Technical Appendix 3.1

Outline Construction Environmental Management Plan

This page is intentionally blank.

Outline Construction Environmental Management Plan

Contents

This page is intentionally blank.

1 Introduction

1.1 Purpose of the Document

1.1.1 This document is the Outline Construction Environmental Management Plan (oCEMP) for Hagshaw Energy Cluster -Western Expansion | Phase 1 (the Proposed Development). It outlines best practice methods for managing and controlling the Proposed Development's environmental impacts, including mitigation and monitoring, during construction. The oCEMP has been prepared on behalf of Spirebush Ltd (the Applicant), a company established by 3R Energy.

1.1.2 The oCEMP will be updated and finalised post-consent (thereby becoming a CEMP) in line with all relevant planning conditions in agreement with the Local Planning Authorities (LPAs), the Energy Consents Unit (ECU), NatureScot and the Scottish Environment Protection Agency (SEPA). Once completed and agreed post-consent, the document will become a CEMP and will no longer be referred to as 'Outline'.

1.1.3 The CEMP will form part of the mandatory induction process for all construction employees, contractors and visitors attending the site. All employees and contractors shall familiarise themselves with the content of the CEMP.

1.1.4 This document sets out the minimum standards to be adopted when constructing the Proposed Development. It also provides information about the associated Management Plans which should be read in conjunction with this oCEMP:

- Outline Construction Methodology
- Outline Ecology Management Plan
- Outline Peat Management Plan
- Outline Pollution Prevention Plan
- Outline Noise & Vibration Management Plan
- Outline Dust and Air Pollution Management
- Outline Water Quality Monitoring and Management Plan
- Outline Waste Management Plan
- Outline Archaeology Management Plan
- Construction Traffic Management Plan

1.2 Aims and Objectives

1.2.1 The purpose of this oCEMP is to provide an overview of the potential environmental impacts of the Proposed Development during its construction phase, and describe the management and mitigation measures that will be implemented to minimise impacts and to protect the environment and sensitive receptors both on-site and off-site. As noted above, the measures set out in this oCEMP will be revised and updated as required and included in the final CEMP.

1.2.2 This document has been produced to ensure individuals working on the Proposed Development site know their responsibilities, and to ensure that measures to prevent, reduce or mitigate potentially adverse environmental impacts identified in the Environmental Impact Assessment (EIA) Report are carried out.

1.2.3 The objective of this oCEMP is to provide:

- guidance on compliance with relevant environmental legislation;

- a means of implementing appropriate mitigation measures to avoid or minimise potential adverse environmental effects (refer to **Chapter 16** of the EIA Report for a summary Schedule of Mitigation);
- a working environmental management tool to follow during the construction phase of the Proposed Development;
- definition of roles and responsibilities of the construction team;
- a guide for the interaction with relevant statutory authorities and other relevant stakeholders, including the local community, during the construction phase of the Proposed Development; and
- a basis for monitoring, reporting and maintaining compliance with regulatory requirements for the Proposed Development.

1.2.4 As the Proposed Development has not yet been consented, the final detailed design has not been confirmed and intrusive ground investigation works have not been completed. Therefore, some of the information provided in this oCEMP is necessarily general in nature. Task-specific method statements incorporating the requirements of this oCEMP will be developed by the selected contractors post-contract award, and prior to works starting on site.

1.2.5 This oCEMP is a live document and will remain as such throughout the construction phase. The management strategies and control measures detailed within this document and the associated Outline Management Plans will be reviewed and updated, where necessary, to reflect planning conditions imposed by the ECU, changes introduced by the Applicant's construction team, site-specific outcomes, non-conformances and recommendations arising out of inspections, meetings and audits.

1.3 Roles and Responsibilities

1.3.1 As the Proposed Development is at the application stage, the oCEMP has been developed to provide advisory guidance and describes good construction practices. This is a live document and will ultimately be provided to the contractors appointed to construct the Proposed Development, forming part of the documentation required to ensure compliance with planning requirements, environmental and other legislative requirements, and environmental commitments made in the EIA Report.

1.3.2 The oCEMP takes account of and refers to information contained within the EIA Report.

1.3.3 The oCEMP will form part of the specification and contract for the works that the Applicant will impose on their contractors as contractual obligations.

1.3.4 It is expected that the contractor selected to construct the Proposed Development will further develop this oCEMP with respect to the following:

- task-specific method statements;
- detailed Sustainable Drainage System (SuDS) design;
- requirements for authorisations or licences from SEPA in relation to watercourse crossings and, if applicable, water abstraction;
- Site Waste Management Plan; and
- additional Management Plans as may be required by planning conditions.

1.3.5 The implementation of the oCEMP (including procedures, record keeping, monitoring and auditing) will be overseen by an Environmental Manager who will be appointed by the Applicant.

1.3.6 The Association of Environmental Clerks of Work (AEnvCoW)[1] have been working with UK government and local councils to clarify the role of an Environmental Clerk of Works. The AECoW has issued a position statement which distinguishes between the role of environmental support staff with different responsibilities, recognising the distinction between an Environmental Manager and Environmental Clerk of Works, and the importance of accountability and independence of the latter.

1.3.7 The proposed roles and responsibilities for the construction phase of the project are outlined in **Table 1.1** These will be further defined in the final CEMP.

Table 1.1 – Document Control Table

Responsible Person	Role
Holder of the Consent	The holder of the Consent shall take overall responsibility for the adherence to the CEMP and Consent Conditions.
Development Project Manager (PM)	• Appointing the appropriately qualified principal contractor, Environmental Manager, Ecological Clerk of Works (ECoW) and Environmental Clerk of Works (EnvCoW). • Ensure that the contractors are aware of all specifications and legal constraints pertaining to the project with regards to the environment. • Ensure that all stipulations within the CEMP and consent conditions are communicated and adhered too. • Ensuring adherence to all relevant safety, health and environmental standards. • Ensuring resource allocation for the implementation of the CEMP requirements. • Ensuring that environmental requirements are integrated into project plans, work method statements, tender and contract documents. • Ensuring necessary support to the EM (see below) for Implementation of the CEMP. • Participating in incident investigation (as required).
Environmental Manager (EM)	The EM must be appointed by the principal contractor / Development PM and is responsible for managing the day-to-day on-site implementation of the CEMP. The EM's responsibilities are likely to include but are not limited to: • Be fully conversant with the CEMP and consent conditions. • Approve method statements. • Have overall responsibility for the implementation of the conditions of the CEMP. • Prevent actions that will harm or may cause harm to the environment, and take steps to prevent pollution and unnecessary degradation on site. • Ensure communication of the CEMP requirements to relevant project, contractor and sub-contractor personnel. • Monitor compliance of the CEMP implementation and compliance of all contractors and sub-contractors through weekly internal monitoring checklists. • Facilitate environmental induction of all project staff and either deliver or coordinate delivery of all such training that would be required for effective implementation of the CEMP. • Maintain training records for all project personnel including contractors. • Maintain environmental incidents register. • Report significant incidents internally and externally as required by law and the planning conditions.

[1] https://associationofenvcows.org/

Responsible Person	Role
	• Ensure maintenance of the site document and control.
ECoW	An ECoW will be appointed by the Applicant to monitor, advise and implement all measures to protect ecological interests and comply with ecological mitigation, restoration and enhancement commitments and regulatory requirements. The ECoW's responsibilities are likely to include, but not limited to: • Ensuring compliance against the CEMP and Planning Conditions. • Advising the PM and contractor on ecological / environmental matters during the construction phase. • Monitoring the implementation of the CEMP by the contractor. • Identifying areas of potential improvement during construction. • Undertaking on-going monitoring of the construction through regular site visits and recording key findings.
EnvCoW	An independent suitably qualified and experienced EnvCoW will be appointed by the Applicant to impartially assess compliance against these plans and communicate compliance observations to provide a feedback mechanism for the project. The EnvCoW's responsibilities are likely to include, but not limited to: • Assess compliance against the CEMP, planning conditions and relevant regulatory requirements. • Ensure compliance observations are issued back to the Applicant and the relevant regulatory authorities (if required). • Provide support and advice on implementing the CEMP on site. • Provide support to the Applicant, the PM or the ECoW.
Principal Contractor	The Principal Contractor is responsible for co-ordination the activities of all other parties / contractors working on the site to maintain safe working practices, including: • management and programme control of all design and construction interfaces including those with related contractors; • assuming the role of Principal Contractor under the Construction Design and Management (CDM) Regulations 2015; • meeting the requirements of all relevant planning conditions; • providing security and maintenance for the full development site including but not limited to the site compound during the contract; • providing appropriate welfare and site accommodation for all contractors working on-site; • management of all construction related traffic entering and leaving the site; and • liaison with, in conjunction with the Applicant, all relevant stakeholders and third parties including South Lanarkshire Council (SLC), East Ayrshire Council (EAC), NatureScot, SEPA, Historic Environment Scotland (HES), Scottish Water, relevant landowners and land managers, the Local Roads Authority and the Health and Safety Executive (HSE).
Contractors, sub-contractors & Service Providers	• Managing the construction and operational activities with due care and diligence. • Complying with all elements of the CEMP. • Adhering to any environmental instructions issued by the PM or ECoW. • Ensuring stakeholder interest is report to the EM or ECoW. • Maintaining relevant documentation for review by the EnvCoW.

1.3.8 It is envisaged that environmental management meetings will be held between the PM Manager, ECoW, EnvCoW, the contractor and the Applicant to report on environmental mitigation measures and performance, and to identify actions for improvement where necessary.

1.4 Document Control

1.4.1 As noted, the oCEMP (and the CEMP, when it progresses beyond 'Outline') will remain a 'live' document and will be subject to periodic review and updating. The document is intended for use by the Applicant and their contractors specifically involved in the construction of the Proposed Development. When this document is amended, the document control table will be updated **(Table 1.2)** and it will be issued to all personnel specified on the distribution list below **(Table 1.3)**.

