

HOGWOOD FARM, FINCHAMPSTEAD

LANDSCAPE AND ECOLOGICAL MANAGEMENT PLAN – PARCELS 4 and 5

Prepared for CALA Homes Thames Ltd

by

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HDA Document Control and Quality Assurance Record

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1 INTRODUCTION

1.1 Site location and summary description

1.1.1 This document provides a Landscape and Ecological Management Plan (LEMP) in relation to Parcels 4 and 5 of the development of approximately 110ha of land at Hogwood Farm, Finchampstead. The Parcels 4 and 5 development area comprises approximately 9ha of land, hereinafter referred to as 'the site' and 'the management area'. The site centre is located by National Grid Reference SU 7653 6421. The study was commissioned by CALA Homes Thames Ltd in May 2024.

1.2 Development proposals and context

1.2.1 Planning permission (O/2014/2179 and 140764) was granted in January 2017 for a hybrid application. This comprises:

- Outline permission for demolition of all existing buildings on site; up to 1,500 new dwellings; employment floor space; a Neighbourhood Centre; a primary school; sports pitches and associated pavilion building; highways infrastructure; associated landscaping, public realm, open/green space and sustainable urban drainage systems; and
- Full permission for a 29.7ha Suitable Alternative Natural Greenspace (SANG) in the south of the site.

The hybrid planning permission was subsequently amended by a Section 73 application (181194) which was approved in November 2018.

1.2.2 This Parcel 4 and 5 LEMP has been prepared in response to Condition 21 of the planning consent which states:

"Prior to submission of any Reserved Matters application other than in respect to the Nine Mile Ride Extension South an outline Landscape and Ecological Management Plan shall be submitted to and approved in writing by the local planning authority. Thereafter, each Reserved Matters Application for any sub phase of the development shall include a detailed Landscape and Ecological Management Plan for that sub phase of the development. Each detailed Landscape and Ecological Management Plan shall be in accordance with the mitigation, contingency and enhancement measures contained within paragraph 7.5.5 to 7.7 of the submitted Environmental Statement revision 2 (Royal Haskoning DHV, September 2014) and the approved outline Landscape and Ecological Management Plan. The detailed Landscape and Ecological Management Plan(s) shall be implemented in accordance with the approved plan unless otherwise approved in writing by the local planning authority."

1.2.3 In accordance with Condition 21, this document identifies the measures included in the landscape scheme to maintain and enhance the habitat resource of the Parcels 4 and 5 site, and to ensure that retained and newly created habitats are managed to maximise their value for wildlife in the long-term. These measures reflect the recommendations included in paragraphs 7.5.5 to 7.7 of the Environmental Statement (Royal Haskoning DHV, 2014) and are in keeping with the 'Outline Site-wide Landscape and Ecological Management Plan' prepared for the wider site and the Parcels 4 and 5 site in its entirety (HDA, 2018a).

1.2.4 The extent of the Parcels 4 and 5 management area subject of this LEMP is shown on the plans in *Appendix A*. The LEMP does not cover land within private residential curtilages which will be subject to management by individual householders.

1.2.5 The main aims of this LEMP are to:

- i. Describe habitat restoration, creation and landscape enhancement works proposed for the management area, including outline details of formal and informal landscape planting within areas of public open space;
- ii. Describe measures to provide new and enhanced opportunities for protected and notable species recorded within the Parcels 4 and 5 site;
- iii. Identify prescriptions for the establishment and long-term management of habitats and features of nature conservation interest; and
- iv. Identify mechanisms to ensure successful establishment of these features and their long-term management.

1.2.6 The landscape planting and habitat creation, retention and enhancement works across the Parcels 4 and 5 management area are shown on the Landscape Masterplan and Soft Landscape Proposals provided in *Appendix A* and *B* (CSA, 2024a-f;). The landscape proposals for the site include:

- Development focused in the central areas of the Parcels 4 and 5 site, which are currently dominated by two fields of ruderal vegetation, bare ground, a small area of scrub and a hardstanding construction access track and compound. Which are of limited ecological value;
- Retention of the majority of existing boundary hedgerows, woodland and treelines, with buffers afforded between the development and boundary features. The buffers will comprise areas of informal green space dominated by semi-natural habitats such as scrub and tree planting and rough and meadow grassland.
- Provision of formal hedgerow and shrub planting across the proposed development area.
- Protection of areas of ancient and aged woodland located along the western and eastern site boundaries, respectively.
- Retained and newly created habitats will tie into the landscape structure of the wider site to complement off-site features and facilitate the movement of wildlife across the site and the wider area.

2 BACKGROUND

Designated sites

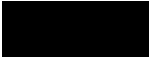
2.1 No statutory designations pertain to the Parcels 4 and 5 management area or adjacent land. The area of woodland located in the western part of the Parcels 4 and 5 management

area, is however listed on Natural England's Inventory of Ancient Woodland. Ancient woodland is defined as any wooded area that has been continuously wooded since at least 1600AD. Although ancient woodland is not subject to legal protection in its own right, ancient woodland habitats are regarded as irreplaceable under the 2023 National Planning Policy Framework (NPPF) and Natural England and the Forestry Commission have provided Standing Advice for ancient woodland (a material consideration in the planning process). Lowland Mixed Broadleaved Woodland is also identified as a Habitat of Principal Importance under Section 40 of the 2006 NERC Act and is therefore a material consideration in the planning process.

Habitats

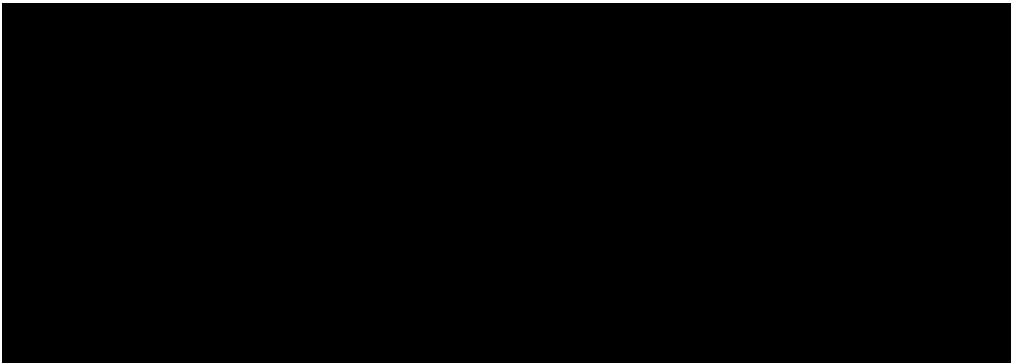
- 2.2 In general terms, the Parcels 4 and 5 site currently comprises two fields supporting ruderal vegetation, bare ground, a small area of scrub and a hardstanding construction access track and compound area. The fields are bounded by areas of woodland, including ancient and aged woodland¹, in addition to native hedgerows with wet and dry ditches. The Parcels 4 and 5 site is bordered to the south by the existing Suitable Alternative Natural Greenspace (SANG) (delivered as part of the wider Hogwood Farm development); to the north by Parcels 2 and 3 of the development which are currently under construction; to the east by a future development parcel which currently comprises modified grassland and bare ground; and to the west by the A327 and Sheerlands Road, with ancient woodland and fields beyond. The location and boundary of the Parcels 4 and 5 site is shown in *Appendix A*.

