

Havant Thicket Reservoir

Ecological Mitigation, Compensation & Enhancement Measures

Phase 3 Reserved Matters NMA – Discharge of Planning Condition 36

24/09/25 | Rev P03

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1 Introduction and Background to the Scheme

1.1 Purpose of this Report

1. Portsmouth Water secured hybrid planning permission in October 2021 for Havant Thicket Reservoir (Havant Borough Council Reference: APP/20/00990 and East Hampshire District Council Reference: 51680/001), a new raw water storage reservoir development located north of Havant, Hampshire (hereafter referred to as 'the Scheme'). The new reservoir will have a minimum storage capacity of 8,700 million litres and an extent of approximately 1.6 km from east to west and 800 m from north to south.
2. Future Water have been appointed as the Principal Contractor by Portsmouth Water to undertake the construction of the main reservoir works for the Scheme.
3. Section 73 applications were submitted to Havant Borough Council (HBC) and East Hampshire District Council (EHDC) which proposed amendments to the design of the embankment and associated changes to other related infrastructure. Permission was granted on 6 December 2024 (HBC Ref: APP/24/00312 and EHDC Ref: 51680/012).
4. Separate Reserved Matters applications (RMAs) relating to Phase 3 – Main Embankment were submitted to HBC and EHDC at the same time as the Section 73 applications. The RMAs relating to Phase 3 – Main Embankment accorded with the parameters, principles and standards set out in the Section 73 Applications. The RMAs relating to Phase 3 were granted on 20 December 2024 (HBC Ref: APP/24/00311 EHDC Ref: 51680/011).
5. Following further detailed design and modelling it has been identified that the engineering design of the Western Embankment of Havant Thicket Reservoir needs to be amended to ensure the internal embankment slopes of the western embankment remain structurally stable in an emergency draw down event. As a result, associated changes to the Transition Zone to the Main (Southern) Embankment are also proposed. Applications to make Non-Material Amendments (NMAs) to the Section 73 applications and Phase 3 RMAs have been submitted to HBC and EHDC alongside this application.
6. The purpose of this report is to provide the Local Planning Authority with details of the amendments to the ecological mitigation, compensation and enhancement measures and monitoring of mitigation measures required as a result of the NMAs to the Section 73 applications and Phase 3 RMAs. This is required to re-discharge planning condition 36 before the Phase 3 construction works as now proposed can commence. Planning condition 36 states:

Condition 36: Ecological Mitigation, Compensation and Mitigation Measures:

No phase of the development approved under Condition 4 shall commence until full details of all ecological mitigation, compensation and enhancement measures (to be informed as necessary by up-to-date survey and assessment) and on-going monitoring of mitigation measures required for each reserved matters application (including both ecological works directly related to that Development Phase reserved matters area and any works associated with that area but lying outside of the boundary of that area) shall be submitted for approval to the Local Planning Authority. Such details shall be in accordance with the ecological mitigation, compensation and enhancement measures detailed within the Outline Biodiversity

Mitigation and Compensation Strategy (ECOSA, September 2020), the Habitats Regulations Assessment (Atkins/Portsmouth Water, September 2020) and the Implementation Plan for Off Site Biodiversity Mitigation and Compensation (Atkins, April 2021). Any such approved measures shall thereafter be implemented in strict accordance with the agreed details and with all measures maintained in perpetuity, unless otherwise agreed in writing by the Local Planning Authority.

Reason: *To protect and enhance biodiversity in accordance with the Conservation of Habitats and Species (Amendment) (EU Exit) Regulations 2019, NERC Act 2006, NPPF and Policy CS 11 of the Havant Borough Core Strategy March 2011.*

1.2 Ecological Context of the Scheme

7. The Scheme lies within a shallow valley located between the residential settlements of Leigh Park and Rowlands Castle and covers an area of approximately 296 ha. The main reservoir site comprises predominantly open grassland with some woodland, hedgerows and ditches.
8. The main reservoir embankment (Phase 3 of the Scheme) is fully within the approved Scheme boundary of the respective planning permissions as set out above.