Table 1.2 – Document Control Table

Status	Date Issued	Prepared By	Summary of Alternations
Version 1.0	March 2025	SLR	Outline CEMP

Table 1.3 – Distribution List

Organisation	Contact Name	Email	Telephone Number
Applicant - Spirebush Ltd			
Environmental Manager			
Environmental Clerk of Works (EnvCoW)			
Principal Contractor			
Ecological Clerk of Works (ECoW)			
Archaeological Clerk of Works			
South Lanarkshire Council (SLC)			
East Ayrshire Council (EAC)			
Scottish Environment Protection Agency (SEPA)			
NatureScot			
Historic Environment Scotland (HES)			

2 Outline Construction Methodology

2.1 Introduction and Project Description

2.1.1 The Proposed Development site comprises a total area of c.965 hectares (ha), split into two main development areas:

- Northern development area – The proposed wind turbines are located within the western part of Dungavel Forest, directly to the west and south of the operational Dungavel and Kype Muir Wind Farms, within South Lanarkshire.
- Southern development area – The proposed solar development and long duration battery and energy storage system (BESS) are located on the Netherwood landholding, approximately 1.4 kilometres (km) to the north of Muirkirk in East Ayrshire at its closest point.

2.1.2 Access to the two development areas is proposed to be taken from three existing entrances off the B743.

2.1.3 The Proposed Development is planned to comprise approximately 415 megawatts (MW) of renewable energy generation and energy storage output capacity, consisting of approximately 130 MW wind energy, approximately 60 MW solar energy, approximately 200 MW of long duration energy storage, and approximately 25 MW of short duration energy storage. It should be noted that although the Proposed Development comprises approximately 415 MW of renewable energy, no more than 400 MW will be exported at any one time.

2.1.4 This outline Construction Methodology includes information on the scope of construction works, structure, design strategy, programme and construction methods where available. This will be updated by the Principal Contractor prior to work commencing.

2.1.5 The construction of the Proposed Development will include:

- establishment of the temporary construction compounds;
- construction of site tracks, including construction of drainage, and excavation of cable trenches;
- construction of watercourse crossings;
- construction of wind turbine foundations, and hardstanding areas;
- construction of solar photovoltaic (PV) panels;
- construction of BESS facilities;
- construction of Scottish Power Energy Networks (SPEN) substation and ancillary buildings;
- cable laying;
- erection of wind turbines;
- connection of power, earthing and communication cables;
- commissioning of the site equipment;
- site reinstatement and restoration of temporary works areas; and
- habitat restoration, enhancement and management works.

2.2 Principal Contractor

2.2.1 The Principal Contractor is responsible for co-coordinating the activities of all other parties/contractors working on the site to maintain safe working practices, including:

- management and programme control of all design and construction interfaces, including those with the related contractors;
- assuming the role of Principal Contractor under the Construction Design and Management (CDM) Regulations 2015;

- meeting the requirements of all relevant planning conditions;
- providing security and maintenance for the full development site including but not limited to the site compound during the contract;
- providing appropriate welfare and site accommodation for all contractors working on-site;
- management of all construction related traffic entering and leaving the site; and
- liaison with, in conjunction with the Applicant, all relevant stakeholders and third parties including SLC, EAC, NatureScot, SEPA, HES, Scottish Water, relevant landowners, the Local Roads Authority and the Health and Safety Executive (HSE).

2.3 Programme and Working Hours

2.3.1 The construction programme will consist of the following principal operations, listed generally sequentially although certain activities will take place concurrently:

- tree felling;
- construction of the temporary site compound and establishment of temporary site facilities;
- excavation of stone from on-site borrow pits;
- construction of access tracks and excavation of cable trenches;
- construction of concrete batching plant;
- construction of wind turbine foundations and crane pad hardstanding areas;
- installation of underground cabling;
- delivery and erection of wind turbines;
- construction of solar PV;
- construction of BESS and substation;
- construction of SPEN substation;
- connection of on-site electrical power and signal cables;
- commissioning of site equipment;
- site reinstatement and restoration of temporary works area; and
- habitat restoration, enhancement and management works (will continue into the operational period).

2.3.2 Construction is provisionally expected to last for approximately 24 months. The start date for the commencement of construction will be confirmed at a later date. A detailed construction programme will be provided prior to commencement of works.

Working Hours

2.3.3 The proposed normal construction working hours are anticipated to be prescribed as part of the planning conditions, however as a guide the following times are suggested for activities likely to be audible beyond the site boundary:

- Monday to Friday: 07:00 to 19:00 inclusive; and
- Saturday: 07:00 to 13:00 inclusive.

2.3.4 Some construction activities will be required to take place throughout the different seasons of the year and some construction activities which are highly dependent on the weather conditions will require flexible working hours in order to be completed safely and efficiently. This is particularly relevant to the following activities:

- ground works, road and hardstanding construction (weather dependent);
- wind turbine base concrete pours (time dependent);
- wind turbine deliveries require to be undertaken when the public road network is not busy and to suit the availability of escort vehicles (time dependent); and
- wind turbine erection (time and weather dependent).

2.3.5 These operations will not generate particularly excessive noise at any noise sensitive locations.

2.3.6 Subject to detailed pre-construction intrusive ground investigations, it is not yet clear whether blasting will be required at the site. If blasting is required then restrictions will be put in place ensuring no blasting is undertaken outwith the hours of 10:00 to 12:00 and 14:00 to 16:00 Monday to Friday, and 10:00 to 12:00 on Saturdays. There will be no blasting on Sundays or Bank Holidays.

2.3.7 Should any work need to be undertaken outside of the agreed hours, dispensation will be obtained from SLC and/or EAC prior to the commencement of such works.

2.4 Community Liaison

2.4.1 At the earliest possible stage, the Applicant will actively engage with local residents to discuss the programme of work, learn of any concerns they may have, and determine how the Principal Contractor can minimise the impacts of construction on local residents.

2.4.2 The Principal Contractor will be the first point of contact for any queries and/or grievances regarding the construction of the Proposed Development and will be responsible for:

- Recording all queries and/or issues raised;
- Responding in an appropriate and timely manner,
- Liaising with the planning authority in connection to any complaints; and
- Monitoring any actions that need to be implemented.

2.5 Site Compounds

2.5.1 The Principal Contractor will establish the temporary construction compounds on-site. These will house temporary portable cabin structures to be used as site offices and welfare facilities, including toilets, kitchen and provision for sealed waste storage and removal. The areas will also be used for the storage and assembly of turbine components (northern development area), parking for vehicles, containerised storage for tools and small parts, oil and fuel storage, and (at one of the compounds) a concrete batching plant.

2.5.2 Typically, granular fill material and a compacted capping layer will be laid over geotextile to form the construction compound area and to provide a suitable platform for heavy plant. It is anticipated that potable water will be brought to site for use as drinking water (by bowser). A high-level storage tank will be installed on-site. A suitably sized generator with integral bunded fuel tank will be located within the compound(s) to provide temporary power during the construction period.

2.5.3 Welfare facilities will consist of a mess room, drying room/changing room and toilets provided by the Principal Contractor. Food and drink may only be consumed in the mess room to avoid risk of contamination and to minimise encouragement of rodents. Toilets will be served from the temporary water supply. The waste will be managed by use of sealed storage and removal from site, or by use of a septic tank and soakaway. Any septic tank discharge to the environment will be authorised by SEPA prior to use, in accordance with the requirements of the Water Activities

(Controlled Activities) (Scotland) Regulations 2011 as amended (referred to as the Controlled Activities Regulations, or CAR).

2.5.4 All materials, plant and equipment shall be stored within the site boundaries within designated construction compounds and laydown areas. Storage of liquids (e.g. fuel oil) and spillage mitigation measures are described further in the Outline Pollution Prevention Plan.

2.5.5 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 minimise potential hazards and vermin.

2.5.6 A Site Waste Management Plan (SWMP) will be produced by the Principal Contractor prior to starting on-site. The SWMP aims to minimise waste from imported materials and waste created on-site during the construction and excavation processes. The SWMP will minimise the quantities of imported materials through good design and best practice, minimise waste and optimise any waste arisings.

2.5.7 For the duration of the construction period, an area will be set aside within one or more of the construction compounds to accommodate road vehicles for the construction work force and site visitors. Parking will not be permitted in any other areas, on or off-site. Segregated areas and signage will be erected within the construction compound to protect the workforce from moving vehicles. At the end of the working day, all construction diggers, generators, dumpers and cranes will be parked safely and securely, to minimise vandalism and unwanted attention from members of the public. For certain plant items this is likely to be at the construction compound, however the cranes and potentially some other plant will remain on the hardstandings at work locations so long as adequate security is provided.

2.5.8 Traffic movements on local roads will be managed effectively to minimise the impact to local traffic journeys. A Construction Traffic Management Plan (CTMP) will be developed as part of the CEMP and agreed with SLC and EAC prior to commencement of construction. A wheel wash will be available at the security compound.

2.5.9 The Principal Contractor will ensure the following:

- The footprint of the compound(s) is minimised where possible;
- The compounds(s) will segregate vehicle and pedestrian movements;
- Adequate, clean welfare facilities will be provide for all staff;
- All working areas will be kept in a clean and tidy condition;
- If lighting is required, it will be designed to minimised light pollution;
- Specific smoking areas will be provided with appropriate containers for smoking waste; and
- All fencing, gates and/or hoarding will be inspected regularly and repaired and maintained as necessary.

2.5.10 Prior to occupying the sites for the construction compounds, the Principal Contractor will undertake a survey with the landowner (or landowner's representative) to record the condition of the land prior to entry. This will include a video and photographic record.

