence to kill them or damage their nests and eggs. Species listed in Schedule 1 of the Act are specially protected, so that it is an offence merely to disturb them while nesting. Other specially protected species are listed on Annex 1 of the EC Birds Directive, which also prohibits wilful disturbance at the nest. However, if disturbance to the nest of any other bird species without special protection were sufficient to prevent parent birds from incubating their eggs or feeding their nestlings, so that the brood died, this could be regarded as an offence under the 1981 Act.

9.4.3 If construction commences before the end of the breeding season the *Contractor* provides bird deterrence measures prior to the start of the breeding season. If works do not begin until the end of the bird breeding season, the *Contractor* undertakes those checks required.

9.4.4 Specific Species Protection Plans may be required in relation to specially protected species and these will be developed as required on the project prior to commencement of construction.

### Mammals

9.4.5 Pre-Construction measures: (Red Squirrels, Bats, Reptiles)

- If required, the ECoW will make relevant licence applications (e.g. licence to disturb) to NatureScot on behalf of the *Employer* and will oversee and/or undertake related mitigation measures in accordance with any licence obtained.

**9.4.6 Badgers - Pre-Construction measures:**

- Within 3 months prior to commencement of site works (or during the suitable survey period prior to commencement of works) pre-construction checks for badgers will be undertaken by a suitably qualified ecologist, if applicable. Checks will be undertaken within 30m of any proposed construction works, increasing to 100m for any blasting/ piling.
- If badgers are reported, ahead of construction works, the ECoW marks out exclusion zones around any badger setts. These exclusion zones will extend to 30m (or 100m for blasting/ piling) from any sett. No construction activity is permitted within these distances of any badger sett.
- If required, the ECoW will make relevant licence applications (e.g. licence to disturb) to NatureScot on behalf of the *Employer* and will oversee and/or undertake related mitigation measures in accordance with any licence obtained.
- The ECoW maintains a mapped record of checked areas and a log of badger surveys.
- The ECoW provides induction material and Toolbox talks ensuring all staff and visitors on site are aware of the legal obligations, restrictions on site and applicable protection measures / behaviour in relation to badgers.

**9.4.7 Pre-Construction Measures**

- Within 3 months prior to commencement of the development on site (or in relevant suitable species survey season, prior to commencement of works) pre-construction species surveys relevant to those species identified in the EIA Report will be carried out by a suitably qualified and experienced ecologist on behalf of the *Employer*.
- If required, the ECoW will make relevant licence applications to NatureScot on behalf of the *Employer* and will oversee and/or undertake related mitigation measures in accordance with any licence obtained.
- Pre-works survey findings will further inform any additional mitigation measures deemed necessary for the construction works phase. This information will be included in the updated CEMP (post-consent).

## 9.5. THE ECOLOGICAL / ENVIRONMENTAL CLERK OF WORKS (ECOW)

### Background and Term of Appointment

9.5.1 The *Employer* considers it best practice to provide an ECoW for the duration of the construction works, irrespective of whether or not this role is required as part of a Planning Consent.

9.5.2 The ECoW will generally be appointed 3-4 months prior to work commencing on site. The role will be full-time for the duration of the main construction period (construction of infrastructure and associated facilities) and may be reduced to a part time role (2-4

days/week) thereafter subject to *Contractor* performance and general consensus between ECoW, *Employer* and the Planning Authority (where required).

9.5.3 The ECoW will be a member of the Chartered Institute of Ecology and Environmental Management (CIEEM) with suitable experience.

## Overview

9.5.4 The ECoW advises and assists the *Contractor* in avoiding, minimising, and mitigating adverse effects. The *Contractor* consults with the ECoW prior to undertaking specific works as detailed below and considers ECoW advice at all times. The ECoW ensures that records are maintained to support key decisions and advice given to the *Contractor*.

9.5.5 Where the ECoW disagrees with works being undertaken by the *Contractor*, resulting in a breach of planning conditions or measures detailed in the EIA Report and the CEMP, the ECoW informs the *Employer* immediately. On advice of the ECoW the Project Manager / *Employer* may halt the works or parts thereof.

9.5.6 The following are anticipated to represent the main tasks which translate these aspects of the role into action. This list is not intended to be exhaustive and will require modification during the construction period as and when circumstances dictate.

## Drainage Management and Watercourses

9.5.7 The ECoW conducts weekly inspection of site pollution prevention measures (silt fences, settlement ponds, check dams etc) and visually assesses their effectiveness. This includes inspection of water management measures installed by contractors such as excavation pumping and diversion channels.