1.3 Ecological mitigation undertaken to date

9. Given the presence of species and important habitats identified within the site, a number of working Method Statements and / or Precautionary Method of Works (PMWs) have been prepared to aid the Principal Contractor to protect such receptors from harm during the construction works. The Ecological Clerk of Works supervises all site clearance and site preparation work.
10. Most grassland within the construction footprint of the wetlands was strimmed, using a two-stage approach, under ecological supervision in 2023. Areas within the north, west and south of the site were topsoil stripped.
11. Slow worm, common lizard, common toad, common frog and field vole were translocated during supervision of the two-stage grass cut. The areas were also searched using prescribed methods to ensure no ground-nesting birds were present, prior to a supervised two-stage grass cut. The grassland was then continuously managed to keep a short sward by a tractor for the remainder of summer 2023.
12. Ditches across the site were strimmed (using two-stage cut process), tree stumps removed and topsoil stripped, all under ecological supervision. Sections of the ditch network were also subject to draining under ecological supervision. A small pump was used to lower the water level to ensure all animals had been removed prior to removing tree stumps/roots along the ditch network. Animals caught during removal of ditch vegetation include common lizard, common toad, adder, common frog, bank vole, common shrew, slow worm, European eel, bullhead and stickleback.
13. All reptiles and amphibians were translocated to pre-defined receptor areas in Havant Thicket woodland, to the north of the construction site boundary. European eel, bullhead and stickleback were relocated under an Environment Agency licence.
14. Areas of damp grassland/rush pasture habitat were carefully stripped and the soil separately stockpiled for use when areas outside the embankment footprint can be topsoiled.
15. The Upper Lake was drained in late February /early March 2024 under ecological supervision and no fish or amphibians were found.

2 Background

16. The Landscape and Ecology Management Plan (LEMP) (Atkins doc no: HTR-ATK-ZZ-ZZ-RP-L-0002) prepared for the Scheme sets out the long-term management of habitat creation and enhancement areas required as compensation for the effects of the Scheme. The LEMP is based on mitigation and compensation measures for landscape and ecology set out in the ES submitted with the planning application in 2020, and the Biodiversity Mitigation and Compensation Strategy (Atkins, 2022 doc no: HTR-ATK-ZZ-ZZ-RP-Y-0001). The LEMP was updated in 2024 to include changes associated with the Section 73 permission (and associated RMA) for the main embankment, culvert and valve tower. No further changes are considered necessary as a result of the NMAs to the Section 73 applications and Phase 3 RMAs.

2.1 Grassland creation – objectives and targets

17. The LEMP includes objectives and targets for grassland creation on the main reservoir embankment as set out below.

18. The objectives for grassland creation in the LEMP include:

- Creating a large expanse of species-rich grassland on the downslope of the reservoir embankment;
- Providing value for landscape integration and nature conservation and biodiversity;
- Providing a visual link with adjacent vegetation;
- Maintaining a species-rich sward of wildflowers and grasses and prevent nutrient build up in the soil;
- Controlling encroachment of scrub;
- Maintaining an absence of injurious weeds/invasive species;
- Creating suitable micro-habitats for invertebrates, including varied sward densities, patches of bare substrates, promotion of larval food plants and scattered scrub;
- Long-term management through grazing of the embankment by sheep where appropriate.

19. The targets for grassland creation in the LEMP include:

- Creating 36.71 ha of new/enhanced neutral grassland
- Protecting and re-using site-won low-nutrient and neutral pH soils for species-rich grassland establishment;
- Managing retained and new grassland (including scrub edge interfaces) to provide varied sward height that will provide suitable habitat for reptiles, new territories for skylark and meadow pipit, and foraging habitat for kestrel; and
- Maintaining grassland seeding areas to ensure successful establishment will be undertaken during the first five years following seeding (the Establishment Period). Ongoing management of grassland areas will continue following the Establishment Period.

