

M5 Junction 10 Improvements Scheme

Environmental Management Plan

(1st iteration)

TR010063 - APP 7.3

Regulation 5 (2) (q)

Planning Act 2008

Infrastructure Planning (Applications: Prescribed Forms and Procedure) Regulations 2009

Volume 7

December 2023



Gloucestershire
COUNTY COUNCIL

THIS PAGE IS LEFT INTENTIONALLY BLANK

Infrastructure Planning Planning Act 2008

The Infrastructure Planning (Applications: Prescribed Forms and Procedure) Regulations 2009

M5 Junction 10 Improvements Scheme Development Consent Order 202[x]

7.3 Environmental Management Plan (1st iteration)

Regulation Number:	Regulation 5(2)(q)
Planning Inspectorate Scheme Reference	TR010063
Application Document Reference	TR010063/APP/7.3
Author:	M5 Junction 10 Improvements Scheme Project Team

Version	Date	Status of Version
Rev 0	December 2023	DCO Application

Contents

Chapter	Page
1. Introduction and background	7
1.2. Scheme description	9
1.3. Need for the Scheme	10
1.4. Scheme objectives	11
1.5. Scheme location	11
1.6. Scheme programme	13
1.7. Preparatory works	15
2. Roles and responsibilities	17
2.2. Project management organisation	17
2.3. Environmental Management Responsibilities	17
3. Consents and permissions	23
3.1. DCO powers and consents	23
3.2. Consents and Agreements Position Statement	23
3.3. EMP - Management Plans	23
3.4. EMP - Environmental Method Statements	23
4. Register of environmental actions and commitments	24
5. Environmental asset data	25
5.2. Environmental data	25
5.3. Further surveys to be obtained prior to construction	25
6. Maintenance and EMP monitoring	26
6.1. Environmental monitoring requirements	26
6.2. Environmental management systems	26
7. Induction, training and briefing procedures	28
7.1. General	28
7.2. Environmental competencies, training and site induction	28
7.3. Toolbox talks	29
7.4. Criteria for evaluating the effectiveness of training	29
8. References, glossary and annexes	30
8.1. References	30
8.2. Glossary	30
8.3. Annexes to the EMP	31
Annex A. Scheme overview and Environmental constraints maps	33
Annex B. Relevant management plans	36
Annex C. Environmental method statements	37
Annex D. Emergency procedures and records of incidents	38

Annex E. Evaluation of change register	42
Annex F. Final environmental investigations and monitoring reports	43

Tables

Table 2-1 – General site contacts and responsibilities	17
Table 2-2 – Environmental Management Responsibilities	19
Table 7-1 – Environment Training	28
Table 8-1 – Glossary of the abbreviations and acronyms used in this document	30

Figures

Figure 1-1 - Environmental Management Plan Process	8
Figure 0-2 – Scheme overview – showing the permanent footprint of the Scheme and the Order limits for the DCO	11
Figure 1-3 - Location of the Scheme	12
Figure 1-4 - Location of the Scheme elements (M5 Junction 10 Improvements, A4019 Widening, and the Link Road to West Cheltenham), the allocated land areas at West and North-west Cheltenham, and the safeguarded land areas to the west and north-west of Cheltenham. (* Safeguarded land is land which has been identified for development in the future and is protected from conflicting development).	13

Document accessibility

If you need to access this report in a different format like accessible PDF, large print, easy read, audio recording or braille, please get in touch with our team who will do their best to assist.

You can contact us by email on M5Junction10@atkinsglobal.com, leave us a voicemail on 01454 667900 or write to us at M5 Junction 10 Team, Atkins, 500 Park Avenue, Bristol, BS32 4RZ. You can also view Gloucestershire County Council's Accessibility Statement on our website at <https://www.gloucestershire.gov.uk/accessibility/>

1. Introduction and background

- 1.1.1. This Environmental Management Plan (1st iteration) been prepared to support the application by Gloucestershire County Council (GCC) (“the Applicant”) for a Development Consent Order (DCO) to authorise the construction of the M5 Junction 10 Improvements Scheme (“the Scheme”).
- 1.1.2. The purpose of the Environmental Management Plan (EMP) is to provide clear and concise information which states how the mitigation and management of environmental effects will be delivered and maintained through the construction (and operation where relevant) of the Scheme.
- 1.1.3. An Environmental Impact Assessment (EIA) has been undertaken for the Scheme and an Environmental Statement (ES) (application document TR010063 – APP 6.1 to 6.15) has been prepared in accordance with the Infrastructure Planning (Environmental Impact Assessment) Regulations 2017 (the ‘EIA Regulations’). In accordance with the requirements of the EIA Regulations, the ES contains the assessment of the likely significant effects on the environment that may be caused during construction, operation and maintenance of the Scheme and describes proposed mitigation measures.
- 1.1.4. The EMP is based on the preliminary design (Design Fix 3) for the Scheme as described in Chapter 2 – The Scheme of the ES (application document TR010063 – APP 6.2) and presented in the General Arrangement Plans (application document TR010063 – APP 2.9). The EMP contains an appropriate level of detail for this preliminary design stage and has been prepared in accordance with National Highways Design Manual for Roads and Bridges (DMRB) LA 120 Environmental management plans. In accordance with LA 104 Environmental assessment and monitoring, the results of monitoring will be used to update the EMP during construction and handover stages.
- 1.1.5. The EMP (1st iteration) sets out the framework for future iterations of the EMP. In line with LA120 Environmental management plans, three iterations of the EMP will be produced for the Scheme. These are outlined below and also shown in Figure 1-1.
- 1st iteration of the EMP – known formerly as the outline EMP and produced at design stage for the preferred option.
 - 2nd iteration of the EMP – known formerly as the construction EMP. Produced in advance of construction starting, and then refined during the construction stage for the consented project.
 - 3rd iteration of the EMP – known formerly as the handover EMP, building on the construction EMP refined at the end of the construction stage to support future management and operation. This 3rd iteration of the EMP must be submitted to the Secretary of State for approval within 28 days of the opening of the Scheme for public use. The Scheme must be operated and maintained in accordance with the EMP (end of construction).
- 1.1.6. Across its three iterations, the EMP will:
- Link the environmental matters between the design, construction, and operational and maintenance stages of the Scheme.
 - Record environmental risks and identify how they will be managed during the construction of the Scheme.
 - Demonstrate compliance with relevant environmental legislation, policy and good practice.
 - Record objectives, commitments and mitigation measures to be implemented, and set their achievement through the Scheme lifespan.

- Identify key environmental staff and their responsibilities, including communication and training requirements.
- Provide environmental handover information to the body responsible for operational management, including management and monitoring requirements and commitments.
- Provide a review, monitoring and audit mechanism to determine the effectiveness of and compliance with the environmental control measures and how corrective action will take place.