2.5.11 As required the Principal Contractor will fence off active working areas of the construction compounds and wider site to prevent members of the public or stray animals from entering the working areas. Any fencing or hoarding will ensure the free movement of wildlife and watercourses. All fencing and hoarding adjacent to public roads will maintain an adequate visibility at junctions. The Principal Contractor will not display or allow to be displayed any advertisement, notice or graffiti on any hoardings or fencing. All temporary hoarding and fencing will be removed following the completion of construction.

2.6 Site Works

2.6.1 Construction Method Statement(s) will be produced by the Principal Contractor and will provide details of all on-site construction works, to be held with the CEMP within the site office, and made available for all site personnel. The sections below provide brief summaries of the key site works for each principal element of the Proposed Development.

Access Tracks

2.6.2 Access to the two development areas is proposed to be taken from three existing entrances off the B743.

2.6.3 The design of the access tracks has been developed to minimise track length, reduce environmental impact, shorten construction time, and minimise road-stone requirement. Subject to confirmation via a planning condition, an allowance has been made for new access tracks to be routed within a micro-siting allowance of up to 100 m, to allow for potentially unsuitable ground conditions or unforeseen environmental constraints identified by pre-construction surveys.

2.6.4 The access tracks shall have a typical average width of 5 m, with local widening on bends, and at junctions. A construction thickness of approximately 250 mm to 500 mm of compacted crushed aggregate will be applied. This will depend on the construction method and ground conditions established once ground investigation works are carried out.

2.6.5 Access tracks will be set out to suit site layout, prior to any removal of vegetation and topsoil using GPS surveying equipment. For founded access tracks, the vegetation and topsoil will then be stripped to formation level ensuring that all turves are stored vegetated side up.

2.6.6 Founded access tracks shall be constructed on the subsoil or on underlying bedrock. Dependent on ground conditions, a geogrid may be utilised to provide structural stability and a geotextile membrane installed to limit the migration of fines. The geogrid/geotextile shall be laid directly on the subsoil.

2.6.7 For founded access tracks, all of the upper topsoil layer, together with turves, will be stored separately from the rest of the subsoil in piles adjacent to, or near the access tracks for later reinstatement. All soil will be stored in accordance with NatureScot guidance - Good Practice during Wind Farm Construction 5th Edition (2024), General principles for reinstatement of soils.

2.6.8 The access track and running surface will then be constructed by tipping and compacting crushed stone to a thickness which allows the required bearing strength to be achieved. This thickness will depend on the underlying ground conditions. The capping layer of stone will comprise finer material to provide a smooth-running surface.

2.6.9 The methodology of construction of the new and upgraded access tracks will be determined following ground investigations and agreed with SEPA.

2.6.10 Edge protection will be installed alongside the access tracks.

2.6.11 Following construction, the appropriate topsoil and vegetation shall be used to reinstate the track shoulders and wind turbine foundation areas. Excess soil, peat and turves will be re-used at suitable pre-determined locations on the site in consultation with the ECoW, avoiding double handling where possible.

2.6.12 Typical access track cross-sections are shown on **Figures 3.16 and 3.17** of the EIA Report.

2.6.13 Aggregates are expected to be sourced from on-site borrow pits. Concrete will be batched on-site.

2.6.14 Sufficient signage will be installed on-site to clearly define the boundary of the works and to advise of any hazardous areas accessible to the public. Secure and appropriate boundaries shall be established to ensure that entry to specific hazardous areas of the site by unauthorised persons is prevented.

Watercourse Crossings

2.6.15 Environmental mitigation measures in line with standard good practice guidelines will be adopted during construction to prevent any pollution of the watercourses across the site.

2.6.16 The proposed site infrastructure requires a total of 16 watercourses crossings, comprising 12 new crossings and four existing crossings which will be upgraded.

2.6.17 The new crossings required for the Proposed Development are anticipated to require registration under the Controlled Activities Regulations.

2.6.18 Further details of the water crossings (existing and proposed) are included in **Technical Appendix 8.1**. of the EIA Report.

2.6.19 A full detailed and updated watercourse crossing schedule will be prepared and included as part of the final detailed CEMP.

2.6.20 During construction, temporary construction SuDS will be put in place at each watercourse crossing to ensure no sedimentation from construction works or pollution from plant or machinery can enter the watercourses. The temporary construction SuDS could be a series of settlement ponds or settlement tanks and silt fences.

Wind Turbine Foundations

2.6.21 Wind turbine foundations are expected to comprise gravity type foundations, however this will be confirmed during the detailed design stage, following pre-construction intrusive site investigation work and specialist geotechnical and civil engineering input. The anticipated construction methodology is described below.

2.6.22 Prior to any excavations, the Principal Contractor will ensure that SuDS are installed to prevent silt pollution to the surrounding area. Once complete, the Principal Contractor will strip and set aside existing vegetation, and strip and stockpile topsoil from the affected area. They will then excavate subsoil and stockpile in accordance with best practice guidance, locating away from drainage paths and buffer zones to minimise the possibility of silt pollution.

2.6.23 Once excavation has been completed to foundation formation level, a layer of compacted crushed stone will be laid to provide a firm working surface. The binding concrete will be placed on this to provide a level work surface for the fabrication of reinforcement cages.

2.6.24 Next the steel reinforcement will be lifted into place and the cages will be established. Following completion of the cages, the Principal Contractor will place concrete shutters and then commence first phase concrete pours. Once the concrete has cured to the specified strength, the shutters will be stripped and set aside for reuse. Electrical ducting will be included within the foundation to ensure cabling is not impeded.

2.6.25 The second phase reinforcement with wind turbine anchor ring will then be installed, followed by the placing of concrete shutters and second phase concrete phase pour. Once the concrete has cured to the specified strength, the shutters will be stripped and set aside for reuse.

2.6.26 The Principal Contractor will then backfill around the foundation from stockpiled materials ensuring materials are replaced in layers encountered during initial excavation. Topsoil will be placed to depths encountered during initial excavation. Turves will then be replaced where possible. Alternatively, the Principal Contractor will re-seed the area with an approved seed mix.

Wind Turbine Works

2.6.27 Wind turbine components will be transported to the site in accordance with the CTMP and route survey review.

2.6.28 Wind turbine component deliveries will be co-ordinated by the wind turbine supplier. Specialist haulage vehicles of varying length, dependent upon the component, will be used. The police will be in attendance to escort abnormal loads.

2.6.29 Delivery of wind turbine components will generally be timed to avoid transportation during peak times, Monday to Friday to avoid school and commuter traffic on the local roads.

2.6.30 Some wind turbine components may be pre-delivered and offloaded at the crane hardstandings or temporary laydown areas. Remaining wind turbine components will be delivered as just-in-time, to be lifted directly from haulage vehicles. This will be dependent on the final wind turbine supplier's method statements.

2.6.31 Adverse weather may delay lifting operations. If this is the case and components cannot be lifted just-in-time, suitable provision will be made for offloading on hardstandings, or laydown areas.

2.6.32 Wind turbine components will be lifted by adequately sized cranes (a large main crane and smaller tail crane) positioned and fixed as per the wind turbine supplier's method statements.

2.6.33 Upon completion of the erection, all anchor bolts will be tightened and the internal fit out of the wind turbine completed. The wind turbines will then be connected to the site's electrical cable network. Wind turbine testing and commissioning will be undertaken by specialist qualified and experienced engineers.

2.6.34 Adequate temporary lighting will be available for use after dark or in poor lighting conditions.

2.6.35 Upon completion of the erection of the wind turbines, the relevant records will be made available in hard copy, for review and incorporation into the Proposed Development's quality plan.

Solar Arrays, BESS and Substations

2.6.36 Equipment for construction of the solar arrays (including PV panels, mounting frames, inverters and transformers, and associated materials) will be delivered to the southern development area (Access Point C as shown on **Figure 3.2** of the EIA Report), site in accordance with the CTMP.

2.6.37 Each PV module will be mounted upon a pre-fabricated alloy metal frame. The module frames will be anchored to the ground via steel piles which will be driven approximately 1.5 m below ground. The PV modules will be fixed to the frame.

2.6.38 Inverter stations and field transformer units will be installed, indicatively as shown on **Figure 3.2** of the EIA Report. The field transformers will be distributed along the access track and each will be placed on a concrete plinth.

2.6.39 Security fencing will be established around the edge of the solar array and BESS areas to prevent unauthorised access. CCTV will be mounted on posts, inside and adjacent to the security fencing.

2.6.40 Equipment for the long-duration BESS will also be delivered to the southern development area via Access Point C (**Figure 3.2** of the EIA Report). Equipment for the short-duration BESS and substations will be delivered to the appropriate access point(s) depending on final confirmation of siting (refer to **Section 3.3** of EIA Report **Chapter 3**).

2.6.41 Details of the design and construction methodology for foundations of the BESS buildings (if applicable) and substations will be determined once a Principal Contractor has been appointed and appropriate pre-construction ground investigations have been carried out.

2.6.42 Construction areas for each main infrastructure element would be fenced as appropriate ahead of construction commencing, to ensure protection from the general public and wildlife.

Maintenance

2.6.43 During construction, the access track network will be subject to regular heavy plant movements and as a result will likely deteriorate, develop potholes or ruts. Any areas which fail, suffer deterioration or rutting during construction will be restored as part of the ongoing maintenance obligation of the Principal Contractor.

Reinstatement

2.6.44 Reinstatement and restoration of the site will be undertaken as soon as practicable following the completion of each element. Following completion of construction works and when most of the heavy plant has left the site, the Principal Contractor shall undertake final restoration works.