3 Phase 3 Reserved Matters NMA Design

20. The design of the main embankment for the Phase 3 RMA was based on the outline design work undertaken by Portsmouth Water to secure the hybrid planning permissions and subsequently the design work as part of the separate Section 73 Permissions.

21. The NMAs would:

- Reduce the angle of the internal slopes to remove the structural risk;
- Increase the angle of external slopes to maintain the same overall footprint of the western embankment; and
- Amend the slope angle transition zone between the western and southern embankment.

22. The proposed amendments would not:

- Increase the height of the embankment;
- Change the capacity of the reservoir; or
- Impact the planning application boundary.

23. The proposed NMAs to the western embankment and slope southern transition zone are summarised in Table 1.

	Approved	Proposed
Western Embankment Slope		
Outside slope angles	1:8	1:5.5
Inside slope angles	1:8	1:9.5 and 1:9.75
Southern Transition Zone		
Outside slope angles	1:8 – 1:9	1:5.5 to 1:9
Inside slope angles	1:8 – 1:9	1:7 to 1:9.5

24. The inside slope of the embankment will include rock rip rap in the wave protection zone and EnkaMat A20, an erosion-control mat, with toil soil and grass above the wave protection zone.

25. In accordance with the Havant Thicket Reservoir Landscape and Ecology Management Plan (LEMP, Atkins, 2024) and the Biodiversity Mitigation and Compensation Strategy (BMCS, Atkins, 2022) which were submitted and approved under the s106 legal agreement associated with the Hybrid Planning Permission, the outside slope of the main embankment will provide new species-rich grassland using low-nutrient soils to provide part of the compensation for loss of dry neutral and acid grassland to the Scheme.

26. The embankment will include a staircase along the alignment of The Avenue joining pedestrian access from Staunton Country Park with viewing area at the crest. The detail of the staircase and viewing area is fixed as part of the separate Section 73 Applications.

27. A footpath will be provided along the crest of the embankment along with a viewing area along the western boundary of the embankment.

28. The following drawings submitted as part of the Phase 3 RMA NMA application show the landscape details for the embankment:

- HTR-GHD-ZZ-ZZ-DR-T-0011 P07 Main Embankment Landscape Plan; and
- HTR-GHD-ZZ-ZZ-DR-T-0018 P04 Main Embankment Landscape Cross-Sections LA1-LA3.

3.1 Main Reservoir Embankment Design Features

29. The proposed design features of the main reservoir embankment include the following:

- Species-rich grassland, using a wildflower grass seeding mix will be created on the downward slope of the main reservoir embankment. The species mix shall be determined based on local knowledge and survey of the existing grassland and rush pasture habitats on Site to provide a seed mix that is suitable and appropriate for the area and the soil substrate on the finished embankment;
 - Suitable plug plants shall be used if appropriate to introduce target species.
 - Seed/plant on sub-soil or a very thin layer of site-won topsoil only.
 - Seed mixes shall be supplemented by locally sourced green hay or harvested seed if available.
- Management of the new and retained grassland will be undertaken to provide a varied sward height and graded edges where at the interface with scrub and woodland to increase structural and species diversity; and
- Grassland will be managed by grazing as much as possible, with suitable fencing and gates to retain grazing stock.

30. Targets for grassland creation in the LEMP include creating 36.71 ha of new/enhanced neutral grassland. The Section 73 Permission resulted in the grassland on the reservoir embankments increasing from 15.83 ha to 24.67 ha. There will be a small decrease to this area of grassland by 0.56ha as a result of the proposed changes to the western embankment slope and transition zone however the overall target of 36.71 ha of new/enhanced neutral grassland creation will continue to be met, and likely exceeded once all the landscaping details for the wider reservoir site are finalised.

31. As the ecological mitigation and compensation features for the main reservoir embankment will continue to be accommodated, there would be no significant changes to the mitigation measures as presented in the 2024 Phase 3 RMA.