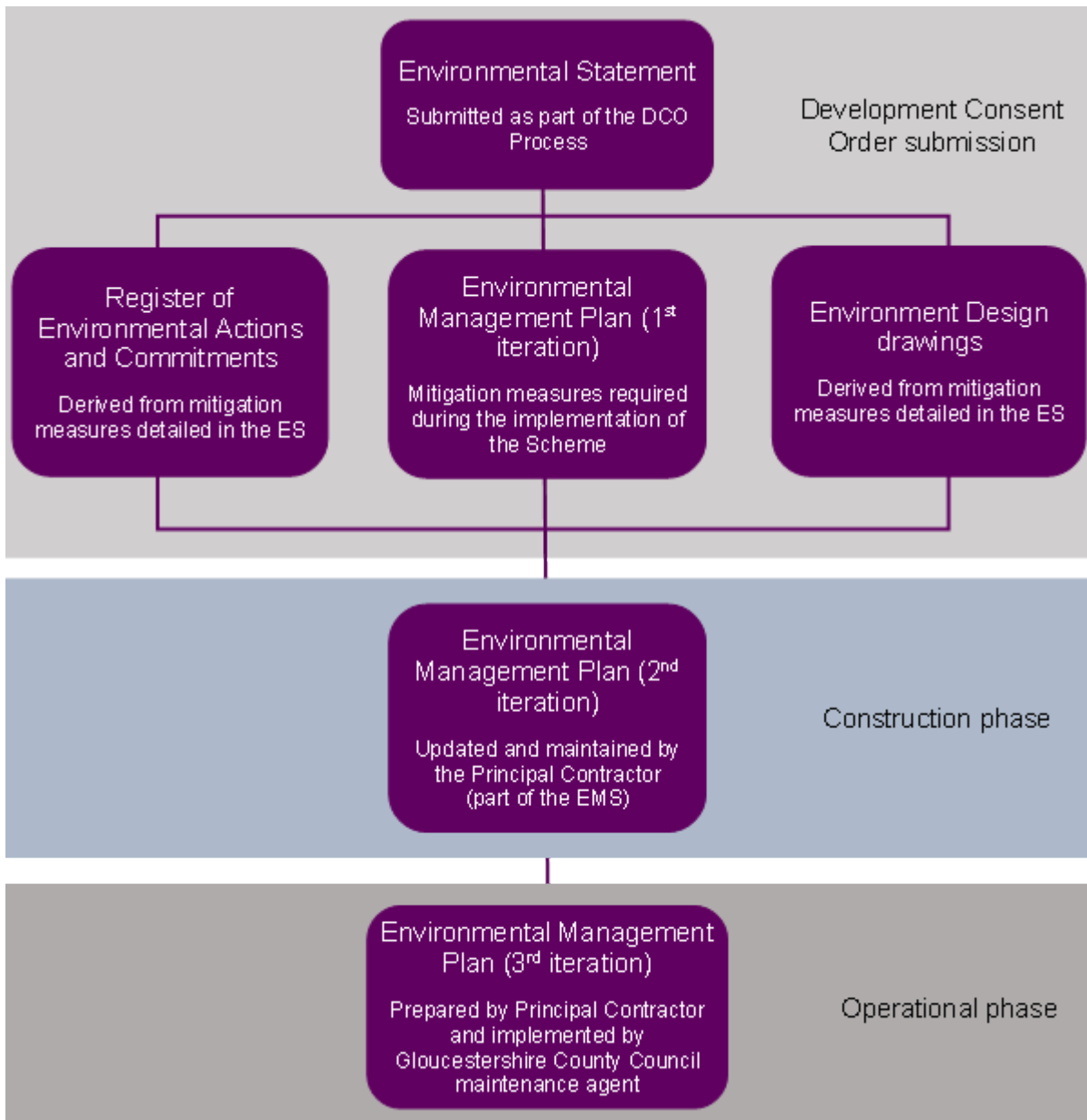


Figure 1-1 - Environmental Management Plan Process¹

¹ Note that the Register of Environmental Actions and Commitments (REAC) document is produced as a separate document (application document TR010063 – APP 7.4). The Environment Design drawings are provided as the Environmental Masterplan (application document TR010063 – APP 2.13).

1.2. Scheme description

1.2.1. The infrastructure works under consideration in this EMP (1st iteration) comprise the following elements which are related to the changes to the strategic road network and together make up the Scheme:

- An all-movements junction at M5 Junction 10 (Scheme element 1).
- A new West Cheltenham Link Road east of Junction 10 from the A4019 (Scheme element 2).
- Widening of the A4019 to the east of Junction 10, including a bus lane on the A4019 eastbound carriageway from the West Cheltenham Fire Station to the Gallagher Junction (Scheme element 3).

1.2.2. These three elements are described below briefly. An overview of the proposed infrastructure improvement elements that make up the Scheme are illustrated in Figure 1-2, with the location of the Scheme relative to the nearest urban areas of Cheltenham and Gloucester is shown in Figure 1-3. The location of the Scheme relative to the strategic allocated sites (two sites) and the two areas of safeguarded land to the west and north-west of Cheltenham as presented in the Joint Core Strategy (JCS) are shown in Figure 1-4. More detail on the Scheme is presented in Chapter 2 of the ES – The Scheme (application document TR010063 – APP 6.2).

M5 Junction 10

1.2.3. The proposed improvements to M5 Junction 10 are to increase the capacity of the junction, and to upgrade the current restricted movements junction to an all-movements junction. To enable travel both south and north on the M5, the two existing Junction 10 sliproads will be removed, and four new slip roads will be constructed, along with two new overbridges to provide access and egress to the M5 in all directions. The existing Piffs Elm Interchange Bridge (carrying the A4019 over the M5) will then be demolished.

West Cheltenham Link Road

1.2.4. The Link Road element of the Scheme comprises a new single carriageway road 1.4km in length, between the B4634 to the A4019, designed to provide greater connectivity between the reconfigured M5 Junction 10 and the West Cheltenham Development Area (shown in Figure 1-4). The Link Road has a segregated cycleway (3m in width) and footway (2m in width) all the way along its west side. The speed limit on the Link Road will be 50mph, reducing to 40mph at the junction with the B4634.

1.2.5. The Link Road crosses predominantly agricultural land. The design of the Link Road includes flood mitigation structures across the floodplain to the north of the River Chelt, and a single span bridge over the River Chelt. The bridge construction will be a single span bridge, crossing the River Chelt at an angle, with the bridge abutments set back from the riverbanks by a minimum of 4m on each side of the river.

A4019 Widening

1.2.6. The A4019 links the M5 Junction 10 to north-west Cheltenham. Currently, the A4019 is a dual carriageway over the M5 Junction, returning to single carriageway east of the junction to serve the turning into Withybridge Lane. The A4019 continues eastwards to Cheltenham as a single carriageway, where it ties into an existing dual carriageway at the Gallagher Retail Park.

1.2.7. The section of the A4019 covered by the Scheme runs from just west of the M5 Junction 10 (at the junction of Stoke Road and the A4019) eastwards through to the existing dual

carriageway at the Gallagher Retail Park (finishing just east of the junction of the B4634 and A4019).

- 1.2.8. As part of the highway improvements incorporated into the Scheme, the A4019 will be widened to a two-lane dual carriageway from Junction 10, eastwards through to the Gallagher Retail Park, where the Scheme will tie into the existing dual carriageway. Widening of the A4019 through Uckington will be predominantly to the southern side of the A4019. Widening to the east and the west of Uckington will be to the northern side of the A4019. To the west of Junction 10 the existing section of two-lane dual carriageway will be replaced with single lanes. Changes will be made to existing junctions along the section of the A4019 that is within the Scheme, and three new junctions will be created.
- 1.2.9. The Scheme will include a segregated cycleway (3m width) and footway (2m width) on the northern side of the A4019, extending from the junction of the A4019 with Stanboro Lane in the west through to the Gallagher junction at the eastern end of the Scheme. This active travel corridor will provide connectivity for pedestrians and cyclists between north-west Cheltenham and the junction of the A4019 and Stanboro Lane (west of M5 Junction 10). It will tie into an existing shared use path at the eastern end of the Scheme, and an existing footway at the western end. The Scheme will also include a bus lane on the eastbound carriageway from the West Cheltenham Fire Station to the Gallagher Junction. The layout and design of these facilities for pedestrians and cyclists is shown in the General Arrangements Plans (application document TR010063 – APP 2.9).

1.3. Need for the Scheme

- 1.3.1. Gloucestershire faces significant challenges to achieve its vision for economic growth. The Joint Core Strategy (JCS) is a partnership between Gloucester City Council, Cheltenham Borough Council (CBC) and Tewkesbury Borough Council (TBC) which sets out a strategic planning framework for the three areas. The Adopted JCS 2011-2031 is a coordinated strategic development plan, adopted in December 2017, which shows how the region will develop and includes a shared spatial vision targeting 35,175 new homes and 39,500 new jobs by 2031.
- 1.3.2. Major development of new housing (c.9,000 homes) and employment land is proposed in the JCS in strategic and safeguarded allocations to the west and north-west of Cheltenham, these being: West Cheltenham (Golden Valley); North West Cheltenham (Elms Park); and safeguard land to the west and the north-west of Cheltenham (all shown in Figure 1-4). The West Cheltenham development, in turn, is linked to wider economic investment, including a government supported cyber business park (Cyber Central UK) adjacent to the Government Communications Headquarters (GCHQ) site in west Cheltenham.
- 1.3.3. The existing M5 Junction 10 only provides access and egress to and from the north, with no connectivity to M5 south; this causes existing traffic to cross Cheltenham through various routes to access and leave the M5 from the south using other M5 junctions. This contributes significantly to existing traffic flows across Cheltenham, with significant congestion at peak times. To unlock the housing and job opportunities, a highway network is needed that has the capacity to accommodate the increased traffic it will generate, within a sustainable transport context.
- 1.3.4. Upgrading M5 Junction 10 to an all movements junction has been identified as a key infrastructure requirement to enable the housing and economic development proposed by the JCS and supported in the Gloucestershire Local Enterprise Partnership's (GFirst LEP) Strategic Economic Plan and the transport network sought by GCC (Host Authority) in the adopted Gloucestershire Local Transport Plan. Improvements to M5 J10 are critical to maintaining the safe and efficient operation of the junction; and enabling the planned development and economic growth.

