



Section 10.0 – Landscape Management Plan

Guidance Notes:

As required by section 13.2 of the CoCP a Landscape Management Plan for the construction works has been drawn up. The plan is designed to ensure that disturbance to the landscape is contained within the construction site in order to protect existing landscape elements.

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10.1 Objective

To carry out construction works so that disturbance to the landscape is contained within the construction site in order to protect existing landscape elements such as soils, woodland, trees, hedges, grassland and other habitat.

10.2 Maps showing landscape proposals at each gantry location (removed due to size constraints)

10.3 Plant species and planting mixes to be used and measures to be implemented to provide sufficient stock of specified species and provenance, including details of plant suppliers to be used

Details relating to plant species and planting mixes are presented in Section 10.2 on each of the landscape proposal plans.

Detail of plant suppliers to be confirmed.

10.4 Programme for undertaking planting works

To be completed.

10.5 Measures to be implemented to protect new planting

To be completed.

10.6 Procedures for the inspection, maintenance and management of planting.

These procedures will be implemented in tandem with an approved landscaping subcontractor.

10.7 Procedures to be adopted for the appropriate protection of land adjacent to the construction site

During the continuation of the works a number of different categories of fencing and barriers will be issued for use. This includes palisade and Heras barriers, acoustic barriers and stock proof fencing incorporating timber rails and posts. The appropriate form of barrier will be chosen with respect to the location and general requirements of the area.

10.8 Procedures for the identification, removal, handling, storage and transplanting of any vegetation which is to be imported, reused, relocated or transplanted.

These procedures will be implemented in tandem with an approved landscaping subcontractor. A method statement will be produced and submitted to the Employer for approval.

10.11 Specific Management Plans

The following management plans that form part of the Fife ITS Environmental Management Plan contain information that is relevant to the landscape management plan as detailed.

Dust and Air Pollution Management Plan

- Dust generating activities are to be minimised.
- Site stockpiling of materials shall be designed and laid out to minimise exposure to wind.
- Stockpiles of materials are to be covered, seeded or fenced to prevent wind whipping.



- Where appropriate stockpiles and mounds will be kept away from the site boundary, sensitive receptors, watercourses and surface drains and sited to take into account the predominant wind direction.
- Stockpiles and mounds will be at a suitable angle of repose and avoid sharp changes in shape to prevent material slippage.
- Materials stockpiles will be enclosed or securely sheeted or kept watered.
- Long-term stockpiles, which give rise to a risk of dust or air pollution, will be covered with appropriate sheeting or the surfaces of the stockpiles will be stabilised.
- Deposited materials will be compacted as soon as possible after deposition, with the exception of topsoil.
- Soiling, seeding, planting or sealing of completed earthworks will be undertaken as soon as reasonably practicable following completion of the earthworks.

Geology, Land Contamination and Waste Management Plan

- We will monitor ground water levels and an assessment of soils to be reused will be undertaken to identify any potential risks posed to the water environment from reused soils to be used in embankments.
- Potential sources of contamination, pathways connecting contamination sources and receptors capable of being harmed will be identified, and assessment of the risk of harm to receptors undertaken.

Surface and Ground Water Management Plan

- Storage for hazardous substances should be as per the suppliers' recommendations and should be sited away from sensitive areas of the site. Additionally the storage area will provide containment in the event of the spillage.
- Oil will be stored in dedicated areas. These areas will be specifically designed and constructed to be safe and secure and all reasonable measures will be put into place in order to secure fuel tanks from vandalism.

Ecological Management Plan

- An ecological walkover survey has been completed in advance of site clearance works at specified ITS gantry locations to verify the baseline ecological conditions.
- Clearance of trees/ scrub at Locations 1,4,6,7,10,12 and 20 will be undertaken outwith the bird breeding season and this will therefore avoid any potential conflict with respect to nesting birds.
- Habitat loss and clearance for construction will be limited to the minimum area necessary for works (within the LMA) and site compounds/ access routes will be sited sensitively.
- Caution will be exerted during site clearance and site operatives will be made aware of this requirement through the site induction, method statements, risk assessments and tool box talks.
- Native species of local provenance will be used where replacement planting/ habitat creation is required.
- Where protected species are discovered when work has already commenced on site, work will be stopped immediately in that area and the Site Manager will seek expert advice from SNH and/ or SEPA on how to proceed.
- The Pollution Incident Response Plan will be implemented in the event of a pollution incident.