4 Phase 3 Ecological Mitigation Measures

Table 1 Summary of ecological mitigation incorporated within the main reservoir embankment design

Species/ species group	Enhancement measures
Bats	Grassland habitat on the main reservoir embankment will provide an availability of water for rehydration and high insect densities for foraging. Carefully managed grassland is capable of supporting a wide range of insects, which in turn provide foraging opportunities for bats.
Birds	Grassland planting on the main reservoir embankment will provide foraging and nesting habitat for birds. Management of the retained and new grassland on the main reservoir embankment will create a varied sward height that will provide new opportunities for territories for skylark and meadow pipit, and foraging habitat for kestrel.
Reptiles	Grassland habitat on the main reservoir embankment will provide suitable basking and foraging habitat for a range of reptile species.
Hazel dormouse	Grassland planting on the main reservoir embankment will help create new vegetation structures and graded edge habitats which provide habitat for hazel dormouse.
Invertebrates	Grassland habitat on the main reservoir embankment will support a varied assemblage of invertebrates such as dragonflies, water beetles, butterflies and moths.

5 Construction Environmental Management

32. A Construction Environmental Management Plan (CEMP) (doc no. HTR-RHD-P2-RE-PL-Z-0018) has been prepared by Future Water in support of the construction works and has been approved by the local planning authorities to discharge Condition 5.
33. The CEMP will be a 'live' document and will be maintained by Future Water throughout the life of the Scheme.
34. The CEMP will be developed into the Handover Environmental Management Plan (HEMP) upon completion of the construction works to pass crucial environmental information to those bodies responsible for future maintenance and operation of the asset. Future Water will be responsible for preparing the HEMP and Construction Phase Health and Safety Plan on completion of construction, for handover to the managing agent.
35. Portsmouth Water, Future Water and its subcontractors are all responsible for adhering to and complying with the Scheme objectives, Scheme environmental policy, relevant environmental legislation, bylaws and regulations. It is a requirement that all site personnel are made aware of their duty of care to the environment, including local communities, and will be provided with adequate training, supervision or instruction in the form of tool box talks, site induction modules and specific method statements as necessary.
36. Responsibilities for site environmental management will be delegated to key personnel by Future Water. These personnel will be responsible for the implementation, reporting and monitoring of environmental mitigation during construction. Where required, environmental specialists will provide advice on specific issues or site activities.

5.1 Post-construction Environmental Management Responsibilities

37. Portsmouth Water will produce a Site Management Plan for the reservoir site, which will confirm roles and responsibilities for the management and maintenance of the site for as long as the Approved Scheme remains open and operational. The Site Management Plan will be administered by a Site Management Board.
38. The LEMP (doc ref. HTR-ATK-ZZ-ZZ-RP-L-0002) sets out the long-term management of habitat creation and enhancement measures undertaken within the site as compensation for each Phase. The LEMP includes objectives for the management of important landscape and biodiversity features and provides a schedule of works.

6 Monitoring during Construction

39. The CEMP (doc ref. HTR-RHD-P2-RE-PL-Z-0018) describes the monitoring requirements during construction of the main reservoir works and has been submitted to the local planning authority to discharge planning condition 5.

7 Timescales

- 40. The western ground improvement zone and main embankment above ground works are planned to commence in Q1 2026.
- 41. The Detailed Phasing Plan (doc no. HTR-FUW-RZ-RE-DP-W-507) outlines the construction phasing and the programme to construct the main reservoir works.

8 Record of Environmental Actions and Commitments

- 42. The Record of Environmental Actions and Commitments (REAC) summarises the committed mitigation measures within the chapters of the published Environmental Statement (ES) (Atkins, 2020) and associated appendices and when the action is to be implemented (e.g. at pre-construction, construction, operation, or all stages).
- 43. The construction stage actions and commitments are included in the CEMP.
- 44. Ecological commitments identified in the REAC / CEMP that are relevant to Phase 3 are provided in Table 2.