9.5.8 In advance of works, the ECoW assesses habitats and species on ground that may be affected by drainage management and reviews drainage management proposals and reinstatement works in advance of such works commencing.

9.5.9 In advance of any works near a ditch or watercourse the ECoW surveys the condition of the watercourse and protected terrestrial and aquatic species, using an established specialist if necessary.

## Excavated materials and reinstatement

9.5.10 The ECoW agrees proposals for excavated material storage areas as development proceeds.

9.5.11 The ECoW monitors the condition of excavated material and agrees any required hydroseeding specification, including seed mix and fertiliser quantities, if required, in liaison with NatureScot.

9.5.12 The Client and ECoW will map all areas reinstated using GIS, maintaining this record throughout the construction period and provide electronically to the *Employer* at handover. This will include areas identified as compensatory tree planting, turves, hydro seeded, or still to be seeded within 2 Year defect period,

9.5.13 The ECoW establishes fixed point photography locations for future monitoring, with baseline photographs taken at handover.

9.5.14 The ECoW (or other qualified *Employer's* representative) undertakes a final inspection as described in Section 13.3.

## Ecological Protection Tasks

9.5.15 The ECoW erects and maintains markers and notices for limits around the project boundary, exclusion zones and other areas with protected species or habitats; the ECoW also considers requests and granting of permission to enter within any habitat and protected species exclusion zones established at the site.

- The ECoW conducts weekly checks for protected species and sensitive habitat (e.g. drainage systems, stored excavated material and watercourses) within and adjacent to construction areas, and maintains a register of all habitat inspections carried out.
- The ECoW implements any species and habitat protection plans and checks compliance with control measures detailed therein. The ECoW also executes the terms of any Licence to Disturb which might be required.

## On-site communication and liaison with Consultees

9.5.16 The ECoW will always inform the *Employer's* Project Manager and *Contractor* of areas of particular concern, who will then make a decision as to the subsequent action.

9.5.17 The ECoW is involved in the delivery of biodiversity-related Toolbox Talks as part of the site induction process. All staff will know of the circumstances when the ECoW should be contacted, and the relevant phone numbers.

9.5.18 The ECoW liaises with the statutory consultees as required and agreed with the *Employer* in line with any Planning Authority requirements (if applicable).

## Meetings and Recording

9.5.19 The ECoW attends a weekly (or fortnightly, if agreed) meeting which will include representatives from the *Employer*, *Contractor*, sub-contractors. The purpose of these meetings is to:

- review the effectiveness of mitigation / controls as construction progresses in the context of ecological and environmental mitigation.
- discuss construction programme for the following week / fortnight look-ahead and agree actions on these matters.

9.5.20 The ECoW keeps a record of the following:

- animal sightings and signs (including birds, in addition to other site ornithological monitoring), particularly those noted in searches one or two days in advance of construction.
- weekly checks on the effectiveness of silt and pollution prevention measures.
- the habitats of ground to be developed via survey at least a week in advance of construction work.
- record of tasks carried out, key decisions and written record of all verbal advice given.

9.5.21 The ECoW maintains a **GIS database** of key recordings made during the construction period. Field records will use, if necessary, differential GPS technology captured into a field GIS system.

9.5.22 The ECoW assists the *Employer* with the supply of relevant information for compliance assessment.

9.5.23 The ECoW provides monthly reports throughout the construction period. On completion of construction works, the ECoW produces a final report to the *Employer* documenting the environmental and ecological effects of the construction period. The evidence for effects will be based on findings included in the minutes of weekly/fortnightly meetings, together with other recording information maintained by the ECoW. The report will relate results to residual effects predicted in the site's EIA Report documents. The report will be made available to the *Contractor* and the Planning Authority.

# 10. Forestry Works

10.1.1 Tree clearance works are required as part of the proposed development and requirements for the works will be detailed in a separate method statement to be provided by the Contractor.

10.1.2 Any type of forestry works has the potential to affect protected species, e.g. nesting birds, red squirrels and bats.

10.1.3 For the extent of feeling works, and restocking proposals, refer to Appendix (TBC) (Woodland Site Visit Report 2024)

## 10.2. GENERAL FELLING CONTROL REQUIREMENTS

10.2.1 Forestry operations are undertaken in accordance with the Forests and Water UK Forestry Standard Guidelines, 2017, published by the Forestry Commission.

10.2.2 Tree felling operations will be undertaken by a qualified tree felling/forestry contractor and their subcontractors (if applicable).