Species

- 2.3 In addition to the ecological desk study and extended Phase 1 habitat survey, a suite of ecological surveys has been conducted at the Hogwood Farm site since 2008, including specialist surveys for the following species/species groups:
- Bats;
 - Water Voles;
 - Otters;
 - Dormice;
 - 
 - Breeding birds;
 - Reptiles; and
 - Great Crested Newts.

¹ The presence of the areas of ancient and aged woodland is specifically addressed in the Detailed Ancient Woodland Assessment and Mitigation Strategy: Parcels 4 and 5 (HDA, 2024a).

2.4 The methodologies, habitat descriptions and results of the surveys conducted to inform the Environmental Statement are detailed in the *Chapter 7: Biodiversity, Flora and Fauna* (Royal Haskoning DHV, 2014). Where appropriate, additional surveys have subsequently been undertaken by HDA between 2017 and 2024 to update the earlier surveys and to inform ongoing development design works. In addition, further ecological surveys have been carried out of parts of the site by Stantec in 2020 in relation to the construction of the Nine Mile Ride Extension (NMRE) road within the wider site (Stantec, 2020a; Stantec, 2020b). With regard to the outcome of this work, a summary of key considerations for the Parcels 4 and 5 site is given below:

- **Bats:** One tree (Tree 338) adjacent to the site supports a low status, non-breeding bat roost for an individual Soprano Pipistrelle will be retained within the scheme. The location of this tree is shown in *Appendix C*. Bat roosting features are proposed on buildings and trees across the site to ensure the continued favourable conservation status of the local bat population (Detailed Bat Mitigation Strategy (HDA, 2024b)). Boundary features, such as existing treelines, woodland and hedgerows are used by low numbers of foraging and commuting bats.
- 
- **Breeding Birds:** Breeding bird surveys of the Parcels 4 and 5 site and wider site have recorded notable bird species including Lapwing, Skylark, Dunnock, Song Thrush, House Sparrow, Reed Bunting, Mistle Thrush and Red Kite.
- **Reptiles:** Historic surveys have identified low populations of Common Lizard, Slow-worm and Grass Snake across the wider site, with Slow-worm recorded in the Parcels 4 and 5 site (HDA, 2021). The most recent survey in 2023 recorded no reptiles across the site and wider site (HDA, 2024d).
- **Invertebrates:** No surveys for invertebrates have been undertaken as it is considered that the proposed development areas are unlikely to be of significant local interest for this group. Higher quality areas of invertebrate habitat within the Parcels 4 and 5 site include hedgerows, woodland and other boundary features.

² Following approval of a Natural England licence application to temporarily close four setts in the north-east of the wider site due to the proximity of the NMRE works (a main sett, the annex sett and two of the outlying setts), Stantec carried out temporary sett closures in 2020. As part of these works two replacement setts were constructed, one within the Green Corridor associated with Phase 2 in the north-west of the wider site and one within the SANG (Stantec, 2020).

- **Plants:** The management area is currently dominated by ruderal fields and bare ground and notable plant species or plant assemblages are unlikely to be present. Several invasive species included on Schedule 9 of the 1981 Wildlife and Countryside Act (as amended) have been recorded from the wider site and its surrounds. These include Rhododendron, Variegated Yellow Archangel and Japanese Knotweed. It is an offence to release, plant or cause to grow in the wild any plant included on this schedule of the Act. Measures to identify, reduce and minimise the risk of spreading invasive, non-native plant species are detailed in the 'Non-native Invasive Species Management Plan – Parcels 4 and 5' (HDA, 2024e) and in the management prescriptions set out in *Section 4* below.
- **Other species:** The findings of the survey work carried out indicates that the Parcels 4 and 5 site is unlikely to support Dormice, Otter, Water Voles or Great Crested Newts.

3 MANAGEMENT OBJECTIVES

3.1 Objectives of the Parcels 4 and 5 Landscape and Ecological Management Plan

3.1.1 This Parcels 4 and 5 LEMP is based on the following objectives, which are set out in the Site-wide Outline Landscape and Ecological Management Plan (HDA, 2018a). These are derived from: (i) current site conditions, (ii) nature conservation legislation, planning policy, and national and local nature conservation guidance, and (iii) future land use. The objectives are:

Objective 1: The ecological potential of the management area: maintain and enhance the biological interest and character of the management area.

Objective 2: The characteristics of the local landscape: Maintain and enhance the landscape attributes of the key habitats associated with the management area and its local environs.

Objective 3: Access and amenity: Provide an attractive environment and opportunities for informal recreation available to residents of the new development and existing residents of the surrounding area.

3.1.2 The objectives have been derived from the context of the proposed development, Condition 21 of planning consent, and the landscape and ecological character of the site and its surrounds. Further information on the management objectives, including background policy and guidance, is provided in the Site-wide Outline Landscape and Ecological Management Plan (HDA, 2018a).

4 MANAGEMENT PRESCRIPTIONS

4.1 This section describes the habitat creation and enhancement measures proposed within the management area and provides prescriptions for how they will be implemented and managed in the long-term to achieve the ecological and landscape objectives identified in *Section 3*. Measures to enhance the management area for protected and notable species are also provided. Where prescriptions relate to the creation, enhancement and

management of habitats in relation to wildlife and landscape objectives, prescriptions are divided, where appropriate, into those to be undertaken for their creation and management (generally the first one to three years) followed by measures for ongoing management. The location and extent of newly created and enhanced habitats proposed within the management area are summarised on the *Landscape Masterplan* provided in *Appendix A*, along with detailed drawings and an outline of seed mixes and plant species to be used in the *Landscape Proposals Plans* in *Appendix B*. Management schedules are given in *Appendix D* which set out the timings of prescribed activities.

4.2 Objective 1:

The ecological potential of the management area: maintain and enhance the biological interest and character of the management area.