Table 2 Extracts from the CEMP Appendix D Record of Environmental Actions and Commitments (doc ref. HTR-RHD-P2-RE-PL-Z-0018 Rev 3)

Ref	ES ref	Objective	Actions/commitments (incl. specific location and any monitoring required)	Assumptions (on which the action is based)	Achievement criteria and reporting requirements	When P - Pre-construction C - Construction O - Operation A - All	Completion record
B3	CH9	To assist appointed construction contractor in meeting biodiversity requirements	Ecological Clerk of Works (ECoW) to be appointed, to be full time on site during site preparation and clearance and during any works in sensitive areas, and to undertake regular monitoring visits throughout construction programme.	ECoW to be appointed by contractor will be suitably qualified and experienced ecologist.	Quarterly ECoW progress reports to be provided to the LPA	C	Initial: FW. Date: Ongoing Note: An ECOW has been appointed and appropriate monitoring visits are undertaken through the construction programme. Quarterly Ecology Reports are issued to the LPA.

Ref	ES ref	Objective	Actions/commitments (incl. specific location and any monitoring required)	Assumptions (on which the action is based)	Achievement criteria and reporting requirements	When P - Pre-construction C - Construction O - Operation A - All	Completion record
B4	CH9	To minimise disturbance of sensitive retained habitats and species	Project design and ecological management plan will include measures to control and direct visitor access to minimise disturbance in sensitive areas.		Detailed design and EcMP to be agreed by LPA.	P	Initial: FW Design development in conjunction with Portsmouth Water. Ecological Management Plan prepared. Date: Ongoing through the construction programme. Note: Quarterly Ecology Reports are issued to LPA.
B6	CH9	To protect areas of SINCs and ancient	Install protective fencing (high visibility or HERAS) at the edge of the working area, including protecting all retained		Integrity of adjacent areas to be	C	Initial: FW Perimeter fencing installed around

Ref	ES ref	Objective	Actions/commitments (incl. specific location and any monitoring required)	Assumptions (on which the action is based)	Achievement criteria and reporting requirements	When P - Pre-construction C - Construction O - Operation A - All	Completion record
		woodland outside the working areas from accidental incursion	woodland, scrub and grassland areas and a 15 m buffer zone around all ancient woodlands where practicable, and with expert arboricultural advice where work is required within 15m, and maintain throughout construction.		monitored on weekly basis by ECoW. Updates to be included in quarterly ECoW progress report to LPA.		the main reservoir work site. The Arboricultural Impact Assessment (doc. no. RHD-ZZ-XX-RP-EV-0001) outlines the protection measures for SINC's and ancient woodland. Date: 2023.
B12	CH9	To protect veteran and other trees and	The detailed Biodiversity Mitigation and Compensation Strategy will include a strategy for compensating for veteran tree loss. Measures will include options such as moving deadwood, veteranising	Stakeholder comments will be obtained from LPA and Natural England.	Agreement of detailed Biodiversity Mitigation and Compensation	P, C	Initial: BMCS & LEMP Issued by Portsmouth Water Date: July 2022

Ref	ES ref	Objective	Actions/commitments (incl. specific location and any monitoring required)	Assumptions (on which the action is based)	Achievement criteria and reporting requirements	When P - Pre- construction C - Construction O - Operation A - All	Completion record
		compensate for losses	<p>existing trees and ring-barking non-native trees.</p> <p>Protection of retained trees following standard practice (i.e. BS 5837:2012 Trees in relation to design, demolition and construction – recommendations). A construction exclusion zone will be established using steel mesh panel fencing, or similar, around retained trees where works are not limited by the existing roads or other associated hard infrastructure that could be protecting underlying tree roots.</p> <p>The retained veteran trees shall be assessed by an arboriculturist prior to construction to inform on any potential remedial works that maybe required to manage any structural or physiological defect(s) that increase the likelihood of full or partial failure of the tree or tree</p>		<p>Strategy by LPA.</p> <p>Quarterly ECoW progress reports to be provided to LPA during construction.</p>		<p>Comments: Previous submissions to support delivering this commitment is contained in the BMCS & LEMP (July 2022).</p>