1.4. Scheme objectives

1.4.1. The objectives for the Scheme are:

- Support economic growth and facilitate growth in jobs and housing by providing improved transport network connections in west and north-west Cheltenham.
- Enhance the transport network in the west and north-west of Cheltenham area with the resilience to meet current and future needs.
- Improve the connectivity between the Strategic Road Network (SRN) and the local transport network in west and north-west Cheltenham.
- Deliver a package of measures which is in keeping with the local environment, establishes biodiversity net gain and meets climate change requirements.
- Provide safe access to services for the local community and including for users of sustainable transport modes within and to west and north-west Cheltenham.

Figure 1-2 – Scheme overview – showing the permanent footprint of the Scheme and the Order limits for the DCO

Figure provided in Annex A of this document.

1.5. Scheme location

1.5.1. The M5 links the Midlands with the South West, running from junction 8 of the M6 at West Bromwich near Birmingham to Exeter in Devon, and linking with the M4 north of Bristol.

1.5.2. Junction 10 (of the M5) is located 76 km to the south of Birmingham, 64 km to the north of Bristol, 8 km to the south of Tewkesbury, 6.5 km to the north-west of Cheltenham, and 12 km to the north-east of Gloucester.

1.5.3. The junction is in a strategically important location for the region, particularly as northern and western Cheltenham are the sites of a number of large retail parks and employment areas, and the location of planned future housing and nationally significant business development.

1.5.4. The location of M5 Junction 10 is shown in Figure 1-3.



Figure 1-3 - Location of the Scheme

- 1.5.5. The locations of the proposed infrastructure improvements that make up the Scheme (and collectively make up the Scheme area), the JCS allocation areas and the safeguarded land to the north-west and west of Cheltenham are illustrated in Figure 1-4.



Figure 1-4 - Location of the Scheme elements (M5 Junction 10 Improvements, A4019 Widening, and the Link Road to West Cheltenham), the allocated land areas at West and North-west Cheltenham, and the safeguarded land areas to the west and north-west of Cheltenham. (* Safeguarded land is land which has been identified for development in the future and is protected from conflicting development).

1.6. Scheme programme

- 1.6.1. The construction of the Scheme is planned to commence in 2025, with the Scheme planned to be open for traffic in 2027.
- 1.6.2. This construction programme is based on the current preliminary design of the Scheme and will be updated by the Principal Contractor (PC) when appointed during the detailed design stage of the development.
- 1.6.3. The main features and proposed phasing of the construction works are described below with further detail provided in the Environmental Statement, Chapter 2 The Scheme (application document ref. TR010063 – APP 6.2).

1.6.4. The main construction works comprise four interlinked and interdependent sections of work. Based on a construction period of April 2025 to December 2027, the construction of these sections is as follows:

- Construction of the new Junction 10 including the junction structures and slip roads (25 months).
 - Phase 1 - Site clearance and preparatory work.
 - Phase 2 - Access tracks, utility diversion and protection.
 - Phase 3 - Earthworks and structures east.
 - Phase 4 - A4019 temporary pavements, comms building retaining wall, bulk earthworks and structures west.
 - Phase 5 - Erect Junction 10 overbridge decks, complete earthworks on north facing slip roads and eastbound A4019 West.
 - Phase 6 - complete north facing slip roads and A4019 alignments and pavement over North Bridge.
 - Phase 7 - Open Piffs Elm North overbridge, demolition and earthworks to construct new westbound A4019 and Withybridge Lane Junction.
 - Phase 8 - Completion of Junction 10 roundabout, A4019 westbound pavement, new slip road pavements.
 - Phase 9 - Open north facing slips, open gyratory, move A4019 traffic onto westbound carriageway east of M5.
 - Phase 10 - Completion of cycleways and footpath, completion of A4019, commission traffic lights.
 - Phase 11 - A4019 and junction 10 fully open, existing A4019 structure demolition.
- Widening and realignment of the A4019 (25 months).
 - Phase 1 - Clearance and preparatory work.
 - Phase 2 - Diversion and protection of utilities.
 - Phase 3 - Earthworks and Drainage to Offline Carriageway and Junctions.
 - Phase 4 - Roadworks, cycleway and footpaths to offline carriageway and junctions.
 - Phase 5 - Complete new east bound carriageway, reconstruct existing eastbound carriageway.
 - Phase 6 - Reconstruct existing westbound carriageway.
 - Phase 7 - Complete central reservation works.
 - Phase 8 - Complete verge works.
- Construction of the West Cheltenham Link Road and associated flood alleviation works (13 months).
 - Phase 1 - Site clearance and boundary fencing.
 - Phase 2 - Pre earthworks drainage.
 - Phase 3 - Topsoil strip.
 - Phase 4 - Install site access and haul roads and construction hardstanding's and River Chelt plant crossing.
 - Phase 5 - SU Diversions where required.
 - Phase 6 - Construct bulk earthworks and structures.

- Phase 7 - Highways drainage.
- Phase 8 - Highways formation and capping.
- Phase 9 - Pavement construction.
- Phase 10 - Vehicle restraint system installation.
- Phase 11 - Verge fill.
- Phase 12 - Verge topsoil.
- New signalised junction between the Link Road and B4634 (18 months).
 - Phase 1 - Installation of traffic management, site clearance and topsoil strip.
 - Phase 2 - Diversion of utilities into the south verge.
 - Phase 3 - Excavation and filling to top of capping level and construction of highway drainage and ducting.
 - Phase 4 - Construction of pavement to the south of the junction and tie-ins to new alignments, completion of all footpaths and cycle ways in southern half of junction, and pavement reconstruction.
 - Phase 5 - Existing eastbound carriageway broken out and earthworks for new alignment, construction of new pavement, installation of permanent road markings, installation and commissioning of traffic lights.

Working hours

- 1.6.5. Construction works will take place mainly during the daytime. Construction works outside of normal construction hours of 07:00 – 19:00 weekdays and 07:00-19.00 Saturdays shall be minimised as far as possible. To maximise productivity within the core hours, contractors would require a period of up to one hour before and up to one hour after core working hours for start-up and closedown of activities. This would include but not be limited to deliveries, movement to and from a place of work, unloading, maintenance and general preparation works. This would not include operation of plant or machinery likely to cause a disturbance. These periods would not be considered an extension of core working hours.
- 1.6.6. Exceptions to these core hours (in addition to the details presented in paragraph 1.6.5) will include, but are not limited to:
- Night-time closures for bridge demolition and installation or other works requiring the full or partial closure of, or otherwise adversely affecting the operation of existing carriageways.
 - Oversized deliveries or deliveries where daytime working would be excessively disruptive to normal traffic operation.
 - The provision of services at compounds, including security and vehicle recovery.
 - Works associated with the diversion of existing utilities.
 - Junction tie-in works.
 - Works associated with traffic management and signal changes.
 - Cases of emergency.
 - Other activities as otherwise agreed by the local authorities.

1.7. Preparatory works

- 1.7.1. If the DCO is granted, GCC may be in a position to commence preparatory works (as part of the DCO) in mid-2025, subject, where appropriate, to the consents and approvals set

out in the Consents and Agreements Position Statement (application document TR010063 – APP 3.3) having been obtained.

1.7.2. The preparatory works delivered under the DCO would consist of:

- Archaeological investigation
- Ground investigation works including trial pits.
- Remedial work in respect of any contamination or other adverse ground conditions.
- Ecological surveys and mitigation works.
- Site set up works (including the erection of temporary fencing and provision of access points), top-soil stripping and stockpiling for access points and compounds. The spatial extent of these site set up works would be limited to those areas identified as construction compounds on the Works Plans (application document TR010063 – APP 2.4), and access points to those compounds from the public highway.

1.7.3. The preparatory works would progress in accordance with the controls set by this EMP. Implementation of the measures described in the EMP will ensure that there are no significant environmental effects resulting from preparatory works taking place.

2. Roles and responsibilities

2.1.1. This EMP has been prepared by environmental professionals as part of the Principal Designer team. The authors are appropriately qualified and have a demonstrable knowledge, experience and competence in the environmental management field. Reference should be made to the competent expert sections given within the relevant ES chapters (application documents TR010063/APP6.1 – 6.15).

Site roles and responsibilities

2.1.2. The site-based roles and responsibilities in relation to environmental management are summarised in Table 2-1 and Table 2-2. The PC will be required to delegate responsibilities to experienced onsite personnel within the key areas of the site. The delegation of responsibilities will be clearly identified within relevant Scheme documents and site files.