10.2.3 The forestry contractor will liaise with the Employer to ensure that any protected species and/or sensitive habitats have been considered prior to commencement of the works, and appropriate mitigation measures have been agreed.

10.2.4 All access and egress points for the forestry contractor will be as agreed with the Contractor. For all road vehicles all normal highway rules will apply on all routes, at all times. Traffic management will normally be under the control of the Contractor. Where there are localised site traffic risks associated with tree felling operations, traffic management will be set up by the forestry contractor in consultation with the Contractor.

10.2.5 The forestry contractor should provide details of the harvesting and extraction subcontractor and the timber haulage subcontractor (if applicable) prior to commencement of forestry works to the Contractor and the Employer.

10.2.6 The tree felling contractor, and their subcontractors will be familiar and comply with the Pollution Prevention and the Environmental Incident and Emergency Response measures as detailed in the CEMP. The Principal Contractor will ensure that subcontractors are familiar with the contents of the relevant CEMP sections.

10.2.7 Large scale machinery will not operate within 20 m of sensitive watercourses or watercourses feeding the wider aquatic environment. Within these areas if felling is required, it will be undertaken manually or with small scale machinery to minimise disturbance to watercourses or water dependent habitats. To reduce the likelihood of soil and water contamination biodegradable chain oil will be used in harvesting machinery over the whole site. All forestry machines on site will carry an oil spill kit specially compiled for forestry operations.

10.2.8 The forestry contractor provides spill kits and plant nappies to prevent pollution from fuelling operations. All plant regularly checked for fuel and oil leaks, at least once a day. Re-fuelling activities will comply with the Pollution Prevention and the Environmental Incident and Emergency Response measures.

## 10.3. FORESTRY WORKS

10.3.1 Forestry operations pose a potential risk to the water environment from nutrient enrichment due to soil disturbance and decomposition of forest products (brash) and silt laden runoff, hydrocarbon may occur.

10.3.2 The Contractor is responsible for tree felling associated with the development. The Contractor employs a competent forestry contractor to undertake all felling works and associated tasks (e.g. harvesting, forwarding etc).

10.3.3 Forestry Works – pre-construction: Due to the lack of a wind-firm edge adjacent to the proposed tree clearance area, it is recommended that tree clearance works are extended to an area of 1.9ha to include all trees up to the strip of open ground to the north. The wet woodland to the north of the open ground, and the strip of native broadleaves between the conifer stand and the public road should be retained.

## 10.4. GENERAL REQUIREMENTS

10.4.1 At least 2 months prior to the commencement of the forestry felling operations, the Contractor obtains risk assessments and method statements from the forestry contractor and ensures that these address relevant requirements as detailed in this CEMP (in particular Sections 5, 13 and 15).

10.4.2 At least 2 months prior to the commencement of the forestry felling operations, the Contractor provides to the Employer (for submission to the Planning Authority) the forestry contractor's detailed drainage management plan for the site which identifies any requirements for attenuation of surface water runoff and related mitigation.

10.4.3 The Contractor ensures that the ECoW are given at least 2 weeks' notice prior to any felling works being undertaken. The Contractor ensures that relevant sensitive areas as identified by the ECoW or ACoW are demarcated / fenced off in accordance with the ECoWs specifications. The Contractor provides fencing / demarcation materials and installs them in accordance with the ECoW instructions.

10.4.4 The Contractor ensures that the required mitigation as identified in the drainage management plan is implemented in accordance with the plan.

10.4.5 The Contractor ensures that the forestry contractor adheres to the following:

- All tree removal operations will be undertaken in accordance with the UK Forestry Standard (UKFS) Guidelines for General Forestry Practice including Forests and Water, Forests and Soil, Conservation, Forests and the historic environment and the Pollution Prevention Guidance produced by SEPA.
- Tree felling operations will be undertaken by a qualified tree felling/forestry contractor and their subcontractors (if applicable). Trees on site will be felled and extracted by purpose-built forestry plant or motor manual chainsaw operatives.
- All access and egress points for the forestry contractor will be as agreed with the Contractor. For all road vehicles all normal highway rules will apply on all routes, at all times. Traffic management will be under the control of the Contractor. Where there are localised site traffic risks associated with tree felling operations, traffic management will be set up by the forestry contractor in consultation with the Contractor.
- The forestry contractor liaises with the Contractor, the Employer and the ECoW to ensure that any protected species and/or sensitive habitats have been considered

prior to commencement of the works, and appropriate mitigation measures have been agreed.