PRESCRIPTIONS

4.2.1 Grasslands

4.2.1.1 The grassland within the management area falls into three main categories, depending on location and ground conditions. These are:

- Meadow grassland
- Rough grassland
- Amenity grassland

4.2.1.2 Each of these grassland types and measures for creation, enhancement and management are described below. The general distribution of meadow and amenity grassland are shown on the *Landscape Proposals Plans* provided in *Appendix B*. Rough grassland is not shown as this will form narrow linear bands in association with woodland edge, scrub, hedgerow/treelines and wetland habitats across the management area, as described below.

Meadow grassland

4.2.1.3 Meadow grassland with a diverse herb-rich sward will be established within a mosaic of grassland, scrub, wooded and hedgerow habitats around the margins and through the centre of the Parcels 4 and 5 site.

4.2.1.4 The management area is currently dominated by ruderal vegetation and bare ground. In order to enhance the grassland resource of the management area following development, species-rich meadow grassland will be created using conservation seed mixes such as 'flowering meadow' (Germinal Seeds Flowering Meadow Mix (WFG2) or similar).

4.2.1.5 The prescriptions for creation of meadow habitats within the management area is given below:

- Where new grassland is to be created, if necessary the weed burden will first be reduced using herbicide. Consideration will also be given to soil inversion if nutrient levels are expected to be very high.
- If time permits a 'stale seed bed' is to be established, allow the area to colonise with weeds from the existing soil seed bank following initial cultivation and an additional application of herbicide applied to remove any weed growth.
- Area should consist of min. 150mm deep existing retained topsoil (free from weeds):subsoil mix (50:50) over existing site subsoil layer. No imported topsoil should be used in these areas.
- A fine, firm and level seedbed will then be created prior to sowing with a species-rich meadow grassland seed mix using a seed mix appropriate to the ground conditions. All stones and debris greater than 50mm in size to be removed and disposed of off-site.
- Wildflower seeding is to be undertaken preferably in spring (early March to late June) or alternatively in autumn (mid-August to October). Sowing is to be undertaken by hand broad-casting on a calm day with no wind, the contractor should mix the seed evenly with a fine, dry sand to bulk up the sowing mix. Following seeding the area will be hand raked, lightly rolled and fully water to the full cultivation depth.
- Contractors will take the necessary precautions to ensure all grass areas are protected throughout the establishment period, with the use of fencing where appropriate.
- During the first year after sowing, from mid-summer onwards the meadow grassland will be regularly cut (every 6-8 weeks to a height of 10cm) to encourage strong root growth. All cuttings will be removed from the grassland and where appropriate, suitable amounts used to create 'habitat piles' or disposed of appropriately.
- The newly established meadow grassland will be mown to no less than 10cm in height once a year, at the end of August, and the cuttings removed. This will allow flowering and seed set of most species over the summer. Over time this should further reduce the fertility of the soil favouring increased dominance of flowering herbs.
- On rotation, selected areas of the meadow grassland (10%) will be left uncut during each mowing period in order to provide additional refuge habitat for reptiles, small mammals and invertebrates, and to encourage a more diverse flora.
- If required, injurious weed species (e.g. Creeping Thistle, Broad-leaved Dock, Common Ragwort) will be controlled, particularly whilst the grassland is becoming established. This will be achieved either through topping before flowering or using spot treatment with herbicide.

- No fertilisers, lime or farmyard manure will be added to the newly created areas of meadow grassland.

Rough/Tussocky Grassland

- 4.2.1.6 Bands of rough grassland (2-5m in width) will be sown with a meadow grassland mix (Germinal Seeds Flowering Meadow Mix (WFG2) or similar) adjacent to existing and proposed scrub and wetland edges, and along hedgerows, treelines and woodland edges across the management area. Where appropriate these could alternatively be created by allowing natural regeneration or derived from existing retained grassland. Creation of the rough/tussocky grassland will follow the same methodology outlined for the meadow grassland above and managed by cutting just once every 2-3 years in order to establish a tussocky sward favoured by small mammals, reptiles and hibernating invertebrates.

Amenity grassland

- 4.2.1.7 Areas of amenity grassland will be created and managed along roadside verges and footpaths, and within open space to create informal paths and areas suitable for recreation. These will be seeded using a low maintenance amenity grass mix (Germinal Seeds Low Maintenance seed mix (A22) or similar) or turfed using a low maintenance amenity grass mix (Rolawn - 'Medallion' or similar).

- 4.2.1.8 The prescriptions for creation of amenity grassland habitats are outlined below:

Areas sown with seed

- The creation of the amenity grassland sown from seed will follow the same methodology outlined for the meadow grassland above, with the addition of an application of a pre-seeding slow-release granular fertiliser (7:10:10 NPK) applied at a rate of 250kg/ha approximately 7 days prior to seeding and raked into the top surface.
- Once established, new areas of amenity grassland sown with seed will be incorporated into the long-term management regime as described below.

Areas laid with turf

- The creation of the amenity turf will follow the same methodology outlined for the meadow grassland above.
- Finished levels of turfed areas will be 30mm above adjacent paved surfaces.
- Lay turf with broken joints, well butted up, working from planks laid on previously laid turves, during appropriate season and weather condition. Adjust levels by raking out of filling with fine soil under turves. Consolidate by lightly and evenly firming with wooded beaters as laying proceeds. Do not use rollers.
- Dress turf with fine topsoil and brush in to fill joints and thoroughly water completed turf within 24 hours of laying.

- When grass is 50mm high, collect debris, litter and any stones later in dry conditions cut grass to between 25-30mm. Collect and dispose of all arisings.
- Once established, new areas of amenity grassland established using turf would be incorporated into the long-term management regime as described below.