Agricultural Management Plan

- Careful consideration will be given to the location of soil storage mounds; these mounds will be located where they will not require handling or disturbance until required for restoration or where they would be trafficked by plant or machinery. The excavation design process will be phased to

demonstrate that, where possible, soil stripped from one area of the works would be used directly to restore another area, thereby minimising the need for soil handling and storage. The works design will also demonstrate that adequate provision has been made for soil storage.

- If possible it is preferable that any soil stripping is undertaken in dry weather. Topsoil and subsoil will be stripped and stored separately and in a manner that minimises vehicles trafficking across unstripped areas or storage mounds. Different soil types will be stored in separate, non-overlapping mounds and topsoil will be stripped from any areas used for subsoil storage. Soils will not be stored in any areas which are poorly drained or prone to water-logging. The minimum amount of compaction will be applied when forming soil storage mounds, they will not be driven across. Topsoil mounds will be no greater than 2m in height and subsoil mounds will be no higher than 3m.
- Soils will be replaced in the same layers and proportions as they were stripped. Soil replacement will occur during dry weather and using the minimum amount of compaction. Ripping may be required to minimise the formation of a pan between different layers of soil. Replaced soils should not be driven over by quarry traffic.

Pollution Incident Response

- A team of operatives will be trained in the use of the site spill kits.
- Training will be carried out by the Graham Environmental Manager.
- The **Emergency Contacts/ Reporting Procedure** and **Response Plan** will be displayed on site and communicated to all operatives.
- All operatives will receive awareness training in the procedures to follow in the event of a spillage through regular toolbox talks.
- Arrangements for practising emergency plans through simulated incidents will be carried out as part of the pollution incident training
- We will investigate and document ALL pollution incidents (including Spills, dust, noise pollution etc)

10.10 Landscape Clerk of Works

The Landscape Clerk of the Works for the Fife ITS Project will be Jenni Taylor who is also undertaking the role of ECoW. The LCoW will be onsite at on request from the Contractor. Approval for the LCoW has been sought from the Employer.

10.11 Consultations

We will consult with SNH, relevant local authorities, community councils and adjacent landowners, as appropriate, regarding the landscaping and planting proposals.

10.12 Mitigation of Potential Impacts on the Landscape or Landscape Resources

Graham's will endeavour to put in place planting and other landscape measures as early as is reasonably practicable where there is no conflict with the construction activities or other requirements of the Project.



10.13 Traffic Management

Access to the construction site will be controlled as detailed within the Traffic Management Plan for the Fife ITS Project ensuring minimal disturbance to trees or other mature vegetation.

10.14 Procedures adopted to undertake survey works to record the condition of existing adjacent land which may be used temporarily during construction

In order to ascertain the relevant condition of the adjacent land, detailed photographic survey's have been undertaken.

The precondition surveys were undertaken at least 2 weeks prior to the works activity taking place and were carried out with the cooperation and coordination of the relevant landowner.

10.15 Procedures to be adopted in relation to the provision of accommodation works including a programme for the provision of accommodation works.

The works includes the provision of 1200m of fencing at 36 varying locations as part of the associated accommodation works. These works will be phased in accordance with the stipulations set out by the traffic management plan. Throughout every site location a coherent consultation process will occur with each landowner to ascertain if works would be undertaken that it would benefit the landowner and accommodate the effect of the scheme on their property.

10.16 Procedures to be followed in relation to the stripping, handling, storage and replacement of topsoil on areas of land to be returned to their original use following construction.

Soils are categorised into a number of different sections topsoil, subsoil and overburden. These alternating levels of soil have varying characteristics. It is important to emphasise that these soils with particular emphasis with topsoil, are stripped, stored and replaced with care in order to ensure the eventual satisfactory reinstatement of the site.

The design process will evaluate the volume of soils required to be stripped, handled, stored and ultimately required for restoration. Careful consideration will be given to the location of soil storage mounds; these mounds will be located where they will not require handling or disturbance until required for restoration or where they would be trafficked by plant or machinery. The excavation design process will be phased to demonstrate that, where possible, soil stripped from one area of the works would be used directly to restore another area, thereby minimising the need for soil handling and storage. The works design will also demonstrate that adequate provision has been made for soil storage.