- The forestry contractor provides details of the harvesting subcontractor and the timber haulage subcontractor prior to commencement of forestry works to the Contractor and the Employer.
- The Contractor ensures that the tree felling contractor, and their subcontractors will be familiar and comply with the Pollution Prevention and the Environmental Incident and Emergency Response measures as detailed in the CEMP. The Contractor will ensure that subcontractors are familiar with the contents of the relevant CEMP sections.
- To reduce the likelihood of soil and water contamination the Contractor ensures that the forestry contractor uses biodegradable chain oil in harvesting machinery over the whole site. All forestry machines on site will carry an oil spill kit specially compiled for forestry operations.
- The Contractor ensures that the forestry contractor provides spill kits and drip trays to prevent pollution from fuelling operations. The Contractor requires the forestry contractor to regularly check all plant and vehicles for fuel and oil leaks, at least once a day. The Contractor ensures that the re-fuelling activities of the forestry contractor comply with the Pollution Prevention and the Environmental Incident and Emergency Response measures (Sections 5 and 15).

# 11. Land use and Public Access

## 11.1. PUBLIC ACCESS

11.1.1 A draft Outdoor Access Plan has been prepared – **Volume 4, Appendix 16.1: Draft Outdoor Access Management Plan**. This details how existing public access would be managed during the construction and operation of the Proposed Development.

# 12. Excavated Materials

12.1.1 In advance of each main phase of works, the *Contractor* (in consultation with ECoW, and other specialists where required, provides a method statement detailing expected volumes, material classification, storage and reuse procedures for the excavated materials anticipated from that particular work area. This includes information on soil types, volumes, storage areas and a management / reinstatement scheme including:

- plans showing the details of soil stripping and excavation at the site and the storage and proposed use and replacement of topsoil and subsoil.

12.1.2 The assessments undertaken to support the Development contains information on expected soil types and rock volumes requiring excavation and reuse as part of the construction works. The *Contractor* utilises this information and any additional investigation findings post-consent when planning the works.

12.1.3 The *Contractor* liaises with SEPA on all aspects of waste management, if required, to ensure compliance with all appropriate regulatory controls prior to and during construction works.

## 12.2. CLASSIFICATION OF EXCAVATED MATERIALS

12.2.1 Excavated soils and rock are a definite requirement for reinstatement onsite in landscaping and re-profiling works and in order to minimise visual impacts and facilitate habitat and ecological restoration.

12.2.2 Classification of excavated materials depends on their status and identified re-use in reinstatement works. In order to ensure compliance with relevant waste legislation, excavated materials will require to be classified onsite

12.2.3 When defining excavated materials suitability for reuse, the *Contractor* considers the material classes defined in Chapter 2 of the Management of Extractive Waste (Scotland) Regulations 2010. Any material that is not immediately suitable for a predetermined use without the requirement for treatment (e.g. dewatering) is classed as waste and requires to be dealt with in accordance with the *Contractor's* Site Waste Management Plan.

## 12.3. EXCAVATION ACTIVITIES

### General

12.3.1 The *Contractor* creates, and maintains, an **Excavation Register**, which is updated weekly and details the location and extent of all open excavations and the current and original location of all stockpiled material. The *Contractor* makes this available to the *Employer* upon request.

12.3.2 The *Contractor* pays special attention to the risk of slope instability and follows the advice and guidance of the Geotechnical Engineer. The *Contractor* ensures that under all conditions, the ground surface stability is fully maintained both during and post-construction.

12.3.3 The *Employer* undertakes sufficient additional studies and intrusive Site Investigations, where required, to establish the prevailing ground conditions across the Development and the likely ground conditions following completion of the construction work. This includes geotechnical and geo-environmental investigations, hydro-

geological and hydrological investigations, or other assessments to ensure that the ground conditions are fully documented and integrated into the infrastructure design.

12.3.4 The *Contractor* undertakes the excavation of soils in such a manner as to avoid cross contamination between distinct horizons. The different soil horizons are kept and stored separately for use at a later date.

## 12.4. HANDLING AND TEMPORARY STORAGE OF EXCAVATED MATERIALS

### General

12.4.1 During and after excavation, the *Contractor* plans the storage, haulage and reuse of excavated material to minimise material movement around the site. Where possible, immediate reuse is preferable to temporary storage.

12.4.2 Stripped materials will be carefully separated and stored in appropriately designed and clearly defined, separate stockpiles.