2.7 Environmental Training

Inductions

2.7.1 All project personnel and sub-contractors will receive an Environmental Induction. No personnel, including sub-contractors, will be permitted to undertake any work on-site without undertaking a site induction. The site induction will evolve to reflect changes in the CEMP as the project develops. Environmental topics covered in the induction shall include, but will not necessarily be limited to:

- Water Resources;
- Pollution Prevention;
- Emergency Response Procedures;
- Waste Management and Housekeeping;
- Management Structure;
- Duties and Responsibilities;
- Relevant Procedures;
- Ecologically and Ornithological Sensitive Areas and Times;
- Incident and Non-Conformance Reporting;
- Consents, Licences and Compliance;
- Legislation; and
- Environmental Good Practice.

Toolbox Talks

2.7.2 Toolbox Talks (TBTs) on specialised topics shall supplement the induction course. TBTs shall be used to highlight issues of concern and to disseminate any new information or responsibilities. They will also be used as a means of providing basic environmental training to crews on a specialised topic, e.g. water management. The TBTs also offer site personnel the opportunity to provide feedback. TBTs would be appropriate when, for example:

- there is a change to existing legislation, which requires an operational change;
- site inspections or audits have identified corrective actions which require rolling out;
- work is being undertaken in particularly sensitive areas or areas; and
- there are significant changes in environmental conditions, e.g. heavy rainfall.

2.7.3 Records of all TBTs undertaken, including attendance, will be maintained.

3 Outline Ecology Management Plan

3.1 General Best Practice

3.1.1 General mitigation measures that will apply during construction and operation phases are outlined below:

- The Applicant will appoint a suitably qualified ECoW prior to the commencement of any construction activities. The ECoW will be present and oversee all relevant construction activities as well providing toolbox talks to all site personnel with regards to priority species and habitats. The ECoW will also undertake monitoring works and deliver briefings to relevant staff and contractors as appropriate.
- Not more than six to twelve months prior to construction, the ECoW or other suitably qualified ecologist (SQE) will undertake a preconstruction protected species survey to supplement and update the baseline survey information contained within the EIA Report. The aim of this survey will be to provide up to date information in order to finalise required mitigation proposals, in addition to completing a final check prior to construction for protected species. The CEMP will be updated with the latest survey results and management requirements.
- All vehicles will be restricted to 10 miles per hour (mph) whilst within the site.
- Adherence to SEPA Guidance Pollution Prevention (GPP) in respect to working in and around watercourses.
- Plant and personnel will be constrained to a prescribed working corridor, thereby minimising damage to habitats and potential direct mortality and disturbance to species.
- The construction compounds, storage sites and access tracks will avoid, as far as practicable and within micrositing allowances, areas identified as being of ecological value by the ECoW.
- Any trenches dug during construction and decommissioning operations will be covered at the end of each day.
- Alternatively, mammal ramps will be positioned in such a way that trapped mammals may be allowed to escape.
- All exposed pipes and trenches will be checked each morning prior to starting construction activities. If trapped animals are found, the ECoW or specialist animal handler will be contacted to remove any distressed animals.
- Regular ecological toolbox talks will be given to all site personnel on the potential presence of protected species and any measures that need to be undertaken should such species be discovered during construction activities.
- As part of the environmental toolbox talks given to site construction staff, the importance of adhering to speed restrictions and watching out for wildlife and grazing farm stock will be highlighted.

3.2 Habitats

Habitat Management and Enhancement Plan

3.2.1 A Habitat Management and Enhancement Plan (HMEP) will be implemented throughout the site to increase the quality of the remaining habitat and as a result improve the biodiversity of the site. An outline HMEP is provided in **Appendix 7.5** of the EIA Report**.**

Restoration

3.2.2 In order to facilitate restoration, disturbed ground will be restored as soon as practically possible using materials removed during the construction of access tracks, excavation of cable trenches, wind turbine foundations and other infrastructure. To achieve this, any excavated soil will be stored in such a manner that is suitable to facilitate retention of the seed bank. This will aid site restoration and help conserve the pre-construction floristic interest at the site. Access tracks will be allowed to re-seed naturally during operation.

Potential Groundwater Dependent Terrestrial Ecosystems

3.2.3 Potential Groundwater Dependent Terrestrial Ecosystems (GWDTE) identified at the site based on National Vegetation Classification (NVC) survey data have been subject to further specialist hydrological assessment and determined to not be groundwater dependent (refer to EIA Report **Chapter 8** and **Technical Appendix 8.3**). Therefore, no specific mitigation or protective measures for GWDTE are required, however general good practice for protection of the water environment will be implemented as described in **Sections 5** and **8** of this oCEMP.

3.3 Birds

3.3.1 A Breeding Bird Protection Plan (BBPP), to be devised in consultation with NatureScot, will be in place prior to the onset of construction activities. The BBPP will describe survey methods for the identification of sites used by protected birds and will detail protocols for the prevention, or minimisation, of disturbance to birds as a result of activities associated with the Proposed Development. The BBPP will be overseen by the ECoW. The general, good-practice mitigation measures and site-specific measures outlined below will be incorporated into the BBPP.

- Not more than twelve months prior to construction, the ECoW or other SQE will undertake a series of pre-construction ornithological surveys to update the baseline information and provide up to date data in order to finalise the mitigation proposals. This would be in addition to completing a final check prior to construction for protected species (see **Section 3.1** above).
- Recommended disturbance buffers apply for protected bird species at their nest and/or lek sites, with recommended distances outlined by Goodship and Furness (2022) and the Forestry Commission (FCS, 2007). Any disturbance to Schedule 1 species is considered to be a criminal offence and therefore should any nests be identified in pre-commencement surveys, no heavy construction works will take place within the recommended guidance distances for the entire time the breeding attempt is considered active.
- Due to the proximity of the site to the Muirkirk and North Lowther Uplands Special Protection Area (SPA), during the bird breeding season (March–August) any track upgrading work, wider construction activity or use of access tracks by construction traffic occurring within 750 m of the SPA must be undertaken in accordance with the BBPP.
- Further to or incorporated into the update surveys above, protection of breeding bird nests from damage and/or destruction during the breeding season will need to be ensured. Wherever possible, all tree felling and vegetation clearance will occur outside the breeding season (i.e. clearance to be undertaken between September and March, inclusive, and wherever possible between October and February), to ensure that no active nests are damaged or destroyed by the proposed works. This includes any areas of shrub clearance and vegetation removal for access tracks, compounds or turbine bases.
- Given the requirement for felling of plantation forestry as part of works, a specific bird Species Protection Plan (SPP) will be implemented to prevent harm to breeding birds including species such as common crossbill as a result of these works.

- Unnecessary disturbance to habitats will be avoided, by minimising the extent of ground clearance and other construction practices as far as practicable.
- Ecological toolbox talks given to all construction personnel as part of site induction will include information on the potential presence of ornithological species and any measures that need to be undertaken should such species be discovered during construction activities. The toolbox talks will also include the requirement to report and log any bird casualties at the Proposed Development during construction and operation of the site.
- Enhancement measures will be implemented as set out in the outline HMEP (EIA Report **Technical Appendix 7.5**).

3.4 Protected Species

3.4.1 A Species Protection Plan (SPP) will be produced and agreed prior to construction commencing and then implemented during the construction period. The SPP will detail measures to safeguard protected species known to be in the area. This will include the following mitigation:

- Pre-construction monitoring surveys of identified potential otter holts will be carried out to establish the status of the features (natal, non-natal). Where natal holts are identified, a licence from NatureScot for disturbance will be required as elements of the Proposed Development are present within the 200 m disturbance buffer around each potential holt.
- Pre-construction surveys for fish spawning habitat will be carried out at the location of each new water crossing and if possible, crossings will be micro-sited to avoid impacting spawning habitat. Where spawning habitat is identified and cannot be avoided, instream works will need to avoid spawning and incubation periods (October to April).
- Any additional buffers or protective measures identified from pre-works surveys and checks will be put in place prior to and during the construction works.
- Access ramps to be installed each night within any open trench or pit to prevent entrapment of otter and other animals.
- Daily checks of any excavations to be made prior to commencing work to ensure that no mammals have become trapped in the excavations. Should a trapped animal be found, a suitably experienced ecologist will be immediately contacted for advice.
- Any pipes with a diameter of greater than 200 mm which are stored or installed on site must be covered or capped at night to reduce the risk of animals becoming trapped inside.
- Any animals disturbed by site works will be allowed to disperse of their own accord and will not be caught or handled.

4 Outline Peat Management Plan

4.1.1 An Outline PMP is provided as **Technical Appendix 8.4** of the EIA Report. This will be updated to a construction-phase PMP prior to construction commencing, to include additional information gained from detailed intrusive ground investigation works. Details of the updated PMP will be referenced within the CEMP.

5 Outline Pollution Prevention Plan

5.1.1 This outline Pollution Prevention Plan (PPP) details the controls which, in conjunction with the mitigation measures outlined throughout the CEMP, aim to avoid pollution incidence. It also provides details of the measures to be implemented should a pollution event occur.

5.2 Legislation and Guidance

5.2.1 The legislation and guidance relevant to the Outline PPP includes but is not limited to:

- Control of Pollution Act 1974;
- Environmental Protection Act 1990;
- The Environment Act 1995;
- Control of Substances Hazardous to Health Regulations 2002;
- Clean Neighbourhoods and Environment Act 2005;
- Environmental Liability (Scotland) Regulations 2009;
- The Water Environment (Controlled Activities) (Scotland) Regulations 2011 as amended;
- The Water Environment (Controlled Activities) (Scotland) Regulations 2011 – A Practical Guide Version 9.2 (SEPA, 2022); and
- Guidance for Pollution Prevention 21: Pollution incident response planning Version 1.1 (SEPA and wider UK equivalents, 2021).