Ref	ES ref	Objective	Actions/commitments (incl. specific location and any monitoring required)	Assumptions (on which the action is based)	Achievement criteria and reporting requirements	When P - Pre-construction C - Construction O - Operation A - All	Completion record
			part within falling distance of the works. This forms part of a duty of care to both people and property laid down in the Occupiers Liability Acts 1957 and 1984, the Highways Act 1980 and Health and Safety at Work Act 1974. Veteran habitat features are often defects, meaning any potential works will be sympathetic, whilst being reasonable in order to manage the risk of harm to people or property.				
B14	CH9	Compensate for habitat losses	Create species-rich grassland on the outer embankment of the reservoir. Plant new scrub and enhance retained hedgerows.	Stakeholder comments will be obtained from LPA, Environment Agency and Natural England.	Agreement of detailed Biodiversity Mitigation and Compensation Strategy by LPA. Quarterly ECoW	P, C	Initial: FW Date: 2028 – 2031 Note: part of the soft landscape works.

Ref	ES ref	Objective	Actions/commitments (incl. specific location and any monitoring required)	Assumptions (on which the action is based)	Achievement criteria and reporting requirements	When P - Pre-construction C - Construction O - Operation A - All	Completion record
					progress reports to be provided to LPA during construction.		
B15	CH9, CH15	To protect watercourses from construction related pollution risk	The PC will adopt best practice to avoid pollution of watercourses. This is to include, but is not limited to adherence to Guidelines for Pollution Prevention (GPP), latest Environment Agency pollution guidance available from data.gov, and Construction Industry Research and Information Associated (CIRIA) guidance on the control of water pollution from construction sites.	Contractual responsibilities between Portsmouth Water and PC. Pollution prevention measures will be detailed in a CEMP. The PC will have access to relevant guidance material.	No reportable incidents of construction related watercourse pollution above thresholds set within the water quality monitoring strategy.	P,C	Initial: FW. As set out in the Water Quality Management Plan. Date: Oct 2023

Ecological Mitigation, Compensation & Enhancement Measures

Ref	ES ref	Objective	Actions/commitments (incl. specific location and any monitoring required)	Assumptions (on which the action is based)	Achievement criteria and reporting requirements	When P - Pre-construction C - Construction O - Operation A - All	Completion record
B22	CH9	Protection of bats and compensation for loss of roosting opportunities	Felling methods to minimise risks to individual bats will be followed as set out in the bat licence method statement (for roost trees) and (for non-roost trees) a Precautionary Method of Working. These will set out timing and methods of working. Inclusive of any bat boxes required under the licence, at least one bat box will be erected for each tree with high or moderate bat potential that is felled.	Licence to be obtained from Natural England prior to felling of any roost trees	Work to be undertaken in accordance with licence. Quarterly ECoW progress reports to be provided to LPA during construction.	P, C	Initial: PW Date: Ongoing
B23	CH9	Protection of bats from indirect harm	Mitigation will be provided for lighting during construction and operation. Any temporary lighting required during construction will be designed to minimise light spill. Permanent lighting will comprise hooded luminaires directed away from vegetation, particularly the boundary	Stakeholder comments will be obtained from LPA and Natural England on detailed lighting design.	Quarterly ECoW progress reports to be provided to LPA during construction.	A	Initial: FW. Lighting Strategy prepared for construction, incorporating mitigation for bats. Date: Ongoing

Ref	ES ref	Objective	Actions/commitments (incl. specific location and any monitoring required)	Assumptions (on which the action is based)	Achievement criteria and reporting requirements	When P - Pre-construction C - Construction O - Operation A - All	Completion record
			hedgerows and treelines to avoid any light spill onto retained vegetation. Lighting will follow good practice current at the time of detailed design. The new lighting will be task-related, associated with the visitor centre and associated car park and with no lighting on the access roads. The lux level will be as low as possible to meet their purpose safely and effectively.				
B24	CH9	Protection of dormice and compensation for habitat loss	Vegetation clearance and tree felling methods to minimise risks to individual dormice will be followed as set out in the dormouse licence method statement. This will set out timing and methods of working.		Work to be undertaken in accordance with licence. Quarterly ECoW progress reports to be provided to	P,C	Initial: PW Date: Ongoing