2.2. Project management organisation

2.2.1. GCC shall be responsible for overseeing management of the Scheme. GCC and National Highways will delegate some roles and responsibilities to specialist consultants to supervise, monitor or check the PC's method statements, including sensitive activities where required. The key Scheme roles are listed in Table 2-1. Individual names and contact details will need to be confirmed and inserted where applicable by GCC and the PC once appointed and confirmed. To be undertaken as part of the production of the 2nd iteration of the EMP.

Table 2-1 – General site contacts and responsibilities

Role	Organisation	Contact (inc. email and contact number)
Client Project Manager	GCC	to be confirmed (tbc)
Principal Contractor Project Manager	tbc	tbc
Principal Contractor DCO Manager	tbc	tbc
Principal Contractor Environmental Manager	tbc	tbc
Principal Contractor Environmental Clerk of Works	tbc	tbc
Principal Contractor Specialist(s) – Ecology, Archaeology, Landscape etc.	tbc	tbc
Principal Contractor Public Liaison Officer	tbc	tbc

2.3. Environmental Management Responsibilities

2.3.1. The PC is responsible for producing the full EMP once the design and construction plans have been finalised.

2.3.2. GCC, NH, the PC and subcontractors are all responsible for adhering to and complying with the Scheme's environmental policies, relevant environmental legislation, bylaws, and

regulations. It is a requirement that all site personnel will be made aware of their duty of care to the environment and will be provided with adequate training, supervision, or instruction in the form of toolbox talks, site induction modules and specific method statements as necessary.

- 2.3.3. Responsibilities for site environmental management will be delegated to key personnel by the PC. These personnel will be responsible for implementation, reporting and monitoring of environmental mitigation and compliance during the contract period. Where required, environmental specialists will be consulted to provide advice on specific issues or site activities, in consultation with the PC. The key environmental management roles and responsibilities are shown in Table 2-2.

Table 2-2 – Environmental Management Responsibilities

Role	Responsibility
Client Project Manager	Oversee implementation of whole Scheme and the individuals undertaking specific roles and duties. To be reported to as per contract requirements.
Principal Contractor Project Manager	<ul style="list-style-type: none"> Responsible for management of the construction phase of the Scheme. Has overall responsibility for the environmental performance of the Scheme during construction. Ensure all relevant persons in a position of responsibility are suitably trained and competent in environmental matters to implement the requirements of the Client and the contractor. Regular communication with National Highways and the relevant statutory environmental bodies on all environmental matters as required.
Principal Contractor DCO Manager	<ul style="list-style-type: none"> Responsible for overseeing and maintaining the Register of Environmental Actions and Commitments (REAC). Reporting and liaison to the local authorities. Produce and agree a process for implementing the requirements of the DCO with the local authorities. Assessing requirements of changes to the design approved by the DCO. Act as the focal contact for all DCO related queries and requests for information. Provide training and briefings to relevant staff on the implementation of the DCO. Monitor compliance with the DCO requirements. Assist in the review of design and construction methodology changes. Liaise with the PC Planner to enable the efficient running of the construction programme. Work with the PC Public Liaison Officer respond to complaints, community liaison, and stakeholder consultations as outlined in DCO.
Principal Contractor Environmental Manager	<ul style="list-style-type: none"> Principal Contractor Environmental Manager (PCEM) or the delegate shall be responsible for overseeing and maintaining the environmental components and documentation of the Scheme. Ensure the Project Manager is aware of the project specific environmental constraints. Provide support to and ensure the Environmental Clerk of Works (EnCoW) is organised to deliver effective environmental support to operations. Provide support to the Principal Contractor DCO Manager as required. Write, issue and update environmental documentation, including environmental control plans (ECPs).

Role	Responsibility
	<ul style="list-style-type: none"> • Act as the focal point of contact for all environmental issues and identify key environmental concerns as the Scheme develops. • Coordination of environmental specialists to ensure the compliance with the ECPs. • Compliance with environmental legislation, consents, objectives, targets, and other environmental commitments, including those identified within the ES. • Monitor compliance with the environmental requirements of the Scheme. • Assist in the review of method statements, ensuring appropriate consideration of environmental controls. • Compile applications for unexpected authorisations with assistance of the Principal Contractor EnCoW if necessary. • Implement a programme of and perform environmental inspections on site and of environmental management systems, investigating incidents, issuing corrective actions, and monitoring their close out and communication of lessons learnt. • Assist with the delivery of environmental training and collaborate with the Health and Safety team lead to ensure inclusion of environmental aspects within site induction. • Assess and check survey results and update databases, ECPs, etc with new information. • Develop and liaise with Principal Contractor Health and Safety Officer management plans, such as the Emergency Spill Response Plan for incidents on site. • Seek ways to reduce waste, carbon and to improve environmental performance, working to implement best practice and where possible, reduce costs. • Liaise with site supervisors, site management team and site operatives in relation to environmental works. • Liaise with relevant bodies for the application, and implementation of required consents and permits. • Environmental stakeholder management.
<p>Principal Contractor Environmental Clerk of Works</p>	<ul style="list-style-type: none"> • Support the project team in delivering the environmental component of the works during the construction phase. • Maintain records of environmental works and performance, providing updates as required to the PCEM. • Identify and action key environmental concerns on site as the Scheme develops with the support of the PCEM. • Manage the contract specific environmental systems. • Seek ways to reduce waste, carbon and to improve environmental performance, working to implement best practice and where possible, reduce costs. • Support development and deliver environmental training and toolbox talks. • Undertake day to day monitoring and supervision of construction activities in relation to environmental aspects.

Role	Responsibility
	<ul style="list-style-type: none"> • Monitor environmental compliance on site, including compliance with the requirements of the DCO. • Assist in monthly formal audits with the PCEM. • Assess and check survey results and update databases, ECPs, etc with new information. • Input and review site specific method statements to ensure appropriate consideration of environmental controls. • Monitor dust, noise vibration and hours of working to ensure they meet accepted limits in consultation with the relevant Environmental Health Officer. • Immediate reporting of incidents to PCEM and the Safety, Health and Environment (SHE) department. • Monitor and oversee onsite compliance with all consents and permit requirements. • Coordination of environmental surveys. • Communication of environmental practices, constraints, requirements and controls. • Liaise with site supervisors, site management team and site operatives in relation to environmental works. • Support PCEM with relevant bodies for the application, and implementation of required consents and permits.
Principal Contractor Specialist(s)	<p>The PC will be required to appoint suitably qualified environmental specialists, as required, for the following:</p> <ul style="list-style-type: none"> • Contamination and remediation. • Waste management. • Ecology. • Landscape. • Noise and vibration and air quality. • Archaeology. • Agriculture. • Arboriculture. • Others, as required.
Principal Contractor Public Liaison Officer	<ul style="list-style-type: none"> • Key liaison with the above and the National Highways' Public Liaison Officer. • Maintain and develop Community Relations Strategy. • Maintain comment and enquiries log, disseminate identified comments for response and implementation of action. • Support the Principal Contractor Project Manager (PCPM) with addressing any complaints.

Role	Responsibility
Principal Contractor Site Managers, supervisors or similar	<ul style="list-style-type: none">• Communication of site-specific environmental requirements to their teams.• Implementation of site-specific controls.• Ensure sites under their control do not cause pollution, comply with the ecological requirements specified in agreed licences and the BMS, as well as the other site controls required for waste, trees and hedgerows, water, air and noise.• Communication of environmental site briefings, toolbox talks and other environmental / community requirements to operatives, subcontractors and delivery drivers.• Raising environmental observations or concerns to the environmental team or directly to the PCEM.

3. Consents and permissions

3.1. DCO powers and consents

- 3.1.1. The principal consent for the Scheme is the DCO. The DCO will provide development consent for the works and enable land acquisition, in addition to a number of other consents, licences and permissions.
- 3.1.2. The intent of the Planning Act 2008 and Government policy is to enable development and construction-related consents to be included within the DCO. Where possible and practicable, additional consents have been included within the DCO. Any additional consents and permissions are to be secured at relevant stages of the Scheme's development, as required.
- 3.1.3. The PC will be required to obtain, implement and comply with all requirements, permits, consents and licences during the construction phase, and will be responsible for the submission and approval of all required consents, permits and licences not included within the DCO prior to commencement of the relevant site works.
- 3.1.4. This chapter will be updated by the PC to cover developments through the detailed design and construction planning phase, and throughout the operational phase, to capture all relevant items.