4.2.1.9 The following long-term mowing and maintenance regime will be applied to the amenity grassland across the management area. To give the grasses the best chance of thriving, do not mow the grass too short, especially during periods of prolonged dry or cold weather. This mowing and maintenance regime for established amenity grassland will involve:

- Areas of amenity grass once established for twelve months, are to be cut on a monthly basis during each growing season (i.e. between March and October) to allow time between cuts for plants in lawn to flower. However, it will be weather permitting and should be reviewed to suit extreme weather i.e. extremely dry arid conditions it may be necessary to reduce the cut leaving the grass slightly longer. The height of flowering lawn shall not exceed 80mm before cutting, topped to a height of 50mm. In periods of drought, some dieback of grass is likely. Watering is a solution to this but is often unsustainable. In some years it may be necessary to reseed badly affected areas at the end of the season.
- Moss should be accepted for shaded areas, but kept in check by raking, which is best done in spring when the grass is growing well so that the grass can quickly recover and grow into the gaps created by moss collection.
- Most grass will be mown as required throughout the year, although the main mowing period is between March and October, during this period mowing should ideally be undertaken fortnightly.
- Any short grass that abuts a vertical obstacle will be strimmed at the same time as each grass cut to achieve a neat edge. In March and September of each year, all grass edges will be trimmed in accordance with the above paragraph, and re-cut to a straight line or smooth curve as appropriate using a half-moon edging tool or similar.
- Swathes of arisings will be collected up and composted or removed from the site.
- Any damage to the sward caused by animals (Moles, Rabbits, [REDACTED]) or by vehicles or general wear and tear, will be reinstated by top dressing, re-cultivation, re-seeding and watering, at the correct season, as necessary. Any reinstated areas to be protected and subject to establishment maintenance as itemised above. If grass growth is poor it may be necessary to apply a spring and / or autumn fertilizer to the sward, to encourage vigour. Similarly, turf aeration and scarification may also be necessary, to alleviate compaction and control the development of thatch.

4.2.2 Native hedgerows

4.2.2.1 Existing hedgerows bordering the management area are limited to a native defunct hedgerow with trees along the northern and northern section of the eastern site boundary.

4.2.2.2 Where possible, the hedgerow network within and bordering the site will be strengthened and enhanced through appropriate habitat creation, enhancement and management works. Along with creation of other linear habitats, this will contribute to enhanced habitat connectivity across the site, the wider site and the wider countryside. This will be achieved through the following measures:

Existing hedgerows:

- Where gaps occur in retained sections of hedgerow, these will be cleared of ruderal species and Bramble and filled using native hedgerow plants of local provenance. New hedgerow plants will be protected against pest damage using spiral guards (or biodegradable equivalent), maintained for no less than 3 years after planting. A one-metre weed-free zone will be maintained around new hedgerow plants using translocated herbicide (e.g. glyphosate) or mulch as required.
- Existing standard trees within the hedgerows will be maintained and where appropriate suitable plants will be excluded from the cutting regime to provide new mature trees.
- The hedgerows will be complemented by rough grassland buffers of up to 5m (*Section 4.2.1.6*) where appropriate to create an 'ecotone' habitat of high interest for biodiversity.
- Existing mature hedgerows will be trimmed no more frequently than once every 2-3 years on a rotational cutting scheme. This will encourage bushier hedges and fruiting of hedgerow plants in addition to reducing maintenance costs.
- All native hedgerows will be trimmed between January and February, allowing the majority of hedgerow fruits to be eaten by birds and other wildlife prior to cutting.
- No more than one third of hedgerows within the management area will be trimmed within the same 12 months.

New species-rich hedgerows:

- New species-rich hedgerow will be created along the eastern and southern site boundaries adjacent to the aged woodland. Species within the native hedgerow planting will include Hazel, Hawthorn, Privet, Blackthorn, Elder, Spindle and Dog rose.
- Further sections of native and ornamental hedgerows are proposed within the residential area.
- Newly planted hedgerows will be trimmed annually for the first 3 years in order to train them into a good shape. Following this period the new sections of hedgerow will be incorporated into the management regime for the existing hedgerows as

described above. A possible exception to this is where new ornamental hedgerows are proposed as part of the formal landscape associated with development areas; these hedges will be managed by cutting up to 3 times per year with all arisings removed.

- New hedgerow plants will be protected against pest damage using spiral guards (or biodegradable equivalent), maintained for no less than 3 years after planting. A one-metre weed-free zone will be maintained around new hedgerow plants using translocated herbicide (e.g. glyphosate) or mulch as required.

4.2.2.3 The above proposals, in combination with other scrub and tree planting described below, will maintain and improve habitat corridors across the management area and wider site.

4.2.3 **Tree and scrub planting and management**

4.2.3.1 Landscape proposals for structural planting include lines of native scrub planting along the western and northern site boundaries to form ecotones with the adjacent woodland and hedgerows and pockets of dense scrub along the treeline through the centre of the site and along the northern margin of the aged woodland located along the eastern site boundary, scattered individual trees and shrubs across the management area using a mix of native species appropriate to the local area. In combination with proposed grassland, hedgerows and wetlands this will create a varied mosaic of habitats, benefitting a range of species and providing habitat connectivity around the Parcels 4 and 5 site.

4.2.3.2 Individually planted standard trees will include Field Maple, Hornbeam, Beech, Wild Cherry, Silver Birch, Hazel, Apple, Small-leaved Lime, Alder and Wild Service Tree. The areas of scrub planting comprise a mix of Hawthorn, Holly, Privet, Wayfaring Tree, Honeysuckle, Dogwood and Guelder Rose.

Establishment Phase

4.2.3.3 The following works will be carried out to ensure establishment:

- Planting will be restricted to between late October and March, unless additional provision for watering during dry periods is made.
- Surface vegetation will be cleared using proprietary herbicide where appropriate and install scrub plants into isolated pre-prepared planting pits, backfilling with either retained topsoil (free from weeds) or imported topsoil (sandy loam, General Purpose grade to BS3882:2015) or a combination as necessary.
- Incorporate a soil conditioner/ameliorant in the form of peat free tree and shrub compost or well rotted spent mushroom compost into backfill material, incorporating a slow release fertiliser e.g. Enmag (or similar) at a rate of 5g per pit (scrub planting) or soil improver at a rate of 1kg per pit (tree planting), mixed thoroughly.