5.3 Contacts

5.3.1 The following contacts within **Table 5.1** should be contacted in case of an emergency by any member of staff:

Table 5.1 – Emergency Contacts

Contact	Office Hours	Out of Hours	Address
Fire Brigade	01290 661612	999	For Northern Development Area: Strathaven Community Fire Station 23 Hamilton Drive Dungavel ML10 6SW For Southern Development Area: Muirkirk Community Fire Station Toll Service Station Smallburn Road Muirkirk KA18 3RF
Police	01786 289070	999	Cumnock Police Station Ayr Road Cumnock KA18 1EE

Contact	Office Hours	Out of Hours	Address
Ambulance/Hospital	01355 585 000	999	Hairmyres Hospital (A&E) Eaglesham Road East Kilbride G75 8RG
Community Automated External Defibrillator (AED)	N/A	N/A	For Northern Development Area: Bridgelea Darvel Road Strathaven ML10 6QE For Southern Development Area: 41 Main Street Muirkirk KA18 3QR

5.3.2 The following staff in **Table 5.2** should be contacted following any pollution incidence by the site operation staff:

Table 5.2 – Pollution Incidence Contacts

Contact	Office Hours	Out of Hours	Address
Principal Contractor Emergency Response			
Environmental Manager			
Applicant's ECoW			

5.3.3 The following in **Table 5.3** should only be contacted by the Environmental Manager, the Applicant's ECoW or the Principal Contractor's Site Manager as required following a pollution incidence:

Table 5.3 – External Contacts for Pollution Incidence

Contact	Office Hours	Out of Hours	Address
SEPA	0131 449 7296	0800 80 70 60	Silvan House, SEPA 3rd Floor, 231 Corstorphine Rd, Edinburgh EH12 7AT
NatureScot	01463 725000	N/A	Meadowbank House, 6th Floor, South, 153 London Rd, Edinburgh EH8 7AU
Scottish Water	0800 077 8778	N/A	Main Building, 55 Buckstone Terrace, Edinburgh EH10 6XH
Water Management Contractor			
Specialist Clean Up			

5.4 Potential Pollutants

5.4.1 This section of the Outline PPP provides details of the chemicals, products and/or wastes which will be used/created during the construction of the Proposed Development which could potentially cause a pollution incidence. **Table 5.4** will be continually updated throughout the construction period when potential pollutants are identified.

Table 5.4 – Site Chemical, Product and Waste Inventory

Chemical/Product/Waste	State	Maximum volume on Site	Location	Contaminant	Risk
Diesel	Liquid	TBC	Within vehicles	TBC	Flammable
Engine oil	Liquid	TBC	Within vehicles	TBC	Flammable
Hydraulic oil	Liquid	TBC	Within vehicles	TBC	Flammable
Cement	Powder	TBC	TBC	TBC	Irritant
Black water	Liquid	TBC	TBC	TBC	Toxic
Paint	Liquid	TBC	TBC	TBC	Toxic
Cleaning fluid	Liquid	TBC	TBC	TBC	Irritant
Other	TBC	TBC	TBC	TBC	TBC

5.5 Pollution Prevention

5.5.1 Prior to construction commencing, the Principal Contractor will undertake testing of the PPP and will update and amend the PPP as required, with particular focus on:

- all watercourses, springs, boreholes or wells located within or adjacent to the Proposed Development site and the direction of flow;
- site access for emergency vehicles;
- locations of soakaways receiving outflow;
- locations of fire hydrants and spill kits;
- locations for storage of materials; and
- locations of inspection points, oil separators, and locations suitable for portable storage tanks and/or drain blocking.

5.5.2 No significant quantities of hazardous substances are anticipated to be used during the construction works. However, some fuels and oils will be required to be present on the site.

5.5.3 Hazardous substance stores (including fuel and chemical stores) and stockpiles at risk of spillage / leakage of polluting materials will be provided with above ground secondary containment. Bunded compounds will have an impervious base, which can hold at least 110% of the capacity of the tank or drum it contains to minimise the risk of hazardous substances entering the drainage system or the underlying soils and / or groundwater.

5.5.4 All pipelines and fuelling points will be protected from vandalism and unauthorised interference and will be turned off and locked when not in use. Drip trays will be used when filling smaller containers from tanks or drums to avoid drips and spills from entering the ground or drainage system.

5.5.5 Labels will be used to clearly indicate the contents of containers. There should be no storage of hazardous substances near open water or open drains. All fuel storage and associated pipework will be above ground and located on hardstanding.

5.5.6 Deliveries will be supervised, and spill kits will be available in areas where hazardous materials are used or stored. Any areas used for vehicle washing and / or parked vehicles shall include oil interceptors.

5.5.7 On-site vehicle routing will take into consideration the location of any storage areas to ensure that accidental impact does not occur.

5.5.8 Any temporary stockpiling of materials, if required, will be located away from open water and drains. Drums and barrels would be stored in designated bunded safe areas within the site compound to reduce the risk of silt and pollutants entering the surface water drainage system.

5.5.9 The following mitigation measures will be implemented to limit plant emissions and dust creation:

- All staff will operate plant and vehicles in accordance with the manufacturer's instructions. If possible, filters will be provided on plant anticipated to generate excess emissions. In addition, dust extractors, filters or collectors may be used;
- Cutting, grinding or sawing equipment will be fitted with, or used in conjunction with, suitable dust suppression techniques such as water sprays or local extraction, e.g. suitable local exhaust ventilation systems;
- All plant and vehicles will be turned off when not in use and will not be left idling. The movement of vehicles around the site will be minimised where possible;
- Where possible, construction plant will be located away from the site boundary and from sensitive receptors;
- The Principal Contractor will use enclosed chutes and conveyors, loading shovels, hoppers and other loading or handling equipment and will use fine water sprays on such equipment wherever appropriate; and
- Where reasonable and practical, the Principal Contractor will avoid the use of diesel or petrol-powered plant and will power plant with mains or battery powered generators.

5.6 Pollution Response

5.6.1 The Principal Contractor will hold on-site the following equipment to address a pollution incident:

- absorbents;
- drain mats/covers;
- pipe blockers;
- booms;
- plant nappies;
- drainage trays; and
- pumps.

5.6.2 Prior to commencing on site, all staff will undergo PPP training. This training will cover, but is not limited to:

- legal responsibilities of all staff;
- prevention of a pollution incident;

- response to a pollution incident; and
- location and correct use of response equipment and of PPE.

5.6.3 Details of the staff trained in the pollution incident response will be included within **Table 5.5.**

Table 5.5 – Staff Trained in Pollution Incidence Response

Staff	Training	Date	Date of Training Update

6 Outline Noise and Vibration Management Plan

6.1.1 A Noise and Vibration Management Plan (NVMP) will detail the mitigation measures that will be implemented by the Principal Contractor to minimise noise impacts arising from activities relating to the construction of the Proposed Development.

6.1.2 All noise during construction will be managed under the UK Statutory Instruments and guidance that limit noise emissions of construction plant, including:

- guidance set out in BS 5228-1:2009+A1:2014 which covers noise control on construction sites;
- the powers that exist for local authorities under Section 60 of the Control of Pollution Act 1974 to control environmental noise on construction sites; and
- the adoption of Best Practicable Means (as defined in Section 72 of the Control of Pollution Act 1974).

6.1.3 All sub-contractors of the Principal Contractor will be formally required through contract to comply with the noise mitigation measures outlined below.

6.1.4 The following mitigation measures will be implemented by the Principal Contractor and sub-contractors to minimise noise impacts on noise-sensitive receptors:

- Where it is reasonable and feasible, the quietest construction methods will be used. The Principal Contractor will aim to reduce all noise emissions, regardless of the threshold limits.
- The Principal Contractor will monitor construction activities at regular intervals to ensure that appropriate Personal Protective Equipment (PPE) is being used by staff during activities identified by Risk Assessments.
- Site inspections shall be undertaken to ensure that plant is being operated with any specified acoustic covers in place. Any excessively noisy plant will be removed from the Proposed Development site for repair or maintenance.
- Local hoarding, screens or barriers will be erected as necessary to shield particularly noisy activities, where assessments deem this to be required or appropriate.
- Plant and equipment:
  - All equipment will be switched off when not in use (including during breaks and down times of more than 30 minutes).
  - The Principal Contractor will ensure that, where possible, noisy plant will not be used simultaneously and/or close together to avoid cumulative noise impacts.

- Any compressors brought onto site will be silenced or sound reduced models fitted with acoustics enclosures.
- All pneumatic tools will be fitted with silencers or mufflers.
- All plant items will be properly maintained and operated according to manufacturers' recommendations in such a manner as to avoid causing excessive noise.
- All plant will be sited, where practicable, so that the noise impact at nearby noise-sensitive receptors is minimised.
- If required, fixed plant will include a noise mitigation scheme to ensure that noise limits are achieved. Where practicable, and required, noise from fixed plant and equipment will be contained within suitable acoustic enclosures or behind acoustic screens.
- Fixed and mobile plant used within the site during the construction period shall not incorporate bleeping type warning devices that are audible outside the site boundary, unless required for health and safety reasons and no other practical alternative is available.

- Traffic and deliveries:
  - Where possible, loading and unloading will be undertaken away from residences.
  - The majority of deliveries will be programmed to arrive during normal working hours only.
  - Care will be taken to minimise noise when unloading vehicles.
  - Construction traffic will be prohibited from unnecessary idling within the site or at the site access points.
  - Night-time deliveries will be minimal and will only be undertaken with special consideration.
  - If blasting is required, for example at borrow pits, then a dedicated method statement for suitable control of blasting noise will be produced.

Noise Complaints

6.1.5 The Principal Contractor's Site Environmental Representative (likely to be the Environmental Manager) will be the first point of contact for any queries and/or grievances regarding the construction of the Proposed Development. They will be responsible for recording all queries and/or issues raised, for responding in an appropriate and timely manner, and for monitoring any actions that require to be implemented.