3.2. Consents and Agreements Position Statement

- 3.2.1. The Consents and Agreements Position Statement provided as part of the DCO application (application document TR010063 – APP 3.3) sets out GCC's intended strategy for obtaining the consents and associated agreements needed to implement the Scheme. The purpose and objective of Consents and Agreements Position Statement is to identify what consents and agreements are expected to be needed for the Scheme outside of the DCO, and how these will be obtained in line with Regulation 5(2)(q) of The Infrastructure Planning (Applications: Prescribed Forms and Procedure) Regulations 2009 (The APFP Regulations).
- 3.2.2. A number of consents and powers are to be included in the DCO. These are identified in the Consents and Agreements Position Statement. Following determination of the application and confirmation of the DCO further consents are likely to be required separately to the DCO. These are listed in Appendix A of the Consents and Agreements Position Statement.

3.3. EMP - Management Plans

- 3.3.1. The contractor shall prepare Management Plans for certain environmental topic areas as the detailed design is developed. An initial list of these plans is presented in Section 8.3 of Annex B. The Management Plans shall be prepared by the PC in consultation with the relevant regulatory organisation, relevant planning authority and the relevant highway authority and submitted to and approved in writing by the Secretary of State. When produced they will be added as annexes to the 2nd iteration of the EMP.

3.4. EMP - Environmental Method Statements

- 3.4.1. The contractor shall prepare Environmental Method Statements for environmental topic areas at detailed design (for example for site clearance and for protected species), and for the construction and operation of the Scheme, as required. Commitments to produce specific method statements are included in the REAC (application document TR010063 – APP 7.4).

4. Register of environmental actions and commitments

- 4.1.1. The Register of Environmental Actions and Commitments (REAC) (application document TR010063 APP7.4) identifies the environmental commitments made during the Preliminary Design to address the potential environmental effects of the Scheme. The REAC has been produced as separate document to the EMP.
- 4.1.2. The REAC is a live document and will be updated as the Scheme progresses and will be finalised at the end of construction on completion of the Scheme, when it will be developed as the EMP 3rd iteration. This is the main vehicle for passing essential environmental information to the end users and crucially to the bodies responsible for the future maintenance and operation of the asset.

5. Environmental asset data

- 5.1.1. Environmental asset data will be made available to National Highways Environmental Information System (EnvIS) in line with the requirements of the Asset Data Management Manual (ADMM). Detailed design drawings for construction preparation and as built drawings for operating and maintaining the network area will also be made available to EnvIS.
- 5.1.2. The asset data will cover the lifespan of the asset, from planning and design, construction, handover and maintenance and operation. The asset data will consist of the following environmental topics, as necessary:
- Air quality.
 - Noise and vibration.
 - Biodiversity.
 - Road drainage and the water environment.
 - Landscape.
 - Geology and soils.
 - Cultural heritage.
 - Materials and waste.
 - Population and human health.
 - Climate.
- 5.1.3. Environmental management information of each asset made available to EnvIS will contain:
- Details of environmental commitments.
 - Management actions.
 - Status of each management action.
 - Planned/actual date for completion of each management action.
 - Condition and/or performance rating of each asset.

5.2. Environmental data

- 5.2.1. The environmental data that is available at this preliminary design stage of the project is submitted through the publication of the ES (as part of the DCO Application). This includes the submission of all species surveys results undertaken to inform the ES.
- 5.2.2. The surveys undertaken to inform the ES are provided in ES Appendices 7.1 to 7.18 (application document TR010063 – APP 6.15).

5.3. Further surveys to be obtained prior to construction

- 5.3.1. The following surveys are to be obtained prior to construction commencing on site:
- Geophysical investigation and archaeological trenching (if subsequently required) over the flood storage area.
 - A programme of archaeological investigation along the alignment of the Link Road.
 - Pre-works photography for site condition.
 - Pre-construction ecological surveys.

6. Maintenance and EMP monitoring

6.1. Environmental monitoring requirements

- 6.1.1. This chapter provides a brief description of the maintenance and EMP monitoring activities that will be required to maintain an audit trail of the environmental obligations of the Scheme. These will be managed through the Quality and Safety Management Systems (QMS) and the Environmental Management System (EMS) of the PC which will be certified in line with the ISO 14001 standards.
- 6.1.2. The PC will ensure that environmental mitigation and staff responsibilities are made clear to site managers, sub-contracted staff and site supervisors, and managed through site inductions and training as required, and the completion of daily checks of the site and equipment. The contractor will have processes and protocols in place for environmental aspects to be checked. The contractor will insert their standard inspection forms and checklists that are associated with their internal EMS into the EMP appendices for information.
- 6.1.3. Daily checks will be logged, and corrective actions implemented by the site manager.
- 6.1.4. The PC will be responsible for maintaining the environmental records for the site, including the environmental site checks/inspection records, monitoring details (sampling, recording and subsequent actions), consents, permits, and waste transfer notes. Records will be held at the PC's site office and will be available for inspection by representatives of any audit team and relevant regulatory bodies. The PC's Quality Administrator will ensure there is a central filing system in place for any checklists, reports and monitoring consistent with the QMS, SMS and EMS.

6.2. Environmental management systems

- 6.2.1. Contractors are required to be accredited or seeking to be accredited under ISO 14001. This indicates an understanding of implementation of an EMS for recording, monitoring, and managing the Scheme. The EMS will be maintained throughout the Scheme.
- 6.2.2. The level of environmental management will be monitored to assess compliance with the contract and environmental standards through inspections and audits. Subject to contract arrangements, the responsibility for maintaining correspondence and day-to-day records will rest with the contractor. Original copies of correspondence and record copies of issued documentation will be recorded, together with records of subsequent charges. Copies are to be kept on site and circulated to appropriate personnel for action or information only.

Inspection, reporting and auditing

- 6.2.3. The PC will ensure the compliance with the requirements of the ES, REAC and EMP with regards to environmental management, method statements and environmental legislation and regulations.
- 6.2.4. Monitoring requirements will be managed through:
- Regular site audits and monitoring by the environment manager, and/or the relevant environmental clerk of work (Ecology, Archaeology, Arboricultural). Noting that ecological activities under licence and works with European protected species can only be undertaken by a suitably licenced ecologist.
 - Periodic audits and checks by the PC regional environmental advisor and environment and sustainability manager.

- Periodic reviews by the PC construction team of the relevant management plans, method statements and risk assessments.

7. Induction, training and briefing procedures

7.1. General

- 7.1.1. On commencement of site mobilisation, the PC will be responsible for the site including the organisation of training and site inductions of all personnel on the site whether visitors, full time staff or subcontractors.
- 7.1.2. All individuals working or visiting the site will be required to attend the PC's site-specific induction. Site inductions for the construction team, where required, will be tailored to construction activities and relevant environmental risks and mitigation. Site inductions for visitors will be tailored to those areas of the site they are visiting. Further activity and site-specific details will be provided through risk assessment method statements (RAMS) briefings prior to the commencement of a specific activity. Those participating in or near to specific activities that have an environmental impact may be required to attend additional training or toolbox talks led by the PC or environmental specialists.
- 7.1.3. All personnel on site will be made aware of the PC's Environmental Policy, applicable regulatory requirements, the REAC, and an overview of the sites environmental risks/constraints (shown in Figure A-1 in Annex A of this document).
- 7.1.4. An environmental training matrix, including a record of all site inductions and training will be maintained as part of the PC's management systems prior to and during the construction stage. The requirement for any additional training will be identified from the regular site environmental awareness and compliance environmental check reports, or site feedback on any noted non-compliance.

7.2. Environmental competencies, training and site induction

- 7.2.1. The PC will ensure all personnel conducting environmental tasks are suitably qualified or experienced for the roles and responsibilities that they are employed to undertake.
- 7.2.2. The PC will ensure that all personnel have attended the relevant environmental induction and training, including additional, new, or updated training, prior to undertaking any activities on site.
- 7.2.3. All site personnel and visitors are to receive a Safety, Health and Environment (SHE) induction covering priority Safety, Health, and Environmental risks and mitigation from the PC before commencing activities on site. Topics that are to be included with the induction are detailed within Table 7-1. The topics detailed within Table 7-1 are not an exhaustive list.