- Trees will be planted in pits min. 1000 x 1000 x 700-800mm deep, For very large stock pit dimensions should be increased accordingly.
- Newly planted trees and shrubs will be protected against pest damage using suitable guards.
 - o Where rabbits are a known issue, scrub areas are to be enclosed by min 900mm high rabbit proof fencing (specification outlined in Soft Landscape Proposals Plan (CSA 2024c and d).
 - o If additional deer protection fencing is required, scrub areas are to be fully enclosed by min. 1.8m plastic mesh fencing, in areas where rabbits are also a known issue an additional 300mm high section of galvanised mesh (chicken wire) to be fixed to the lower portion of the deer fencing (specification outlined in Soft Landscape Proposals Plan (CSA 2024c and d).
 - o Small/feathered trees protected by biodegradable 'Nature Tubex Tree Shelter' by Green-tech Ltd. (or equal and approved), should Red or Fallow Deer be present then tree guard/shelter should be increased to 1.8m).
 - o Coniferous trees and/or Beech transplants only protected by open mesh tree guards.
 - o Standard trees and scrub planting will be protected by biodegradable spiral guards (Green-tech Ltd. Or equal and approved) (specification outlined in Soft Landscape Proposals Plan (CSA 2024c and d).
- All scrub plants to be installed with a min. 500mm square, proprietary 'Treebio Biodegradable Weed Mat' mulch mat (by Green-tech Ltd. Or equal and approved), securely pegged in place and weighted down with bark mulch.
- Trees and shrubs will be kept free of weeds for up to five years after planting (or less if closed canopy is achieved earlier) to enhance growth rates, by the application of a translocated herbicide (except within 5m of any waterbody where hand pulling or mulching will be required) at a minimum frequency of 3 applications per annum generally in May, July and September. Any failed trees or shrubs within the first five years after planting will be replaced (and maintained for a subsequent five years).
- Within areas of dense tree and shrub planting, grassland between the mulched/treated bases will be subject to strimming until a closed canopy has formed except where tussocky interlying grassland or natural regeneration of interlying vegetation is preferred.
- Any trees that are staked will have their ties checked 3 times per year (or as herbicide spraying takes place) and replaced as necessary if too tight/loose or broken. Stakes shall remain in position until trees are self-supporting.
- Trees will be pruned to remove dieback or broken/vandalised branches as they arise.

- Newly planted trees and scrub will be watered regularly in the first year after planting to prevent plant loss. Watering of trees in the first growing season is dependent on size and should follow the guidelines below:
 - Feathered – 36 litres per month;
 - Standard – 45 litres per month.

Watering should be reduced/stopped in periods of wet weather. Water trees in second growing season during dry spells in weather.

Maintenance Phase

4.2.3.4 Newly established and existing trees will be managed in the long-term to enhance the biodiversity of the management area, protect public safety, ensure their long-term health and viability, and to maintain the visual landscape character of the area. This will involve the following:

- Annual inspections of all trees will be carried out by a suitably qualified arboriculturist in order to identify dangerous trees and branches requiring removal.
- Standing dead or decaying timber and fallen deadwood will be retained where safe to do so to provide wildlife habitat.
- Fallen, dying and dead mature trees will only be replaced with young trees where appropriate. Any replacement trees will be protected from pest damage and weeds as outlined in the establishment section above.

4.2.3.5 In order to maintain a mosaic of trees, scrub, grassland and wetland habitats within the management area it will be necessary to prevent encroachment of scrub into areas of grassland and marginal vegetation. This will be achieved through:

- The introduction of a long-term mowing regime for the rough and meadow grassland patches within the management area (as outlined in *Section 4.2.1*) will help to prevent scrub encroachment.
- Scrub habitats within the management area shall be reviewed each winter and techniques for scrub control, i.e. cutting back with or without stump treatment, will be implemented as and where deemed necessary. Such work will be undertaken outside of the bird nesting season.
- Where appropriate, once established scrub will be coppiced on a short rotation of approximately 5 years in order to prevent succession into woodland. No more than 20% of the scrub will be coppiced in any one year. Selected areas of scrub may be left to succeed to woodland where appropriate.

4.2.3.6 It is expected that the above proposals would enhance the tree and scrub resource and enhance habitat connectivity across and around the management area and wider site. The locations of existing hedgerow/linear scrub habitats and the extent of retained and

proposed woodland, hedgerow, scrub and scattered tree planting across the site is shown in *Appendix A*.

4.2.4 **Wetlands**

4.2.4.1 A number of the existing ditches within the site will be retained and enhanced, including the ditch located along the eastern margin of the aged woodland on the eastern site boundary and the ditch associated with the treeline in the centre of the site. Where it is unavoidable that retained ditches are crossed by access infrastructure, the number of crossing points and length of culverts have been kept to a minimum.

Establishment:

- Any man-made debris will be removed and disposed of as appropriate.
- In-channel works will be carried out to establish and extend areas of marginal and aquatic vegetation. This will include measures to create a more dynamic channel including re-profiling of bankside habitats to create berms and ledges to allow for a gentler gradient into the water for colonisation of aquatic vegetation.

Maintenance:

- Checks for the presence of non-native invasive plant species will be carried out at least once annually, if presence is recorded they will be subject to control. Using a methodology appropriate to the species present and the presence of the watercourse.
- Aquatic and marginal vegetation will be managed by cutting or hand pulling on an 'as needed' basis to maintain at least 50% open water areas and a variety of edge habitats.
- Any removed aquatic or marginal vegetation will be left at the ditch edge for up to three days to allow any wildlife to re-enter the ditch. Some piles may be left to provide refuge opportunities for amphibians and reptiles, but generally all arisings will be removed from site.
- Removal of sediment from the ditch will be as required. No more than 50% of marginal vegetation or silt will be removed from any one ditch during management in any one year. This work would be carried out during the winter.
- Management of self-seeded scrub will be carried out during the winter months to prevent excessive shading and encroachment into the wetland areas. Where not controlled by mowing of the grassland (see *Section 4.2.1*) this will be carried out through hand pulling and cutting.
- The function of the ditch network should be reviewed annually with regard to site surface water drainage requirements and remedial work, such as reprofiling, carried out if necessary, in the winter months.

4.2.5 **Woodlands**

4.2.5.1 Bands of broadleaved woodland are situated along the western, southern and part of the eastern site boundaries. One section of the broadleaved woodland located along the western site boundary is listed as ancient woodland on Natural England's Inventory of Ancient Woodland and the broadleaved woodland located along the southern and eastern site boundaries is considered to be aged woodland. The landscape scheme for Parcels 4 and 5 provides a range of habitats to complement the existing woodland habitats present.