Ref	ES ref	Objective	Actions/commitments (incl. specific location and any monitoring required)	Assumptions (on which the action is based)	Achievement criteria and reporting requirements	When P - Pre-construction C - Construction O - Operation A - All	Completion record
					LPA during construction.		
B25	CH9	Protection of otters	Precautionary pre-clearance survey will be undertaken at watercourses and areas of scrub and woodland linked to watercourses. Vegetation clearance in these areas will follow a Precautionary Method of Working. Light spill on watercourses will be avoided.	Further mitigation to be agreed with LPA if evidence of otters is found.	Quarterly ECoW progress reports to be provided to LPA during construction.	P, C	Initial: PW Date: 2022
B27	CH9	Protection of badgers	Precautionary pre-clearance survey will be undertaken at areas of suitable habitat. Vegetation clearance in these areas will follow a Precautionary Method of Working.	A licence will be obtained if badgers colonise the site and a sett requires closure.	Quarterly ECoW progress reports to be provided to LPA during construction.	P, C	Initial: FW Date: 2023 – end of construction works. The Ecological Management Plan (doc no. HTR-RHD-ZZ-ZZ-PL-Z-0001) covers the protection of badgers.

Ref	ES ref	Objective	Actions/commitments (incl. specific location and any monitoring required)	Assumptions (on which the action is based)	Achievement criteria and reporting requirements	When P - Pre-construction C - Construction O - Operation A - All	Completion record
B28	CH9	Protection of nesting birds	Precautionary pre-clearance survey will be undertaken at areas of suitable habitat if clearance is required in the nesting season (typically March to August). Vegetation clearance in these areas will follow Precautionary Method of Working.		Quarterly ECoW progress reports to be provided to LPA during construction.	P, C	Initial: FW. Pre-clearance surveys undertaken in 2023. Date: Ongoing
B30	CH9	Protection of reptiles	Retained vegetation will be protected for use as receptor sites. Clearance of suitable habitat will follow a Precautionary Method of Works. This is likely to include a combination of translocation and displacement of animals into enhanced adjacent retained habitat. The PMW will set out the season and method of clearance.			P,C	Initial: FW. Precautionary Methods of Working are being followed. Date: Ongoing
B32	CH9	Conservation of terrestrial and riparian	Detailed design and the measures set out in the detailed Biodiversity Mitigation and Compensation Strategy		Agreement of detailed Biodiversity	P, C	Initial: BMCS issued by Portsmouth Water

Ecological Mitigation, Compensation & Enhancement Measures

Ref	ES ref	Objective	Actions/commitments (incl. specific location and any monitoring required)	Assumptions (on which the action is based)	Achievement criteria and reporting requirements	When P - Pre-construction C - Construction O - Operation A - All	Completion record
		invertebrate assemblage	will include features to benefit terrestrial and riparian invertebrates. Examples include variation in grassland height, creation and retention of edge vegetation, woodland enhancement, inclusion of aspen in planting design and retention and placement of standing and ground level dead wood.		Mitigation and Compensation Strategy by LPA.		Date: July 2022
B33	CH9	Avoid spread of invasive non-native species	CEMP will include detailed methods to minimise risks of spreading invasive non-native species by managing risks and removing them. Target species will include non-natives in the retained woodland. Strict measures will be followed, in particular, to minimise risks of spreading parrot's feather.		Agreement of CEMP by LPA. Agreement of detailed wetland design by LPA.	P, C	Initial: FW. As set out in the Invasive Non-native Species Management Plan. Date: Dec 2023
B35	CH9	To report as required under licences.	Monitoring requirements will be met, as set out in the bat and dormouse licences.		Reports to be provided to Natural	A	Initial: Portsmouth Water Date:

Ecological Mitigation, Compensation & Enhancement Measures

Ref	ES ref	Objective	Actions/commitments (incl. specific location and any monitoring required)	Assumptions (on which the action is based)	Achievement criteria and reporting requirements	When P - Pre- construction C - Construction O - Operation A - All	Completion record
					England and copied to LPA.		