Table 7-1 – Environment Training

Environment Topics	
<ul style="list-style-type: none"> • Environmental Policy 	<ul style="list-style-type: none"> • Environmental regulatory requirements
<ul style="list-style-type: none"> • Environmental constraints 	<ul style="list-style-type: none"> • Site-specific environmental requirements
<ul style="list-style-type: none"> • General environmental awareness 	<ul style="list-style-type: none"> • Site environmental plans
<ul style="list-style-type: none"> • Pollution prevention, including spill procedures and spill kit locations 	<ul style="list-style-type: none"> • Emergency response plans

Environment Topics	
• Traffic requirements	• Waste management
• Ecology and protected species	• Material management
• Invasive/injurious species	• Cement and concrete washout
• Carbon and energy management	• Cultural heritage/archaeology
• Dust and emissions	• Noise and vibration
• Water management and working near watercourses	• DCO requirements
• Sustainability	• Environmental incidents and reporting
• Contaminated land	• Unexploded ordnance (UXO)

7.3. Toolbox talks

- 7.3.1. The PC and their subcontractors will conduct toolbox talks as required. Each team will be provided with a minimum of one environmental toolbox talk a month. Toolbox talks will be linked/tailored to construction activities and environmental risks/constraints e.g., bird nesting season, working near water, and will be documented in Annex D of the EMP (2nd iteration).
- 7.3.2. Toolbox talks will be delivered to construction teams by sufficiently competent personnel and are to be posted in welfare units and office reception areas. Records of toolbox talks, including attendance, will be maintained as detailed above (Section 7.1).
- 7.3.3. The client can request for new/specific toolbox talks to be delivered at any time. This communication is to be made to the PC's Environmental Manager.

7.4. Criteria for evaluating the effectiveness of training

- 7.4.1. Regular Site Safety and Environmental Reviews (SSERs) will ensure continuous monitoring of environmental performance and will record compliance with the requirements of this EMP, and the EMS.

8. References, glossary and annexes

8.1. References

8.1.1. References are included as footnotes in the text.

8.2. Glossary

Table 8-1 – Glossary of the abbreviations and acronyms used in this document

Abbreviation or acronym	Definition
BMS	Business Management System
CBC	Cheltenham Borough Council
CL:AIRE	Contaminated Land: Applications in Real Environments
DCO	Development Consent Order
DMRB	National Highways Design Manual for Roads and Bridges
EnCoW	Environmental Clerk of Works
ECP	Environmental Control Plan
EMP	Environmental Management Plan
EMS	Environmental Management System
EnvIS	National Highways Environmental Information System
ES	Environmental Statement
GCC	Gloucestershire County Council
GCHQ	Government Communications Headquarters
GFirst LEP	Gloucestershire Local Enterprise Partnership
JCS	Joint Core Strategy
MMP	Materials Management Plan
PC	Principal Contractor
PCEM	Principal Contractor Environmental Manager
PCPM	Principal Contractor Project Manager
QMS	Quality Management System
RAMS	Risk Assessment Method Statement
REAC	Register of Environmental Actions and Commitments
SHE	Safety, Health and Environment
SMS	Safety Management System
SRN	Strategic Road Network
SSER	Site Safety and Environmental Reviews

Abbreviation or acronym	Definition
tbc	to be confirmed
TBC	Tewkesbury Borough Council
TPO	Tree Preservation Order
UXO	Unexploded Ordnance

8.3. Annexes to the EMP

Annex A Scheme overview and Constraints map

8.3.1. Produced at this EMP 1st iteration stage.

Annex B Relevant management plans

8.3.2. To be produced as part of the EMP 2nd iteration stage.

Annex C Environmental method statements

8.3.3. To be produced as part of the EMP 2nd iteration stage.

Annex D Emergency procedures and records of incidents

8.3.4. Brief description provided at this EMP 1st iteration stage (see Annex D below).

Annex E Evaluation of change register

8.3.5. Brief description provided at this EMP 1st iteration stage (see Annex E below).

Annex F Final environmental investigations and monitoring reports

8.3.6. Brief description provided at this EMP 1st iteration stage (see Annex F below).

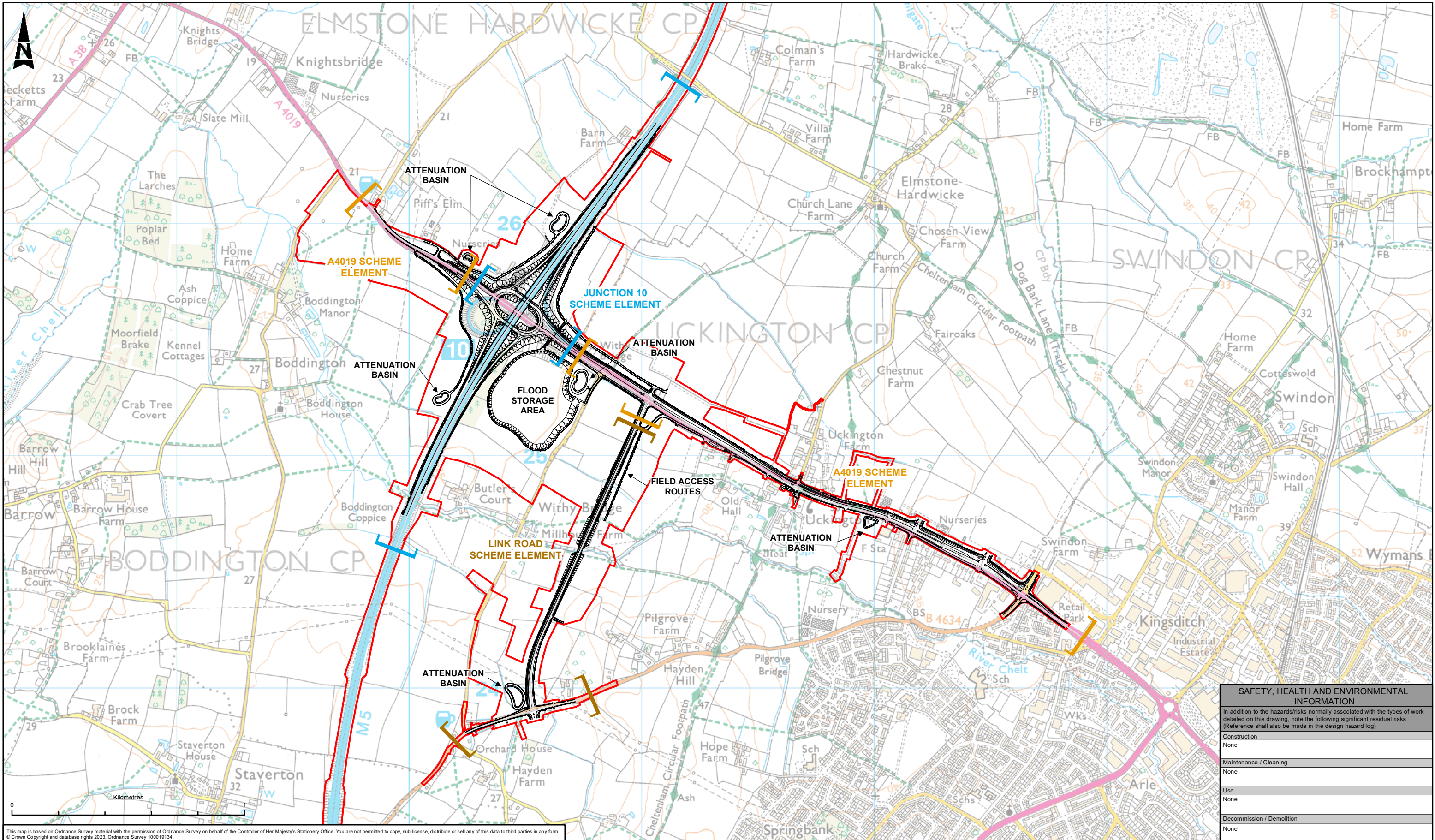
Annexes



Annex A. Scheme overview and Environmental constraints maps

The figures presented in this Annex comprise the following:

Figure reference	Document title	Sheet	Document number	Revision
1-2	Scheme overview	1 of 1	GCCM5J10-ATK-EGN-ZZ-GS-GI-000001	0
A-1	Environmental constraints plan	1 of 1	GCCM5J10-ATK-EGN-ZZ-GS-GI-000002	0



This map is based on Ordnance Survey material with the permission of Ordnance Survey on behalf of the Controller of Her Majesty's Stationery Office. You are not permitted to copy, sub-license, distribute or sell any of this data to third parties in any form. © Crown Copyright and database rights 2023, Ordnance Survey 100019134.