12.4.3 Distinct horizons of material will be stored in separate stockpiles where applicable. Stockpiles will be formed avoiding excess consolidation during placing and with naturally stable side slopes. Turves must be stored turf side up and must not be allowed to dry out.

12.4.4 Where material is not required for immediate reinstatement, temporary storage may be required. To minimise handling and haulage distances, where possible excavated material will be stored local to the site of excavation and / or local to the end–use site where it is required for re-profiling, reinstatement, or ecological restoration purposes (e.g. areas allocated for restoration in the Development's Habitat Management Plan). The *Contractor* agrees storage location(s) with the ECoW and Geotechnical Engineer prior to commencement of main phase of works. The storage location will be subject to scrutiny against known constraints, e.g. sensitive habitats and archaeological features.

12.4.5 Temporary storage locations will be appropriately located and designed to minimise impact to sensitive habitats and species, prevent risks from material instability and runoff into watercourses.

12.4.6 Stockpiles will be isolated from any surface drains and stored away from watercourses, unless otherwise agreed with the ECoW. Stockpiles will include appropriate bunding to minimise any pollution risks where required.

12.4.7 The *Contractor* ensures that the handling of the stored material is kept to a minimum and appropriate drainage, pollution prevention and material stability measures are designed prior to the temporary deposition of the material, ensuring material is maintained in a suitable condition for future use.

# 13. Reinstatement

### General

13.1.1 The *Contractor* undertakes all reinstatement works associated with the Development. Reinstatement works are those undertaken during construction and aim to redress any damage inflicted on the landscape as part of the construction works.

13.1.2 Where practicable, reinstatement and re-profiling of excavated materials will be undertaken as the work front progresses, or as soon as is practical following substantial completion of discrete works areas. Early reinstatement and re-profiling are encouraged to minimise visual impact, reduce requirements for temporary storage / stockpiling of soils and to promote reestablishment of vegetation as early as possible.

13.1.3 Temporary drainage, not within permanent design / required for longer term drainage management of site infrastructure, can be retained to manage clean water runoff.

13.1.4 All aspects of the development incurring disturbance from the construction works shall be subject to reinstatement.

13.1.5 Where feasible, to prevent erosion via scour from runoff and facilitate vegetation re-establishment, any down-slope embankments will be graded such that the slope are shallow-tapered and there is a gradual transition with the surrounding / existing ground profile. The *Contractor* avoids the creation of steep, unvegetated slopes. Where these are entirely unavoidable, the *Contractor* incorporates suitably designed erosion protection measures in consultation with the Geotechnical Engineer. The *Contractor* avoids the introduction of any synthetic liners, unless deemed unavoidable from a safety or engineering integrity perspective.

13.1.6 The *Contractor* maintains comprehensive records of the location, depth and volumes of all materials used in reinstatement, including photographic evidence.

13.1.7 Prior to completion, the *Contractor* removes every piece of litter or waste and cleans the site to a state equivalent to which it was originally found, including the reinstatement to original condition of grassed areas where applicable and other natural vegetation, gates, fences, and other property affected by the temporary or permanent works.

13.1.8 Any accidental damage or other construction effects are repaired and reinstated or restored by the *Contractor* to the *Employer's* satisfaction and in accordance with the Planning Consent and any agreements prior to taking over by the *Employer*.

## 13.2. REGENERATION

13.2.1 Where reseeding is required, the approach must be agreed with the ECoW.

13.2.2 Where there are insufficient turves for top dressing, hydro-seeding may be an acceptable method of vegetation reinstatement. The *Contractor* submits proposals for re-seeding, including seed mixes (as specified by the ECoW) and application methods, to the *Employer* and ECoW for acceptance. The *Contractor* ensures that selection, approval, and procurement of seed mix is undertaken in a timely manner (e.g. in the summer prior to a seed application the following spring) to ensure that seed application is undertaken as early as feasibly possible following ECoW recommendation.

13.2.3 In areas disturbed by construction activities, the *Contractor* is responsible for the success of the regeneration measures, including reinstatement, re-vegetation / hydro-seeding etc. post-construction.

## 13.3. REINSTATEMENT MONITORING

13.3.1 Throughout the construction period the ECoW records the location of reinstatement undertaken.

13.3.2 Within three months of completion of works in any area, the ECoW inspects the *Contractor's* reinstatement efforts to determine satisfactory placement of sub-soil, topsoil, and turves. The ECoW makes recommendation to the *Employer* and *Contractor* for additional effort, e.g. re-seeding.