Existing Woodland

4.2.5.2 Existing areas of ancient, aged and mature woodland within and bordering the site will be retained and enhanced within the development scheme³. In combination with the enhancement measures described above, including the creation of new hedgerow and scrub linkages and 'ecotone' habitats on woodland edges, the introduction of management to the existing woodland within the management area is expected to benefit a range of species. The proposed management (for the on-site areas of woodland which are not listed as 'ancient woodland' or 'aged woodland') will focus on:

Management and enhancement:

- *Removal of debris:* All man-made debris and abandoned items/waste (e.g. old fencing materials, farm equipment and redundant tree guards) will be cleared from the woodland.
- *Non-native invasive species:* The ecological value of many areas of existing woodland within the wider site is compromised by the presence of Rhododendron which outcompetes native shrub species and creates heavy shading compromising the ground flora. Rhododendron, and any other non-native species will be removed from the woodland areas using appropriate means of control. Ongoing checks for the presence of non-native invasive plant species will be carried out at least once annually across all areas of woodland, and if presence is recorded these will be subject to control using a methodology appropriate to the species present.
- *Selective thinning of trees and understorey:* Dense vegetation cover including trees and native shrubs will be thinned or coppiced where appropriate to encourage growth of ground flora and new saplings.
- *Establishment of woodland buffers:* A buffer zone of scrub, rough and meadow grassland will be established along the length of the woodland belt along the eastern site boundary (only area of woodland not classified as either ancient or

³ Please note that a 'Detailed Ancient Woodland Assessment and Mitigation Strategy: Parcels 4 and 5' (HDA, 2024a) has been produced for proposed works within and in proximity to the areas of ancient and aged woodland within this site. This details specific management works for the area of ancient and aged woodland and are not repeated in this document which focuses on the other areas of woodland located within the Parcel 4 and 5 application area.

aged woodland). The buffer is approximately 15m wide. All grassland within the buffer will be established in accordance with the prescriptions described in *Section 4.2.1* above and scrub within the buffer will be established in accordance with the prescriptions described in *Section 4.2.3*.

- *Maintenance and enhancement of deadwood interest:* Where safe to do so standing and fallen deadwood habitats within the woodland will be retained. Arisings from woodland management would be used to construct log/brash piles throughout the woodland and woodland edges to benefit a range of species including invertebrates, small mammals and reptiles.
- *Bat and bird boxes:* A varied selection of bat and bird boxes will be provided to enhance roosting and nesting habitat for a range of woodland species.

4.2.6 **Deadwood habitats**

4.2.6.1 Where safe to do so any standing and fallen deadwood arising from trees within the Parcels 4 and 5 site will be retained *in situ*. Where this is not possible, these arisings will contribute to log and brash piles that would be constructed at appropriate locations along woodland and scrub edges or hedgerow bases using additional arisings from other tree, hedgerow, woodland and scrub management works. Approximate locations of the proposed hibernacula and log and brash piles are shown within the *Detailed Reptile Strategy – Parcels 4 and 5* (HDA, 2024d).

4.2.7 **Ornamental planting**

4.2.7.1 In addition to provision of new native species planting in areas of open space, the landscape proposals also include formal ornamental shrub (including ground cover and climbing species), tree and hedgerow planting within residential areas of the development. These will be planted with a range of nectar-/pollen-rich flowers and fruit bearing shrubs and trees which benefit native wildlife such as invertebrates, bats and birds.

4.2.7.2 The extent of proposed ornamental planting is shown in *Appendix A*. Measures for the establishment of ornamental shrubs, trees and climbing plants within the site are given below along with maintenance of such planting within communal areas of the residential development. The maintenance of planting within curtilages of residential properties will be the responsibility of the new householders.

4.2.7.3 Ornamental tree, hedgerow, shrub and herbaceous planting works will be carried out during the construction phase of the development:

- Planting will be restricted, where possible, to between late October and April where possible to reduce need for supplementary watering.
- Where necessary newly planted trees will be protected against pest damage using guards around individual trees. Pests are likely to be restricted to rabbits, but it

may be necessary to replace guards with taller ones if, following the annual inspection, it is found that deer damage is an issue. Alternatively temporary fencing can may be used to ensure adequate protection (see section 4.2.3.3 and Soft Landscape Plan (CSA, 2024).

4.2.7.4 The following works would be carried out to ensure establishment:

- Trees and shrubs will be kept free of weeds for up to five years after planting (or less if closed canopy is achieved earlier) to enhance growth rates, by the application of a translocated herbicide at a minimum frequency of 3 applications per annum generally in May, July and September. Alternatively/in combination mulch may be used. Any failed trees or shrubs within the first five years after planting will be replaced.
- Any trees that are staked will have their ties checked 3 times per year (or as herbicide spraying takes place) and replaced as necessary if too tight/loose or broken. Stakes shall remain in position until trees are self-supporting.
- Trees will be pruned to remove dieback or broken/vandalised branches as they arise.
- Newly planted trees and shrubs will be watered regularly in the first year after planting to prevent plant loss. Watering of trees in the first growing season is dependent on size and should follow the guidelines below:
 - Feathered – 36 litres per month;
 - Standard – 45 litres per month.

Watering would be reduced/stopped in periods of wet weather. Water trees in second growing season during dry spells in weather.

- New ornamental hedgerows within the formal landscape associated with the development area will be managed by cutting up to 3 times per year with all arisings removed.

4.2.7.5 Newly established and existing trees will be managed in the long-term to enhance the biodiversity of the Parcels 4 and 5 site, protect public safety, ensure their long-term health and viability, and to maintain the visual landscape character of the area. This will involve the following:

- Annual inspections of all the trees will be carried out by a suitably qualified arboriculturist in order to identify dangerous trees and branches requiring removal.
- Standing dead or decaying timber and fallen deadwood will be retained where safe to do so, to provide wildlife habitat.
- Fallen, dying and dead trees and shrubs will only be replaced with young trees where appropriate. Any replacement trees will be protected from pest damage and weeds as outlined in the establishment section above.