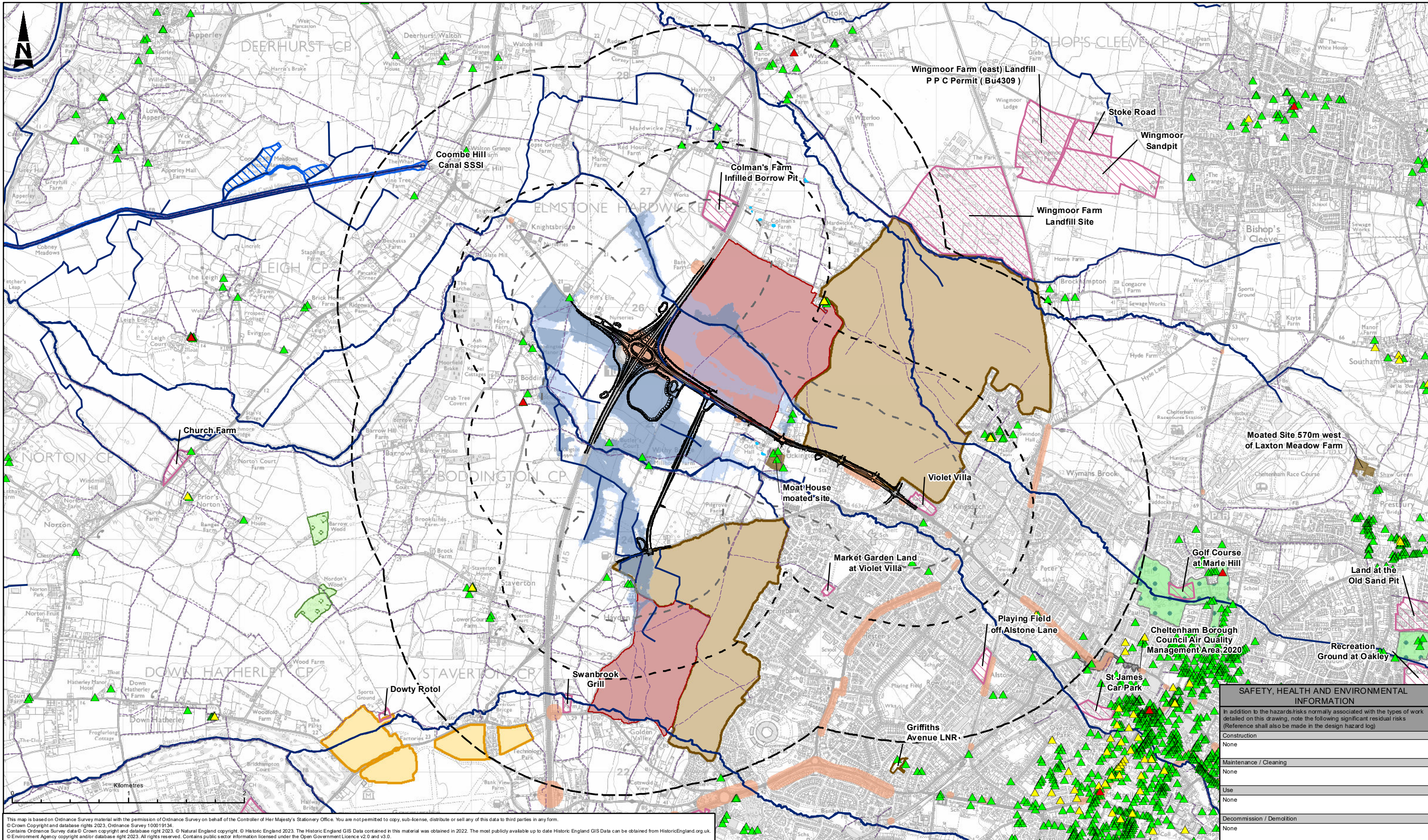
LEGEND

	SCHEME ALIGNMENT
	ORDER LIMITS

SAFETY, HEALTH AND ENVIRONMENTAL INFORMATION	
In addition to the hazards/risks normally associated with the types of work detailed on this drawing, note the following significant residual risks (Reference shall also be made in the design hazard log)	
Construction	None
Maintenance / Cleaning	None
Use	None
Decommission / Demolition	None

Description	Status	Revision	Drawn	Checked	Reviewed	Authorised	Issue Date
PUBLISHED	A1	P03	JM	SL	CC	LJ	09/06/23

PUBLISHED		A1	Project Title M5 Junction 10 Improvements Scheme
<p>Member of the SNC-Lavalin Group Tel: 08000 514 514 www.atkinsglobal.com</p>		Drawing Title FIGURE 1-2 SCHEME OVERVIEW	
<p>Gloucestershire COUNTY COUNCIL</p>		Drawing Number Project: GCCM5J10 - ATK - EGN Originator: ZZ - GS - GI - 000001 Volume	
Original Size: A3	Scale: 1:15,000	Project Ref: 5214106	Sheet: 1 of 1 Rev: P03



This map is based on Ordnance Survey material with the permission of Ordnance Survey on behalf of the Controller of Her Majesty's Stationery Office. You are not permitted to copy, sub-licence, distribute or sell any of this data to third parties in any form.
 © Crown Copyright and database rights 2023. Ordnance Survey 100019134.
 Contains Ordnance Survey data © Crown copyright and database right 2023. © Historic England 2023. The Historic England GIS Data contained in this material was obtained in 2022. The most publicly available up to date Historic England GIS Data can be obtained from HistoricEngland.org.uk.
 © Environment Agency copyright and/or database right 2023. All rights reserved. Contains public sector information licensed under the Open Government Licence v2.0 and v3.0.

SAFETY, HEALTH AND ENVIRONMENTAL INFORMATION	
In addition to the hazards/risks normally associated with the types of work detailed on this drawing, note the following significant residual risks (Reference shall also be made in the design hazard log)	
Construction	None
Maintenance / Cleaning	None
Use	None
Decommission / Demolition	None

LEGEND — PROPOSED ALIGNMENT 500M STUDY AREA 1KM STUDY AREA 2KM STUDY AREA SITES OF SPECIAL SCIENTIFIC INTEREST (SSSI) ANCIENT WOODLAND SCHEDULED MONUMENTS REGISTERED PARKS AND GARDENS HISTORIC LANDFILL SITES NOISE IMPORTANT AREAS AIR QUALITY MANAGEMENT AREAS MODELLED 100 YEAR FLOOD EXTENT MODELLED 1000 YEAR FLOOD EXTENT SAFEGUARDED AREAS LOCAL NATURE RESERVES ALLOCATED SITES EMP 1 - STAVERTON / GLOUCESTERSHIRE AIRPORT BUSINESS PARKS NORTH AND NORTH WEST CHELTENHAM - STRATEGIC ALLOCATION CONFIRMED GCN PONDS RIVER NETWORK AND WFD RIVER WATERBODIES EXISTING PUBLIC RIGHTS OF WAY (PROW) LISTED BUILDINGS GRADE I GRADE II* GRADE II	ATKINS Member of the SNC-Lavalin Group 5th Floor, Block 5 Shire Hall Bearland Gloucester GL1 2TH Tel: 08000 514 514 www.atkinsglobal.com Copyright © Atkins Limited (2023)	PUBLISHED Status: A1 Project Title: M5 J10 Improvements Scheme Drawing Title: FIGURE A-1 ENVIRONMENTAL CONSTRAINTS PLAN Drawing Number: GCM5J10 - ATK - EGN ZZ - GS - GI - 000002 Project: GCM5J10 Originator: Volume: ZZ - GS - GI - 000002 Location: Scale: 1:30,000 Project Ref: 5214106 Sheet: 1 of 1 Rev: P02	
			Description: PUBLISHED Status: A1 Revision: P02 Drawn: JM Checked: CC Reviewed: VA Authorised: LJ Issue Date: 22/08/23
			Description: PUBLISHED Status: A1 Revision: P02 Drawn: JM Checked: CC Reviewed: VA Authorised: LJ Issue Date: 22/08/23
			Description: PUBLISHED Status: A1 Revision: P02 Drawn: JM Checked: CC Reviewed: VA Authorised: LJ Issue Date: 22/08/23

Annex B. Relevant management plans

To be produced as part of the EMP 2nd iteration stage. The management plans produced will include, but not be limited to:

- Annex B.1 Materials Management Plan (MMP).
- Annex B.2 Soil Handling Management Plan.
- Annex B.3 Noise and Vibration Management Plan.
- Annex B.4 Air Quality Management Plan.
- Annex B.5 Landscape and Ecology Management Plan (LEMP).
- Annex B.6 Emergency Preparedness and Response Plan. To include a Flood Management Plan, and a Severe Weather Plan (for managing impacts caused to construction staff and activities by extreme weather).
- Annex B.7 Pollution Prevention and Control Management Plan.
- Annex B.8 Archaeological Management Plan (AMP), and associated with a Written Scheme of Investigation.
- Annex B.9 Invasive Non Native Species (INNS) Management Plan. If shown to be required through measures in Annex B.5 (the LEMP).
- Annex B.10 Operational Unexploded Ordnance (UXO) Emergency Response Plan.
- Annex B.11 Traffic Management Plan. Covering access by private motor vehicles through and within the Order limits, and the movement of construction vehicles. To include an Emergency Vehicle Movement Management Plan, covering the movement of emergency vehicles through areas with traffic management, and access to the West Cheltenham Fire Station.
- Annex B.12 Site Waste Management Plan.
- Annex B.13 PRoW Management Plan.
- Annex B.14 Emergency Vehicle Movement Management Plan.
- Annex B.15 Community Engagement Plan. To include the Community Communications Plan produced towards the end of the construction programme.
- Annex B.16 PAS 2080 Carbon Management Plan.
- Annex B.17 Nuisance Management Plan.