6.1.6 The Principal Contractor's Site Environmental Representative will be responsible for recording all complaints raised regarding noise, for liaison with the Principal Contractor and construction staff, and for ensuring that appropriate action is undertaken. The Principal Contractor's Site Environmental Representative will also be responsible for responding to the complaint and explaining the actions undertaken to address the complaint. A record of all complaints made and the actions taken will be maintained and will be available to the SLC/EAC Environmental Health Officers upon request.

6.1.7 Should a noise complaint be made to SLC/EAC relating to noise from construction of the Proposed Development, and the SLC/EAC Environmental Health Officer determines that the complaint merits investigation, the Principal Contractor will appropriately investigate and implement corrective actions as required, to be reported back to SLC/EAC.

7 Outline Dust and Air Pollution Management

7.1.1 The following mitigation measures will be implemented throughout the construction period:

- The construction site layout will be designed to locate machinery and dust causing activities away from receptors where possible;
- The Principal Contractor will review the daily weather reports and communicate with the Section Engineers so that works can be planned to minimise effects on sensitive receptors; and
- The Principal Contractor will maintain a water bowser on-site to suppress dust along the access tracks as required. If there is a risk of fugitive dust arising from the site works, water spray systems may be set-up to dampen down the material. The Principal Contractor will ensure an adequate water supply on the site for effective dust / particulate matter suppression / mitigation, using non-potable water where possible and appropriate.

Transportation and Storage of Materials

7.1.2 The following mitigation measures will be implemented to limit plant emissions and dust creation:

- All staff will operate plant and vehicles in accordance with the manufacturer's instructions. If possible, filters will be provided on plant anticipated to generate excess emissions. In addition, dust extractors, filters or collectors may be used;
- Cutting, grinding or sawing equipment will be fitted with, or used in conjunction with, suitable dust suppression techniques such as water sprays or local extraction, e.g. suitable local exhaust ventilation systems;
- All plant and vehicles will be turned off when not in use and will not be left idling. The movement of vehicles around the site will be minimised where possible;
- Where possible, construction plant will be located away from the site boundary and from sensitive receptors;
- The Principal Contractor will use enclosed chutes and conveyors, loading shovels, hoppers and other loading or handling equipment and will use fine water sprays on such equipment wherever appropriate; and
- Where reasonable and practical, the Principal Contractor will avoid the use of diesel or petrol-powered plant and will power plant with mains or battery powered generators.

Construction Plant

7.1.3 The following mitigation measures will be implemented to limit plant emissions and dust creation:

- All staff will operate plant and vehicles in accordance with the manufacturer's instructions. If possible, filters will be provided on plant anticipated to generate excess emissions. In addition, dust extractors, filters or collectors may be used;
- Cutting, grinding or sawing equipment will be fitted with, or used in conjunction with, suitable dust suppression techniques such as water sprays or local extraction, e.g. suitable local exhaust ventilation systems;
- All plant and vehicles will be turned off when not in use and will not be left idling. The movement of vehicles around the site will be minimised where possible;

- Where possible, construction plant will be located away from the site boundary and from sensitive receptors;
- The Principal Contractor will use enclosed chutes and conveyors, loading shovels, hoppers and other loading or handling equipment and will use fine water sprays on such equipment wherever appropriate; and
- Where reasonable and practical, the Principal Contractor will avoid the use of diesel or petrol-powered plant and will power plant with mains or battery powered generators.

Earthworks

7.1.4 The following mitigation measures will be implemented in relation to earthworks:

- Stripping of topsoil will occur as close as reasonably practicable to the period of excavation or other earthworks activities to avoid risks associated with run-off or dust generation;
- Drop heights from excavators to vehicles involved in the transport of excavated material will be kept to the minimum practicable to control dust generation associated with the fall of materials;
- All deposited materials will be compacted, with the exception of peat and topsoil, as soon as possible after deposition; and
- Soiling, seeding, planting or sealing of completed earthworks will be undertaken as soon as reasonably practicable following completion of the earthworks.

Air Quality Complaints

7.1.5 All dust and air quality complaints will be recorded, causes identified, appropriate measures taken to reduce the emissions in a timely manner and the results recorded by the Principal Contractor's Site Environmental Representative. The complaints log will be made available to SLC/EAC's Environmental Health Officer, if required.

8 Outline Water Quality Monitoring and Management Plan

8.1 Introduction

8.1.1 Construction of the Proposed Development will require activities to be undertaken near surface watercourses and/or peat deposits. Surface water will be routed to drainage channels and runoff discharged back into greenfield areas.

8.1.2 This outline Water Quality Monitoring and Management Plan (WQMP) outlines the key issues pertaining to the construction of the Proposed Development and the mitigation measures proposed to reduce potential effects.

Runoff

8.1.3 Surface water runoff containing silt and other sediments, particularly during and after rainfall events, has the potential to enter the watercourses and field drains on and adjacent to the site. Silt and sediment laden surface water runoff is predicted to arise from excavations, exposed ground and any temporary stockpiles. This has the potential to temporarily impact on the water quality and hydrological and ecological function of the receiving watercourse at and downstream of the works in the absence of any mitigation.

8.1.4 Construction of permanent access tracks and hardstanding, and construction-phase movement of vehicles and plant, have the potential to result in soil compaction. This can lead to reduced permeability, increasing the potential for surface water runoff. Reduced permeability could also reduce the flood storage capacity within the site and could potentially lead to localised flooding incidents.

Pollutants

8.1.5 Spills and leaks may mobilise oils, fuels and cement, which have the potential to be carried in surface water. These pollutants could be carried into watercourses, impacting on ecological habitats and freshwater quality. Untreated foul sewage from welfare facilities during construction has the potential to discharge directly into surrounding watercourses unless appropriately managed.

8.2 Migration and Monitoring

Good Practice

8.2.1 The Principal Contractor will abide by the Guidance for Pollution Prevention (GPPs) (SEPA and wider UK equivalents, various dates), including:

- GPP 2: Above ground oil storage tanks (2021);
- GPP3: Use and design of oil separators in surface water drainage systems (2022);
- GPP 4: Treatment and disposal of wastewater where there is no connection to the public foul sewer (2021);
- GPP5: Works and maintenance in or near water (2018);
- GPP6: Working at construction and demolition sites (2023); and
- GPP13: Vehicle washing and cleaning (2021).

8.2.2 The Principal Contractor will abide by all CAR requirements (including the requirement to implement construction specific SuDS where required) and follow the guidance provided in Good Practice during Wind Farm Construction 5th Edition (NatureScot, 2024).

Monitoring

Pre-construction Monitoring

8.2.3 A programme of pre-construction surface water monitoring will be implemented, covering a period suitable to gather baseline data across more than one season (i.e. typically at least six months). Baseline monitoring will involve observations of site conditions, and sampling at specified sample locations on the main watercourses on-site, including locations upstream and downstream of proposed construction works.

8.2.4 Indicatively, the monitoring programme will include testing samples for the following parameters, to be confirmed in a detailed Water Quality Monitoring Plan (WQMP) and agreed with SLC and EAC and relevant consultees prior to commencement of the programme:

- colour;
- pH;
- alkalinity;
- electrical conductivity;
- total suspended solids;
- nitrate;

- total oxidised nitrogen (TON);
- phosphate;
- sulphate;
- dissolved organic carbon (DOC);
- total organic carbon (TOC);
- biochemical oxygen demand (BOD);
- dissolved oxygen (DO);
- turbidity;
- aluminium;
- iron;
- ammoniacal nitrogen;
- manganese; and
- total petroleum hydrocarbons (TPH).

Construction Monitoring

8.2.5 Water quality monitoring will be undertaken monthly during the construction phase, by the Principal Contractor. The Principal Contractor will appoint a member of staff who is appropriately trained in water quality monitoring.

8.2.6 Regular (e.g. daily/weekly) inspections of watercourses close to construction activities will be undertaken by the Principal Contractor to identify:

- pollution risks that are unacceptably high;
- spillages or leakages;
- non-compliance with this CEMP;
- monitoring of over-pumping arrangements if required; and
- incidences of pollution.

8.2.7 The Principal Contractor will be responsible for recording the results of the regular inspections, recommending appropriate actions, and monitoring the implementation and outcome of such actions.

8.2.8 The Principal Contractor will be responsible for reporting to the Applicant if there are unacceptable alterations to the baseline. The Principal Contractor will be responsible for determining the cause of the alteration and implementing appropriate mitigation or changes to practices, to reduce / remove this change, if caused by construction activities.

8.2.9 Details of operational water quality monitoring will be provided within the Operational Environmental Management Plan (OEMP).

8.3 Drainage and Runoff

Operational Drainage Design

8.3.1 A framework for provision of suitable drainage for the Proposed Development is provided in EIA Report **Chapter 8**. The detailed design of the Proposed Development will be incorporate this outline framework and will provide specific, detailed drainage arrangements. The detailed design of the drainage systems will be agreed with SLC, EAC and SEPA prior to construction.

Construction Drainage

8.3.2 All works associated with earth movement or similar processes will be carried out in accordance with the BSI Code of Practice for Earth Works BS6031:2009.

8.3.3 Due to the location of the site, there is a high likelihood of rainfall throughout the year. Site management will check the local weather forecast daily and ensure all staff are aware, in order to maintain pollution control and runoff in periods of rainfall.

8.3.4 If working platforms are required, they will be formed in such a way that surface water drains away from watercourses.

8.3.5 Temporary drainage systems will be used to alleviate localised flood risk and prevent the obstruction of surface runoff pathways. Where required, temporary attenuation ponds will be provided to reduce silted run-off from the access tracks entering watercourses. If flocculants are considered necessary to aid settlement of fine suspended solids such as clay particles, the chemicals used must first be approved by SEPA.

8.3.6 Swales and track drains will be installed and maintained to intercept, collect and treat run-off from access tracks and hardstanding areas of the site and channel run-off to stilling ponds for sediment settling.