13.3.3 The *Contractor* undertakes remedial works if the ECoW determines that initial reinstatement is sub-standard or unlikely to deliver required vegetation establishment within at least one growing season. Furthermore, the ECoW records any areas where bare soil prevails and where preferential drainage pathways have been created or are likely to form post construction. The *Contractor* ensures that such areas are adequately protected from scour and sediment mobilisation that could potentially overwhelm the permanent drainage. The *Contractor* designs and implements appropriate protection measures.

13.3.4 The ECoW (or other qualified *Employer*'s representative) undertakes a final inspection of all reinstated areas at the end of the first growing season following completion of reinstatement. The *Contractor* undertakes remedial works within the two-year defects period if the final inspection finds that the establishment of vegetation is not satisfactory. Examples of unsatisfactory vegetation establishment may include failed turfs due to poor reinstatement practices or drying out, slow or poor natural regeneration due to inadequate topsoil / subsoil resource, or injurious weeds are evident.

# 14. Environmental Incident and Emergency Response

## 14.1. GENERAL REQUIREMENTS

14.1.1 The *Contractor* prepares a detailed Environmental Incident and Emergency Response Plan (EIERP) in line with GPP21 and GPP22.

## 14.2. SEARS AND ENVIRONMENTAL AUDITING

14.2.1 SSE Safety and Environmental Awareness Report (SEAR) is required to be completed for any potential or actual environmental incident or emergency which occurs or is noted on site. Blank SEAR forms will be provided by SSE Renewables.

## 14.3. SUMMARY SHEET FOR MACHINERY / PLANT OPERATORS

14.3.1 The *Contractor* provides a 1-page Summary Sheet containing the key information for incidents response to be used as a quick reference for any on-site personnel witnessing an incident. A laminate copy of this Summary Sheet will be located with all plant / machinery / on-site vehicles.

14.3.2 A **Communication Plan** (to be followed in the event of a spillage) will be provided by the *Contactor*, in liaison with relevant stakeholders and will be provide to the *Employer*, according to the Contract provisions, prior to commencement of the site works.

14.3.3 Key Information to be provided to the Project Manager and/or the ECoW within 30 minutes of an incident (irrespective of the scale / severity of the incident):

- E.g. What substance was spilled.
- Approximate volume and time of spillage.
- Accurate Location of spill (GPS or grid reference if possible, or bridge ID/number referenced on map etc).
- All measures taken.
- Help required i.e. manpower, machinery, expert advice, disposal, etc; and,
- Whether the spill has reached a watercourse.

# 15. Reference Documentation

### SEPA

- SEPA Guidance for Pollution Prevention (GPPs) & Pollution Prevention Guidelines (PPGs):
  - GPP 1 Understanding your environmental responsibilities – good environmental practices
  - GPP 2 Above ground oil storage tanks
  - PPG 3 Use and design of oil separators in surface water drainage systems
  - GPP 4 Treatment and disposal of wastewater where there is no connection to the public foul sewer
  - GPP 5 Works and maintenance in or near water
  - PPG 6 Working at construction and demolition sites
  - PPG 7 Safe Storage – The safe operation of refuelling facilities
  - GPP 8 Safe storage and disposal of used oils
  - GPP13 Vehicle washing and cleaning
  - PPG18 Managing fire water and major spillages
  - GPP21 Pollution incident response planning
  - GPP22 Dealing with spills
  - GPP26 Safe storage - drums and intermediate bulk containers
  - Duty of Care for waste, SEPA

### British Standards Institute (BSI):

- Code of Practice for Earth Works, BS6031:2009
- Code of practice for noise and vibration control on construction and open sites. Noise, BS5228-1: 2009.

### CIRIA Publications:

- Control of Water Pollution from Construction Sites – Guide to Good Practice (SP156)
- Control of Water Pollution from Construction Sites – Guidance for Consultants and Contractors (C532)
- Control of Water Pollution from Linear Construction Projects – Technical Guidance (C648)
- Control of Water Pollution from Linear Construction Projects – Site Guide (C649)
- Culvert Design Guide, C689, CIRIA, 2010.
- Environmental Good Practice – Site Guide (C650)
- The SUDS Manual (C753)
- Site Handbook for the Construction of SUDS (C698)

### Additional Relevant Guidance

- Institute of Environmental Management and Assessment (IEMA) Practitioner Series No.11: Waste Management: A Guide for Business in the UK, September 2008.