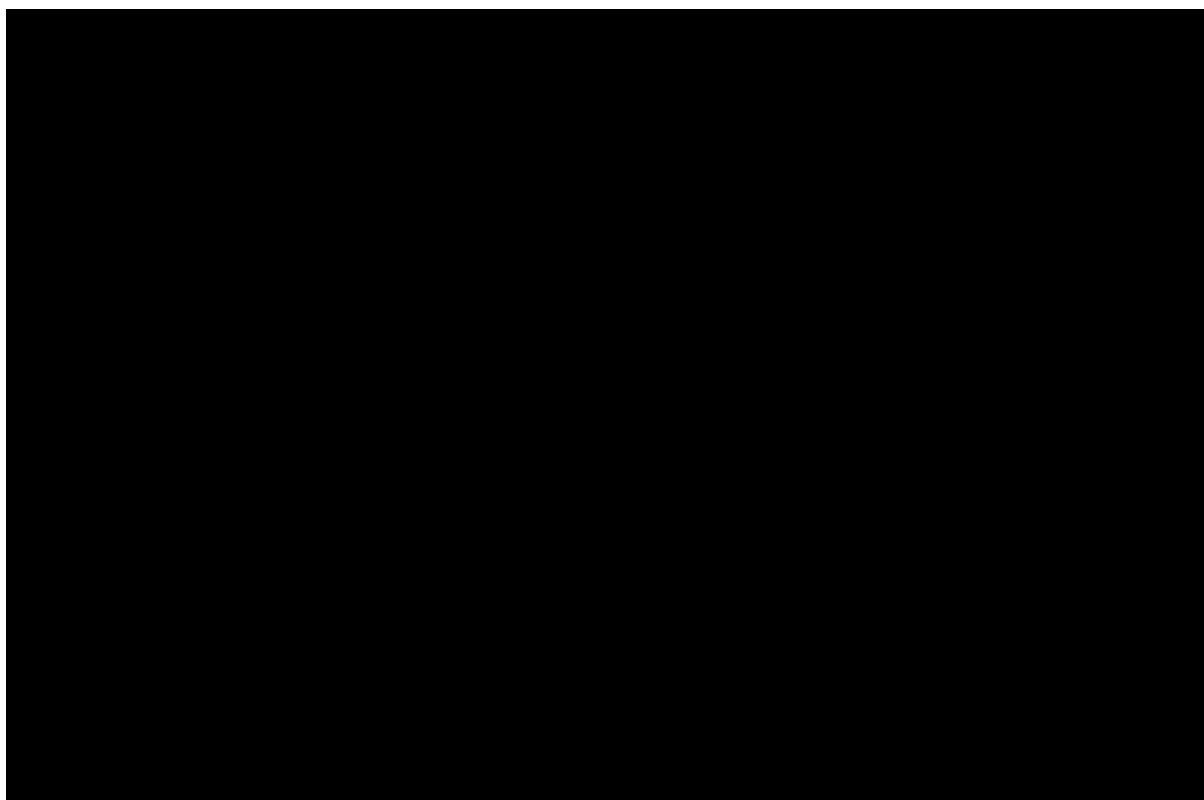
4.2.8 **Protected and notable species**

4.2.8.1 This detailed LEMP identifies how the above measures will indirectly benefit protected and notable species recorded using the site and its surrounds such as bats, Badgers, reptiles, birds and invertebrates. The following management tasks will also be carried out in order to provide specific features aimed at target species/species groups:

4.2.8.2 **Bats:**

- Management works will have regard to the presence of trees around the margins of the Parcels 4 and 5 site which either support roosting bats or have potential to support roosting bats, the current extent of which are shown on the plan in *Appendix C*. Where works to trees with potential to support roosting bats are proposed (e.g. for reasons of health and safety) the advice of a suitably qualified ecologist will be sought prior to works commencing.
- Artificial bat boxes will be installed on retained mature trees and new buildings to provide a range of opportunities for roosting bats (see 'Detailed Bat Mitigation Strategy – Parcels 4 and 5' (HDA, 2024b)). As deliberate (or reckless) disturbance to bats or their roost sites constitutes an offence under the 1981 Wildlife and Countryside Act (as amended) and the 2017 Conservation of Species and Habitats Regulations (as amended), once erected, close inspection of bat roosting features/repairs would only be carried out by a licenced bat worker. If any works are necessary which may result in an offence being committed under this legislation then a suitably qualified ecologist would be contacted to advise on the best course of action.

4.2.8.3





4.2.8.4 *Birds:*

- Tree, scrub, woodland and hedgerow management will only be carried out outside the bird breeding season (usually taken as March to early September inclusive) unless preceded with a nesting bird check by the project ecologist or other suitably qualified personnel.
- Bird boxes will be installed on retained mature trees and proposed buildings to provide a range of nesting opportunities (See *Detailed Ecological Permeability Scheme – Parcels 4 and 5* (HDA, 2024f)).
- Standing deadwood will be retained wherever possible to maximise natural opportunities for hole-nesting birds.

4.2.8.5 *Reptiles, amphibians and invertebrates:*

- Arisings from hedgerow, woodland, tree, scrub and marginal habitat management will be used to construct log and brash piles along ditches, hedgerow, woodland and scrub edges to provide opportunities for refuge and hibernation (See *Detailed Reptile Strategy – Parcels 4 and 5* (HDA, 2024d)).

Non-native plants:

4.2.8.6 Rhododendron and an unidentified Cotoneaster species have been identified within the wider site. In addition, Variegated Yellow Archangel and Japanese Knotweed have been identified in the wider area (HDA, 2024e). Cotoneaster *Cotoneaster horizontalis*, Entire-leaved Cotoneaster *Cotoneaster integrifolius*, Himalayan Cotoneaster *Cotoneaster simonsii*, Hollyberry Cotoneaster *Cotoneaster bullatus*, Small-leaved Cotoneaster *Cotoneaster microphyllus*, Rhododendron *Rhododendron ponticum*, Variegated Yellow Archangel *Lamiasstrum galeobdolon* and Japanese Knotweed *Fallopia japonica* are all listed under Schedule 9 of the 1981 Wildlife and Countryside Act (as amended). It is an offence to release, plant or cause to grow in the wild any plant included on this schedule of the Act.

4.2.8.7 The following works will be implemented:

- Prior to development commencing: An updated survey of the site will be undertaken at an optimal time of year (between May and August) to identify the presence, location and area covered by any non-native invasive species listed on Schedule 9 of the 1981 Wildlife and Countryside Act (as amended), not previously identified on site.

- **Monitoring:** All parts of the management area would be subject to annual inspections to identify the presence of any regenerating/newly established non-native invasive species.
- **Control:** Where the presence of a non-native invasive species is identified, control measures will be put in place to prevent further spread with the aim of eradication from the management area. Measures would be appropriate to the species present and the location in which it is growing.

4.3 **Objective 2:**

Maintain and enhance the landscape attributes of the key habitats associated with the management area and its local environs.

4.3.1 The management area is located within the 'J2: Arborfield Cross and Barkham Settled and Farmed Clay' Landscape Character Area as defined by Wokingham District Council (Wokingham District Council, 2019), for which the key characteristics are:

- A gently undulating landscape, underlain by London Clay with localised areas of River Terrace Gravels. Shallow wooded valleys follow the course of the Barkham Brook, which is geologically marked by areas of alluvium.
- Consistent pattern of waterbodies including streams, drainage channels, ditches and open waterbodies of various sizes resulting from the clayey and loamy soils which impede drainage.
- Wooded context provided by characteristic mature hedgerow and in-field trees, combined with woodland belts, with BAP priority habitats and ancient woodland, and the wooded horizons of the surrounding hills.
- Arable farming dominates, with pasture on higher ground and horse paddocks near settlement. Fields are large and geometric, bound by fragmented hedgerows supported by post and wire.
- Small-scale wet woodland and wetland habitats scattered on the edge of the area, often designated as LWS.
- A dense settled character influenced by modern development including the new garden village on the site of Arborfield Garrison and the southern edge of Wokingham which incorporates an industrial estate.
- Older scattered settlement of farms, hamlets and small nucleated villages at Barkham and Arborfield Cross. The buildings have traditional vernacular of timber framing and clay tiles, exemplified by the Conservation Area at Arborfield Cross.
- A network of busy local roads cross the area. They tend to be rural in character, with ditches, hedges and hedgerow trees, sometimes opening directly onto the arable fields.
- Public rights of way run between the settlements and provide access for recreational use.