8.3.7 Appropriately sized culverts passing under the tracks will not restrict flow and allow smaller watercourses, intercepted field drains and ephemeral streams/surface water flow pathways to pass under the tracks.

8.3.8 The requirement for dewatering will be minimised in all locations by the timely and efficient excavation of the foundation void and subsequent concrete pouring and backfilling.

8.3.9 Access tracks will be kept to the shortest length possible, and tracks will be designed to spread the load of plant and vehicles to minimise soil compaction and therefore potentially reduce surface water runoff.

8.3.10 To avoid unnecessary compaction and disturbance to site soils, working areas and corridors will be established and demarcated, with construction operatives appropriately inducted and trained to avoid work outside the designated work areas.

8.4 Pollution Prevention

8.4.1 Spill kits will be kept in all vehicles, and soakage pads and oil booms maintained in all work areas. This will enable the rapid and effective response to accidental spillages. All construction staff will be trained in equipment use.

8.4.2 All vehicle maintenance, fuelling and washing will be undertaken on appropriate impermeable surfaces away from watercourses in order to minimise the risk of leaks so to soil and surface waters. All construction and plant vehicles will be regularly maintained.

8.4.3 The Principal Contractor will develop a specific method statement to address the transport, transfer, handling and pouring of liquid concrete at foundations.

8.4.4 All operations involving concrete transfer between vehicles, or into vehicles will take place at least 50 m from watercourses or water bodies to ensure cement, unset concrete and grout to not enter the water environment.

8.4.5 Specific measures will be put in place to manage run-off from concrete batching operations. Good practice described in SEPA wat-sg-75 guidance will be followed to isolate, collect, reuse and dispose of run-off from concrete operations. Concrete wash out will be within the construction compound. The Principal Contractor will ensure that this area is regularly cleaned, and the waste disposed. Concrete and wash out liquid will not be discharged into drains or watercourses on site or at compounds. Concrete wash water and waste will be sent off-site to a licensed facility for treatment and/or disposal, in accordance with the Duty of Care for Waste.

8.5 Storage of Fuel/Chemicals

8.5.1 Stationary oil storage tanks, if required on-site, will be located above the 0.5% Annual Exceedance Probability (AEP) (1 in 200 year return period) flood level. Plant and material will be stored in safe areas above the 0.5% AEP flood level where practicable, and temporary construction works will aim to be resistant to flood impacts in order to prevent movement or damage during potential flooding events.

8.5.2 To mitigate potential pollution from chemical-contaminated runoff, all fuels and chemicals will be stored in accordance with best practice procedures. This will include a designated fuelling site at a safe distance from watercourses, and in appropriate impermeable bunded containers or areas. These containers/areas will be designed to capture any leakages, from a tank or associated equipment.

8.6 Untreated Foul Drainage

8.6.1 The welfare facilities will connect to a septic tank (subject to CAR authorisation if applicable) or self-contained storage tanks. The tanks will be emptied and maintained on a regular basis by a suitably licensed contractor.

8.7 Private Water Supplies

8.7.1 To ensure the continued water quantity at the supply, during construction of the Proposed Development infrastructure, a watching brief will be employed at the supply pipework of three private water supplies (PWS) in close proximity to the proposed works. These are: PWS03 (Linburn), PWS08 (Glengavel) and PWS13 (Laigh Hall). Excavations near these PWS will be closely monitored by the onsite EnvCoW. If pipework associated with the PWS is identified this will be marked and a detailed design strategy prepared. This strategy may involve laying the supply pipework beneath access tracks or to redirect the pipework to maintain supply.

8.7.2 To ensure the continued water quality at the supply during installation of Proposed Development infrastructure, water quality monitoring will be undertaken at PWS03, PWS08 and PWS13. Monitoring relevant to these PWS will be included within the WQMP, to be prepared and agreed with EAC and SLC in consultation with SEPA, prior to commencement of construction.

8.7.3 Following the pre-construction monitoring, a baseline monitoring report will be produced and maximum and minimum thresholds for parameters agreed with EAC, SLC and SEPA. Monthly reports will be produced following monitoring throughout the construction phase, including where any exceedances above or below thresholds are noted.

8.7.4 Advance warning of construction works will be provided to PWS03, PWS08 and PWS13.

9 Outline Site Waste Management Plan

9.1 Introduction

9.1.1 The Site Waste Management Plan for the Proposed Development will detail the practices to be put in place to ensure the control of waste on site, in a manner that is not detrimental to the local and wider environment. This encompasses the minimisation of waste and the removal of waste from site where necessary.

9.1.2 The Site Waste Management Plan will identify ways of minimising waste and maximising reuse and recycling of materials, as well as the responsibilities of the Principal Contractor, subcontractors and site team to ensure the Site Waste Management Plan is upheld.

9.1.3 The details of the waste disposal locations and recycling options will be confirmed following the appointment of the Principal Contractor and this outline Site Waste Management Plan will be updated accordingly.

9.1.4 The following benefits will result from the Site Waste Management Plan:

- A reduction in waste being sent to landfill with benefits to the environment;
- A reduction in material purchase, disposal and landfill costs;
- A reduction in vehicle movements on site and in the local area; and
- The introduction of 'best environmental practice' across the site to reduce the impact on local communities.

9.2 Legislation

9.2.1 All waste will be appropriately disposed of at licensed tips and designated sites. The Principal Contractor will abide by relevant legislation including the Control of Pollution Act 1974 and Section 34 of the Environmental Protection Act 1990.

9.2.2 The storage, management and handling of waste will aim to limit impacts and avoid nuisance arising from dust and odour in accordance with the requirements set out.

9.2.3 Any necessary waste management licences or exemptions will be obtained from SEPA prior to construction and the CEMP will be updated to include or refer to these.

9.3 Strategy for Waste Reduction

9.3.1 The Principal Contractor will employ the following strategy to achieve maximum reuse and reduce of landfill waste:

- Sub-contractors will be contractually obliged to cooperate with the Site Waste Management Plan as part of their tender.
- Regular progress meetings will be undertaken between the Principal Contractor and their sub-contractors to discuss waste disposal and recycling opportunities.
- All staff will be encouraged to engage in site inductions and environmental awareness campaigns.
- Waste management will be incorporated into the design process, including planning for high volumes of waste, consideration of suitable manufacturers and appropriate storage measures.
- The Principal Contractor will identify and segregate waste streams.
- The Principal Contractor will reuse and recycle where possible.

- The Principal Contractor will use suitable storage methods for all materials.
- Unauthorised waste disposal will be treated as an environmental incident and the Pollution Incidence Response (refer to Section 4) will be implemented. Under no circumstances will waste material be burned or buried on the Proposed Development site.

Elimination

9.3.2 In the first instance the Proposed Development will aim to avoid the creation of waste. This will be done early in the detailed design stages of the Proposed Development and will have the most significance when reducing waste.

9.3.3 Construction off-site wherever possible will promote the efficient use of materials and reduces the need to store excess or materials not in use. Optimisation and specification of materials will occur at the design stage to standardise the components and ensure low wastage rates.

Reduction

9.3.4 The Principal Contractor will undertake accurate measurement and ordering of required materials, with no factoring for waste to reduce the volume of waste generated during construction. Efficient ordering of materials, such as standardised sizes to reduce on-site cutting, as well as delivery on a just-in-time basis will reduce on-site storage time.

9.3.5 The control of design will also reduce the risk of late-stage changes which would require rework and therefore reduce overall waste.

9.3.6 The Principal Contractor will ensure the effective and appropriate storage of materials to protect against damage and adverse weather conditions. Ensure suppliers have a take-back option for packaging and surplus, as well as good communication to reduce the amount of packaging included in deliveries.

9.3.7 The Principal Contractor will ensure the use of enclosed containers to store waste susceptible to spreading by wind or liable to cause litter. General waste will be removed at frequent intervals and the site kept clean and tidy.

Re-Use

9.3.8 Rubble and concrete can be used as backfill, subsoil in landscaping areas and timber offcuts as temporary form work.

9.3.9 Where possible the Principal Contractor will purchase reclaimed or recycled materials or procure materials from sustainable sources.

Recycling

9.3.10 The Principal Contractor will designate areas or containers for materials such as plastics, timber, steel, general waste, dry recyclables, batteries, aerosols, etc. which can be recycled.

9.4 Development Waste Management Specifics

Waste Storage

9.4.1 All waste will be stored in appropriate designated and labelled containers. These will be covered as necessary to prevent the ingress of water and the escaping of waste, and will be fit for purpose to prevent leaks and spills. The waste streams will not be combined for disposal. Waste will only be disposed of at certified facilities for each type of waste.

9.4.2 It is anticipated that the construction of the Proposed Development will give rise to the following types of waste:

- wood (e.g. fence posts, hoarding);

- domestic (e.g. glass, paper, cardboard, plastics, food, sewage);
- metal (e.g. wire, steel);
- hazardous (e.g. paint, oil, aerosols, batteries); and
- aggregates (e.g. concrete, stone).

Records

9.4.3 The following records will be kept by the Principal Contractor at the Proposed Development site during construction:

- Copies of all relevant permits/licences for both carriers and disposal sites;
- Contact details for all waste carriers and disposal sites;
- Vehicle registration numbers for all waste carriers and routes travelled to and from the Proposed Development site to the waste disposal site;
- Audit reports;
- Recycling receipts (for non-hazardous waste);
- C1 forms (for hazardous waste);
- Trans-frontier shipment documents (for hazardous waste); and
- Description of all waste removed from the site including volume and consignment route number.

Monitoring

9.4.4 The Principal Contractor will implement a weekly monitoring programme to ensure the correct storage, transfer and disposal of waste, which will be audited monthly by the EnvCoW.

9.4.5 As part of the site induction, all staff will be taught the correct disposal methods for waste, including the location of the waste disposal containers, the correct packaging of waste (if appropriate) and what to do should waste be discovered on-site.