- WRAP (Waste & Resources Action Programme): http://www.wrap.org.uk/construction/tools_and_guidance/site_waste_2.html
- www.wasteonline.org.uk
- www.wasteawarescotland.org.uk
- www.defra.gov.uk/Environment/waste/

## Regulations

- The Water Environment (Controlled Activities) (Scotland) Regulations 2011 (as amended) ("CAR").
- The Water Environment (Controlled Activities) (Scotland) Regulations 2011, A Practical Guide, SEPA, Version 7.1, March 2014.

# 16. Checklist – Required *Contractor's* Information

16.1.1 The information listed in the **Table 2** below will be provided by the *Contractor* to the *Employer* according to the provisions of the contract, as indicated.

**Table 2: Required *Contractor's* Information**

| **Pre-commencement of works:** | **Yes / No** |
|---|---|
| Name and CV of nominated and appropriately qualified person for site based single point of contact for all environmental matters (Section 1.2) | |
| Communication Plan (Section 16.3.2) | |
| Risk Assessment & Method Statements (Section 3.3) | |
| Schedule of toolbox talks (Section 4.2) | |
| Environmental Risk Map (Section 4.1.4) | |
| A Site Waste Management Plan (SWMP, Section 1) | |
| Details of proposed waste contractors and site plan showing waste collection / storage points (Section 1) | |
| Drainage Maintenance Register (Section 6) | |
| Watercourse crossing plans and CAR licences/authorisations (Section 8) | |
| Excavation / Reinstatement plans (Section 14 and 15) | |
| Environmental Incident and Emergency Response Plan (Section 16) | |

| **During and post-completion of works:** | **Yes / No** |
|---|---|
| Records of relevant communication, meetings, and reports (Section 3) | |
| Records of site inductions and toolbox talks (Section 4.2) | |
| Records of communication with SEPA, NatureScot (Section 3) | |
| Environmental Risk Map (updated, Section 4) | |
| Records of all environmental checks/inspections (Section 5 and 7) | |
| COSHH documentation (Section 5.4) | |

| During and post-completion of works: | Yes / No |
|---|---|
| Site Waste Management Plan with estimated and actual waste volumes (Section1) | |
| Drainage Maintenance Register (Section 6) | |
| Records of water quality monitoring (Section 7) | |
| Excavation Register (Section 14) | |
| Records of borrow pit reinstatement (Section 15) | |
| Reinstatement and Re-Profiling Plan (Section 15) | |

16.1.2 Note: The above list only relates to requirements of this CEMP. As part of the Contract, other information provisions will be required from the *Contractor*

# Part 2: Outline Construction Method Statements (CMS)

# 17. Construction Method Statement

## 17.1. GENERAL

17.1.1 The following sections describe the general methods of construction which are stipulated in the *Employer's* Civil Technical Requirements generally included in the Civils Work Contract forming the basis for the *Contractor's* detailed design.

## 17.2. WORKING HOURS AND NOISE

17.2.1 Standard working hours would generally be between 07.00- and 19.00-hours Monday to Saturday, and 07.00 to 16.00 hours on Sunday with some key periods within the programme requiring 24 hours working. In the event of work being required outwith standard hours, e.g., abnormal load deliveries, commissioning works or emergency mitigation works, the Local Authority would be notified prior to these works taking place, wherever possible.

17.2.2 Any plant and equipment normally required for operation at night (23:00 - 07:00), e.g. generators or dewatering pumps, shall be silenced or suitably shielded to ensure that the night-time lower threshold of 45 dB, $L_{Aeq,night}$, as defined in BS5228, shall not be exceeded at the nearest noise-sensitive receptors.

## 17.3. PLANT AND EQUIPMENT

17.3.1 The works shall be undertaken in strict accordance with the Provision and Use of Work Equipment Regulations "PUWER" (as amended) covering all types of plant and equipment found on construction sites.

17.3.2 All site operatives will be appropriately trained and experienced and hold certification of training achievement issued by CITB or other construction industry approved schemes.

17.3.3 Best practicable means of reducing noise emissions from plant, machinery and construction activities, as defined in BS5228 will be employed.

17.3.4 A non-exhaustive list of plant that may be utilised during the construction activities detailed in this Construction Method Statement is as follows; 360° tracked excavators, tipper trucks, dumper trucks, tractor dozers, vibratory rollers, ground ripping plant, mobile crushers and screeners.

# 18. Site Access Construction

## 18.1. SIGNAGE

18.1.1 Sufficient signage will be employed on site, for both site personnel and the public, to clearly define the boundary of the works where they coincide with areas accessible to the public.