Careful consideration will be given to the location of soil storage mounds at the design stage. Soil storage mounds will be located where they will not require handling or disturbance until required for restoration. A degree of reflection will be given to the location, height, slope and volume of each mound and if the soil mounds will become visually intrusive or form an alien feature within the landscape.

If possible it is preferable that any soil stripping is undertaken in dry weather. Topsoil and subsoil will be stripped and stored separately and in a manner that minimises vehicles trafficking across un-stripped areas or storage mounds. Different soil types will be stored in separate, non-overlapping mounds and topsoil will



be stripped from any areas used for subsoil storage. Soils will not be stored in any areas which are poorly drained or prone to water-logging. The minimum amount of compaction will be applied when forming soil storage mounds, they will not be driven across. Topsoil mounds will be no greater than 2m in height and subsoil mounds will be no higher than 3m.

Soils will be replaced in the same layers and proportions as they were stripped. Soil replacement will occur during dry weather and using the minimum amount of compaction. Ripping may be required to minimise the formation of a pan between different layers of soil. Replaced soils should not be driven over by quarry traffic.

Soils should not be imported into the site for restoration purposes as this may promote the spread of invasive species, in particular Japanese Knotweed.

10.17 Protection of Trees and Vegetation

The unnecessary removal of trees and vegetation will be avoided and trees will be protected in accordance with BS 5837 Trees in relation to construction.

The procurement, movement, handling, storage, planting and maintenance of plant material will be in accordance with the following standards, where appropriate:

BS 3936-1 Nursery stock. Specification for trees and shrubs.

BS 3936-4 Nursery stock. Specification for forest trees, poplars and willows.

Any tree surgery operations will comply with the recommendations in BS 3998 Recommendations for Tree Works, as appropriate.

Tree felling will be carried out taking appropriate consideration of the Forestry Commission's Forest and Water Guidelines 2003 to mitigate risks from felling areas of woodland and trees on the freshwater environment. Where there are no windthrow or landscape visual issues, tree felling will be reduced to that necessary to allow the safe construction and operation of the proposed scheme. Any tree felling operations will consider the legal protection given to roosting bats and breeding birds.

Where individual stands of trees are likely to be affected, an assessment will be undertaken by appropriately qualified specialists and where necessary, appropriate mitigation employed.

Where necessary we will obtain any consents required in relation to tree felling in accordance with the Forestry Act 1967.

10.18 Procurement, movement, handling, storage, planting and maintenance of plant material.

We will undertake the procurement, movement, handling, storage, planting and maintenance of plant material in accordance with the following standards where appropriate;

- BS 3936-1 Nursery Stock. Specification for trees and shrubs.
- BS 3936-4 Nursery Stock. Specification for forest trees, poplars and willows.



10.19 Procedures to be adopted for the reinstatement of any adjacent land which is used temporarily during construction.

In general, access to the site working areas shall be taken from within the existing road network corridor. Access shall be taken through private lands only through prior consultation and agreement with the relative landowner and or occupiers.

Where private access to the road network corridor is required, a photographic and video survey shall be taken prior to taking entry. This survey shall record the level and condition of the land and capture all salient features including but not limited to fences, gates, services, drainage, trees, hedges, etc. A copy of the survey in CD format shall be made available to landowner and/or occupier.

All private land used for access shall be reinstated to former level and condition to the satisfaction of the landowner.

Temporary access to the following site specific working areas is required - G08 Southbound, G11 Northbound and G19 Southbound. All agreements consents are now in place with the relevant landowners and occupiers of these lands.

In addition, as part of the accommodation works under the contract, access to private land is required at G11 Southbound. Positive consultations are concluded and consents are in place with the landowner regarding these temporary accommodation works.

10.18 Monitoring

GRAHAM will implement monitoring procedures in accordance with the requirements of Section 6 of the CoCP relating to storage of materials and Section 9 of the CoCP in relation to protection of the water environment.

GRAHAM will also ensure that the Ecological Clerk of Works will monitor topsoil stripping, handling and storage as appropriate. The Clerk of Works will be proposed to the Employer and approval of this post sought. GRAHAM will undertake monitoring as necessary to maintain security of the site as required to comply with the CoCP.