Annex C. Environmental method statements

To be produced as part of the EMP 2nd iteration stage

Environmental method statements will include, but not be limited to:

- Site clearance method statement. To cover existing vegetation and existing structures.
- Precautionary method statement – Bats.
- Precautionary method statement – Badgers.
- Precautionary method statement – Dormice.
- Precautionary method statement – Great crested newts.
- Precautionary method statement – Habitats.
- Precautionary method statement – Breeding birds.
- Precautionary Method statement – Reptiles and other amphibians.
- Arboricultural method statement. An outline version has been produced in the Arboricultural Impact Assessment (Appendix 9.4 of the ES (application document TR010063 – APP 6.15)).
- Health and safety method statement.
- Planting (vegetation) method statement. To set out the requirements of the new planting to meet with NH and GCC requirements. To include the maintenance requirements of the planting.
- Construction method statement for water.
- Piling risk assessment.

Annex D. Emergency procedures and records of incidents

Brief description of the procedures and process is presented below at this EMP 1st iteration stage.

D.1 Summary of emergency procedures

Emergency response plan principles

- D.1.1 GCC must approve any site incident management protocols to meet and be coordinated to the systems that exist for the day-to-day management of the road network. In the event of an incident, provisions for maintaining effective access for emergency services and highways activities will be necessary for the road network and for the works.
- D.1.2 The Principal Contractor will develop and implement a set of emergency response procedures and will ensure that site operatives are familiar with all emergency arrangements through, for example training and test exercises. The procedures will include an Emergency Response Plan and a record of Environmental Incidents that may occur.
- D.1.3 The emergency procedures will contain emergency contact phone numbers and a method for notifying local authorities and statutory consultees. Emergency contact numbers, which will be updated and maintained throughout the construction of the Scheme by the Principal Contractor. The plans will also include detailed response plans for potential environmental incidents.
- D.1.4 A summary of general control measures for different potential environmental emergency situations is provided in the sections below.
- D.1.5 Each subcontractor is responsible for ensuring that any environmental incidents are reported to the Principal Contractor. All incidents will be investigated by the subcontractor or responsible person with full participation and co-operation of any other subcontractors involved. Where the incident is investigated by a subcontractor, the Principal Contractor will be provided a copy of the investigation report detailing any remedial action.
- D.1.6 With regards to environmental incidents, a full report must be compiled with any witness statements and photographs to assist in the final conclusions and recommendations.
- D.1.7 Records of Environmental Incidents (should they occur) will be contained within the site records folder system.

Basic emergency principles

- D.1.8 If an incident occurs on site, the following principles should be followed:
- Identify the cause of the emergency or incident and act immediately to prevent further impacts.
 - Ensure appropriate personal protective equipment (PPE) is available to use.
 - Report any emergency or incidents to the site manager and environmental team immediately, detailing the nature, cause and location so that appropriate action can be taken.

- The Principal Contractor will inform the relevant regulatory stakeholders of the incident, as required.

D.1.9 Do not ignore the incident, as this could lead to serious disciplinary consequences and/or legal action.

D.1.10 After an incident, the Principal Contractor is to ensure that any lessons are communicated to all relevant staff and allowing appropriate action taken elsewhere on site if necessary, and is to update the EMP, method statements, environmental control plans (ECPs), and toolbox talks materials.

D.2 Dealing with protesters

D.2.1 The Principal Contractor will incorporate and develop the following instructions in their Emergency Response Plan for instances when protesters obtain access to site:

- Do not confront any protesters if encountered onsite.
- Stop all operations if necessary.
- Contact the site management team immediately.
- Always respect landowners and residents and try to understand their concerns.
- Do not try to deal with protesters by yourself; ask for help from the site management team.

D.3 Accidental fires

D.3.1 The Principal Contractor will incorporate and develop the following instructions in the Emergency Response Plan for the site to reduce the damage caused to surrounding habitats from fire:

- If safe to do so, use fire-beaters immediately to prevent fire spreading.
- Call the fire brigade if the fire cannot be easily contained.
- Report emergency to the relevant site management team immediately.
- Inform the landowner/occupier, GCC and National Highways (if on the National Highways managed asset).

D.4 Emergency spills and pollution incidents

General

D.4.1 Spillages can cause damage to surrounding habitats and watercourses. The Principal Contractor will incorporate and develop the following instructions in their Emergency Response Plan for the site:

- Make sure you have the appropriate PPE before acting.
- Contain the pollution incident immediately using available spill kit materials, e.g., absorbent materials and booms, and/or by digging containment bunds.
- Report the incident to the environmental teams they will contact the Environment Agency if necessary.
- Contact designated spill clean-up company for appropriate assistance.

D.4.2 Do not:

- Dig ditches to drain polluted matter to watercourses.
- Remove booms and bales used to hold or contain polluting materials.

- Ignore an incident because you are afraid of the consequences.

D.5 After an incident:

- All waste generated by clean-up activities should be disposed of in accordance with current legislative requirements and the SWMP and copies of all transfer/consignment notes are to be retained.

Unexpected sediment

D.5.1 Sediment/silt incidents can occur at any time, not just in times of heavy rain, and can cause damage to surrounding habitats and watercourses. The Principal Contractor will incorporate and develop the following instructions in their Emergency Response Plan for the site:

- Check (monitor where required) watercourses during periods of high rainfall or construction activities with potential for significant run-off.
- Take immediate action if you identify any activity with the potential to result in high sediment resulting in pollution. If unsure if it is significant, consult with the environmental team.
- Stop works and implement mitigation actions immediately. Control pollution at source whenever possible. Consult the environmental representatives if in doubt.
- Monitor the effectiveness of protection measures daily and re-plan as necessary.
- Remove silted bales/screens, etc. regularly so they do not make problems worse.
- The Principal Contractor, Environmental Manager and relevant site management representative will communicate with the Environment Agency and other relevant regulatory stakeholders during the incident
- Reconsider working practices which may be causing pollution in poor weather conditions and re-plan/programme.

Accidental release of cement to watercourses

D.5.2 The Principal Contractor will incorporate and develop the following instructions in their Emergency Response Plan to reduce the likelihood of damage to surrounding habitats and watercourses from cement releases:

- Stop the action which is causing pollution immediately.
- Inform the environmental representative to identify whether more detailed actions are required.
- Inform the Environment Agency, other relevant regulatory stakeholders and landowners/occupiers as relevant.
- Monitor effects of spill.

D.5.3 Do not:

- Think that a concrete spill is not important and ignore a concrete spill.
- Cover up the incident.

Oil spills

D.5.4 Oil causes damage to surrounding habitats and watercourses. The Principal Contractor will incorporate and develop the following instructions in their Emergency Response Plan for the site:

- Stop the action/event which is causing pollution immediately.

- Take immediate remedial actions.
- Inform the environmental representative to identify more detailed required actions.
- Inform the Environment Agency and landowners/occupiers if the spill has not been contained and dealt with.
- Monitor the effects of the spill.
- Remove oil spill response materials and dispose of these in accordance with the appropriate method statement.
- Deal with any contaminated soils in accordance with the Materials management plan (MMP).
- Do not think that a fuel spill is not important.

Annex E. Evaluation of change register

To be produced during DCO examination by the design team. This section will then include:

- A record of any design changes after the completion of the Environmental Statement.
- A description as to how these design changes have been assessed and any environmental actions required as a result of these changes (e.g., further environmental survey required).

Annex F. Final environmental investigations and monitoring reports

To be produced prior to construction by the Principal Contractor. This section will then include:

- Copies of relevant reports (relating to protected species / habitats and cultural heritage investigations, and any environmental monitoring reports) or cross reference to the locations of these easily if accessible elsewhere.

ATKINS

Member of the SNC-Lavalin Group

5th Floor, Block 5
Shire Hall
Bearland
Gloucester
GL1 2TH

Tel: +44 (0) 8000 514 514