# 19. Onsite Preparatory Construction

## 19.1. INTRODUCTION

19.1.1 Onsite preparatory construction concerns the formation of the Temporary Construction Compound (TCC), laydown areas and associated works required to establish the site offices, welfare facilities and storage arrangements for materials, plant, and equipment in connection with the development construction phase.

19.1.2 The TCC is a temporary work for the duration of the construction phase of the project. Following commissioning, the TCC shall be dismantled and all plant, welfare facilities and equipment removed from the site.

19.1.3 The main TCC will comprise of site offices for the Principal Contractor, and any other sub-contractors, project support staff (i.e. the ECoW ) and *Employer*, together with all the necessary welfare facilities for the workforce.

19.1.4 If required, imported crushed rock will be used to construct the temporary construction compound (and the access track to the TCC), to allow a safe compound (with working welfare) to be established prior to excavation works commencing.

19.1.5 The *Contractor* and any subcontractors will be familiar with, and take account of, the planning conditions relevant to the construction works and the requirements of the CEMP prior to construction work commencing.

19.1.6 Prior to the works commencing at site, a pre-condition survey of the existing tracks and associated field boundary features (fences, walls, and gates) will be undertaken by the *Contractor* in conjunction with the *Employer* and landowners, where appropriate, to visually record the existing conditions. This will entail the preparation of a Pre-condition Survey Report, which will include text, diagrams and photographs clearly referenced to the locations at site.

## 19.2. TEMPORARY CONSTRUCTION COMPOUND PREPARATION

19.2.1 The *Contractor* designs and constructs an area of hardstanding, as specified in the Civil Works Information, of sufficient load bearing capacity, as the construction compound(s). Where appropriate a geo-textile layer is used to maximise the effectiveness of stone removal when the compound is removed.

19.2.2 The compound(s) include all Site accommodation and welfare facilities, bunded fuel tanks and other liquid storage areas with segregation, bunded refuelling areas, general and protected storage areas, vehicle parking, security, lighting and services, communications and laboratory/testing or holding facilities, signage, pedestrian and vehicular circulation routes, and safety barriers. The *Contractor* provides recycling facilities at the Site compound and professional collection thereof.

19.2.3 The compound(s) are free draining with oil interceptors and contain a bunded area for maintaining vehicles and plant, or other pollution control measures, as appropriate / required to protect existing water courses and private water supplies.

19.2.4 The typical construction activities associated with the TCC are detailed below:

- Stripping of any topsoil and careful stockpiling of this material as per CEMP requirements.
- Excavating the remaining superficial soil materials and stockpiling of this material on the surrounding undisturbed area in accordance with CEMP requirements.

- Installation / construction of temporary surface water drainage in accordance with CEMP requirements.
- Laying and compacting crushed rock in layers to form a hardstanding. Crushed rock material will have a low fines content to reduce the risk of sediment contamination.
- Delivery of offices, mess area, toilets, and associated infrastructure on flat bed lorries.
- Erection of offices, mess area, toilets, and installation of all bunded areas to contain generator and fuel stores.
- Erection of fencing around the perimeter of the main TCC.
- Following the completion of all construction activities, the TCC shall be reinstated according to the methods set out in the CEMP.

19.2.5 Welfare facilities will be provided for site operatives under the Construction (Design and Management) Regulations 2015 including sanitary conveniences, washing facilities, drinking water, changing rooms and accommodation for clothing not worn during working hours and rest facilities.

19.2.6 Toilets during the construction phase will be chemical toilets located on suitable ground and in discussion with SEPA. The waste will be emptied on a regular basis by a registered waste disposal contractor. Toilets will be located within the TCC areas.

19.2.7 Potable water will be either supplied via a private water supply (PWS) or imported to site. The water will be used for messing purposes during the construction phase.

19.2.8 If additional water is required to be impounded and / or abstracted from site water bodies for site-based activities (i.e. dust suppression, etc), the CAR Regulations apply, and advice will be sought from SEPA (where necessary) prior to any abstraction.

19.2.9 The duration of the works may extend into winter months. If required, external lighting will be required to be provided at the TCCs. Lighting columns will be erected in proximity to security gates and any site offices / welfare facilities and stores. Compound lighting shall face inwards to reduce light pollution and environmental impacts.

19.2.10 All areas of the site including accommodation areas shall be kept clean and tidy with a regime of good housekeeping established to facilitate mobility of personnel and plant/equipment around the site and eliminate potential hazards and environmental pollution.