9.4.6 Prior to construction the Principal Contractor will visit the waste disposal sites to ensure they are appropriately managed. The Principal Contractor will monitor all waste carriers arriving and leaving the site to ensure that they are fit for purpose and will undertake ad hoc monitoring of the waste carriers in transit.

9.4.7 The Principal Contractor will undertake daily monitoring of the waste storage containers to ensure waste is being disposed of correctly, and if required provide additional training on the disposal of waste.

9.4.8 The Principal Contractor will create a Waste Management Register. This will state the anticipated waste volumes for each waste type, against the created waste volumes.

10 Outline Archaeology Management Plan

10.1.1 A detailed Archaeology Management Plan including the following mitigation measures will be implemented.

10.1.2 An Archaeological Clerk of Works (ACoW) will be appointed to advise on and oversee relevant aspects of the construction works.

10.1.3 Written guidelines will be issued for use by all construction contractors, outlining the need to avoid causing unnecessary damage to known heritage assets. The guidelines will set out arrangements for calling upon retained professional support (e.g. ACoW) should buried archaeological remains of potential archaeological interest (such as building remains, human remains, artefacts, etc.) be discovered during construction activities. The guidelines will make clear the legal responsibilities placed upon those who disturb artefacts or human remains.

10.1.4 Post-felling walkover surveys will be undertaken in the northern development area where construction works necessitate the removal of woodland, to assess the archaeological potential of inaccessible wooded areas of the site.

10.1.5 The Dungavel Hill, cairn (SM 2848), a Scheduled Monument of high sensitivity, is located in the northern development area. No construction works are proposed to take place in close proximity to the scheduled area of the cairn. Notwithstanding this, to ensure that no accidental construction impacts upon the monument occur, the asset and an appropriate buffer will be marked out for avoidance during the construction phase, denoted with fencing or other high-visibility markers. The buffer will remain in place during the construction phase.

10.1.6 The remains of a round cairn (14), an asset of medium sensitivity, are located within the easternmost solar panel array, under 50 m to the west of a proposed access track, in the southern development area. To ensure that no accidental construction impacts upon the cairn occur, the asset and a 5 m buffer around the visible remains of the cairn will be marked out for avoidance during the construction phase, denoted with fencing or other high-visibility markers. The buffer will remain in place during the construction phase.

10.1.7 Archaeological monitoring (watching briefs) will be undertaken during works in areas of heightened archaeological sensitivity or potential, including:

- along the Powbrone Burn, in the northern development area, where numerous prehistoric artefacts have been recovered along route of the proposed access tack and near the site of Turbine 10;
- at the sites of surviving rig and furrow and a field system, assets of low sensitivity, where areas of solar panelling, access tracks, and a bund are proposed, to record the character of the remains and clarify dating via the recovery of possible artefactual evidence; and
- during groundworks for proposed solar panelling (e.g. cable trenching) undertaken in close proximity to the remains of a round cairn, an asset of medium sensitivity.

10.1.8 The exact scope and method of the archaeological works will be agreed with archaeological advisors to SLC and EAC through a Written Scheme of Investigation (WSI) prior to construction work being undertaken. Details of the above-noted sensitive locations are provided in EIA Report **Chapter 10** and will be set out clearly in the WSI.

11 Outline Construction Traffic Management Plan

11.1.1 An outline Construction Traffic Management Plan (CTMP) is provided as **Technical Appendix 11.3** to the EIA Report. Prior to construction, a final CTMP will be prepared to provide details of access junctions, routing plans, and safety measures identifies the traffic management measures required to support the Proposed Development. The measures which will be identified will relate to:

- Traffic Management;
- Abnormal Loads;
- Access;
- Construction Traffic Movements;

- Road Signage; and
- Cable Crossings.

11.1.2 Generic measures will be discussed with SLC, EAC and Transport Scotland and may include:

- the formation of a Traffic Management Group to help advise of progress, issues and feedback public comments;
- measures to ensure the maintenance and condition of public roads, cycleways and public rights of way do not deteriorate due to the construction traffic, including agreement of monitoring arrangements with SLC, EAC and Transport Scotland;
- measures to provide for road safety for the public and construction staff during traffic management works and temporary traffic control measures;
- procedures for driver training (e.g., to protect pedestrians and non-motorised traffic) and appropriate use of technology to remove blind spots;
- procedures to be followed for the temporary or permanent closure or diversion of roads, public rights of way or accesses;
- permitted access routes and accesses for construction traffic;
- procedures to address any highway incidents or vehicle breakdowns relating to construction traffic; and
- monitoring requirements.

11.1.3 Prior to the commencement of the works a full CTMP will be produced in consultation with SLC, EAC and Transport Scotland.

12 Conclusion

12.1.1 The purpose of this CEMP is to ensure that all construction activities carried out at the Proposed Development are in a manner which minimises impact on the environment. This document has been produced to remind individuals working on the site of their responsibilities and to ensure that measures to prevent, reduce or mitigate potentially adverse environmental impacts identified in the EIA and this CEMP are carried out.

12.1.2 The CEMP has been developed to advise of good construction practices and ensure they are adopted and maintained throughout the construction of the Proposed Development. As part of this, a framework for mitigating unexpected impacts during construction has been developed and is detailed within this CEMP.

12.1.3 The CEMP has been prepared to provide assurance to third parties that their requirements and expectations with respect to environmental performance are met, whilst providing a mechanism for ensuring compliance with current environmental legislation and statutory consents.

13 References

British Standards Institute (2009). BS 6031:2009 – Code of Practice for Earthworks.

British Standards Institute (2014). BS 5228-1:2009+A1:2014 – Code of Practice for Noise and Vibration Control on Construction and Open Sites.

CIRIA (2010). Culvert Design and Operation Guide - Report C689F. Available at: https://www.ciria.org/CIRIA/CIRIA/Item_Detail.aspx?iProductCode=C689F&Category=FREEPUBS

Forestry Commission. (2017). The UK Forestry Standard: The Government's Approach to Sustainable Forestry. Available at: https://assets.publishing.service.gov.uk/media/651670336a423b0014f4c5c0/Revised_UK_Forestry_Standard_-_effective_October_2024.pdf

NatureScot (2024). Good Practice during Wind Farm Construction. Available at: https://www.nature.scot/doc/good-practice-during-wind-farm-construction

NetRegs (various dates). Guidance for Pollution Prevention. Available at: http://www.netregs.org.uk/environmental-topics/pollution-prevention-guidelines-ppg-and-replacement-series/guidance-for-pollution-prevention-gpps-full-list/

Scottish Government (2011). The Water Environment (Controlled Activities) (Scotland) Regulations 2011. Available at: https://www.legislation.gov.uk/ssi/2011/209/contents/made

Scottish Government (2009). Environmental Liability (Scotland) Regulations 2009. Available at: http://www.legislation.gov.uk/ssi/2009/266/contents/made

Scottish Renewables, Scottish Natural Heritage, SEPA, Forestry Commission Scotland, Historic Environment Scotland, Marine Scotland Science, AEECoW (2019). Good Practice during Windfarm Construction. Available at: https://www.scottishrenewables.com/assets/000/000/453/guidance_-_good_practice_during_wind_farm_construction_original.pdf?1579640559

SEPA (2010). SEPA Position Statement WAT-SG-25: Engineering in the Water Environment Good Practice Guide - River Crossings. Available at: https://www.sepa.org.uk/media/151036/wat-sg-25.pdf

SEPA (2015). SEPA Position Statement WAT-PS-06-02: Culverting of Watercourses Position Statement and Supporting Guidance v2. Available at: https://www.sepa.org.uk/media/150919/wat_ps_06_02.pdf

SEPA (2021). Supporting Guidance (WAT-SG-75) Sector Specific Guidance: Water Run-Off from Construction Sites. Available at: https://www.sepa.org.uk/media/340359/wat-sg-75.pdf

SEPA (2022). The Water Environment (Controlled Activities) (Scotland) Regulations – A Practical Guide. Available at: https://www.sepa.org.uk/media/34761/car_a_practical_guide.pdf

SNH (2015). Constructed tracks in the Scottish Uplands. Available at: https://web.archive.org/web/20221020132020/https://www.nature.scot/sites/default/files/2022-09/final%20-%20Publication%202015%20-%20Constructed%20tracks%20in%20the%20Scottish%20Uplands.pdf

SNH (2017). Recommended Bird Survey Methods to inform Impact Assessment of Onshore Wind Farms. Available at: https://www.nature.scot/doc/recommended-bird-survey-methods-inform-impact-assessment-onshore-windfarms

UK Government (1974). Control of Pollution Act 1974. Available at: http://www.legislation.gov.uk/ukpga/1974/40/contents

UK Government (1981). Wildlife and Countryside Act 1981. Available at: https://www.legislation.gov.uk/ukpga/1981/69/contents

UK Government (1990). Environmental Protection Act 1990. Available at: https://www.legislation.gov.uk/ukpga/1990/43/contents

UK Government (1995). The Environment Act 1995. Available at: https://www.legislation.gov.uk/ukpga/1995/25/contents

UK Government (2002). Control of Substances Hazardous to Health Regulation 2002. Available at: http://www.legislation.gov.uk/uksi/2002/2677/regulation/7/made

UK Government (2005). Clean Neighbourhoods and Environment Act 2005. Available at: http://www.legislation.gov.uk/ukpga/2005/16/contents

UK Government (2015). The Construction (Design and Management) Regulations 2015. Available at: https://www.legislation.gov.uk/uksi/2015/51/contents/made

Whitfield, D.P., Ruddock, M. and Bullman, R. (2008). Expert opinion as a tool for quantifying bird tolerance to human disturbance. Biological Conservation, 141(11), pp.2708-2717.

This page is intentionally blank.