- A rural character away from development and roads, with views across to adjacent character areas including across the Loddon Valley.
- A historic road, now represented by footpaths, lanes and Victorian carriageways, that appears on Norden's map of 1607, connecting Swallowfield Park via Arborfield Cross and the Coombes (in LCA L1), with Wokingham.

4.3.2 The profile for the *J2: Arborfield Cross and Barkham Settled and Farmed Clay Landscape Character Area* identifies the following landscape guidelines relevant to the Hogwood Farm Site:

- **Conserve woodlands, including ancient woodland, BAP priority habitats and remnant standard trees.** *Continue to promote appropriate management through natural regeneration, control of non-native species and coppicing as a management tool for neglected woodland.*
- **Increase the extent of native deciduous woodland,** *using locally occurring native species in order to provide screening of roads and development and linking woodland habitats. Seek to avoid introduction of coniferous boundaries and shelterbelts.*
- **Conserve and manage hedgerows with standard trees** *as important wildlife habitats and landscape features, as well as the links they provide across the landscape and between areas of woodland. Reinstate or repair hedgerows with native species where there are opportunities to do so. Plan for the next generation of hedgerow trees with a programme of tree planting.*
- **Conserve, enhance and manage wetland and woodland habitats** *including within LWS. Protect the habitats from development, changes in land use and encroachment by secondary woodland and scrub. An appropriate wetland and woodland management regime is critical.*
- **Conserve and enhance the integration of urban edges** *through wooded boundaries and large-species trees to provide visual screening and create a positive interface between the built up and rural areas particularly around Wokingham town, Arborfield Garrison, and Finchampstead.*
- **Enhance sense of place through careful design** *(including siting, massing, scale, materials and landscape – and sensitive lighting to retain dark skies at night) to minimise the potential impacts of any new development on valuable attributes.*
- **Reduce and prevent further noise and light pollution** *through the sensitive siting of any new development, including infrastructure, and especially any proposed night-time lighting.*

4.3.3 Proposed habitat creation and enhancement works within the management area and wider site, and long-term management to maximise value of these habitats for wildlife, will contribute to achieving these objectives.

PRESCRIPTIONS

4.3.4 **Enhancing the local woodland habitat resource**

- 4.3.4.1 The Arborfield Cross and Barkham Settled and Farmed Clay character area identifies the *'effects on tree health or species composition of woodland and wet woodland as a consequence of pathogens and climate change'* and *'loss of structure and species diversity of the woodland belts has occurred in the past through cessation of coppice management.'* Woodland belts are located within the Parcels 4 and 5 site and the landscape proposals include new scrub planting and standard tree planting which is expected to enhance the woodland/scrub/tree resource of the Parcels 4 and 5 site and its surrounds.

4.3.5 **Conservation of hedgerows and shelterbelts**

- 4.3.5.1 A key habitat associated with the Arborfield Cross and Barkham Settled and Farmed Clay character area is hedgerows. The landscape proposals include the retention and enhancement of the majority of the hedgerow network in addition to the provision of additional hedgerow planting within the development area.
- 4.3.5.2 The proposed enhancements to the hedgerow network within and along the margins of the management area and wider site will also contribute to 'green infrastructure', enhancing habitat connectivity across the management area and its surrounds, and will help the new development to integrate into the local landscape.

4.3.6 **Conservation of wetlands**

- 4.3.6.1 The Arborfield Cross and Barkham Settled and Farmed Clay character area identifies that *'drainage operations have resulted in loss of wetland habitats'*. The landscape proposals include the enhancement of the ditch network within the site.

4.4 **Objective 3:**

Access and amenity: Provide an attractive environment and opportunities for informal recreation available to residents of the new development and existing residents of the surrounding area.

- 4.4.1 In addition to the built development and associated garden planting, the formal landscape scheme for the Parcels 4 and 5 site includes establishment and management of amenity grassland and ornamental tree and shrub planting. Beyond the formal areas a network of semi-natural habitat types including woodland, hedgerows, native scrub and meadow grassland and rough grassland features are proposed, with access facilitated by a variety of footpath types. In combination, the formal and informal landscaped areas will create an attractive setting for residents and visitors to the Parcels 4 and 5 development. The

landscape creation and enhancement measures are identified in *Section 4.2*. Measures to help maximise the amenity value of the site are described below.

Provide an attractive setting for recreation

- 4.4.2 The landscape proposals described in *Section 4.2* above and provided in *Appendix A* have been developed to create an attractive setting for informal recreation within the Parcels 4 and 5 site. Footpaths within the open space of the Parcels 4 and 5 site will be regularly maintained and kept clear of encroaching scrub and overhanging trees so they are perceived to be safe by users.

Maintain trees and other management items in safe and serviceable condition

- 4.4.3 Trees, paths and other management items will be maintained in a safe condition through regular inspection and maintenance work as required.

- 4.4.4 Tree safety inspections will be carried out annually as a minimum (more frequently where there are exceptional weather events) and any maintenance works carried out as required.

- 4.4.5 Any site furniture (including bollards, informal play equipment, fencing and any signage or safety equipment) will be maintained in a serviceable and safe condition in line with manufacturer recommendations. All furniture will be inspected for damage and cleaned on a regular basis. Any vandalism would be repaired as soon as possible, particularly if the damage could pose a risk to the health and safety of the public. Where appropriate any timber products will be routinely stained or preserved, in line with manufacturer recommendations.

Maintain the site free from litter

- 4.4.6 The management area will be inspected, and litter removed on a monthly basis. Fly-tipped waste will be cleared, and appropriate action taken if encountered, including monitoring for invasive species.

Provide information to local residents

- 4.4.7 All dwellings within the proposed development will be provided with a resident's sales pack. 'Living with Wildlife' leaflets will be included with each sales package or provided on occupation of each dwelling of the new development. These documents will inform residents of the nature conservation interest and sensitivity of the habitats within the site and its surrounds, and measures that can be taken to avoid impacts on the associated features of nature conservation interest.

5 MONITORING

- 5.1 The outcome of the management works prescribed above would be subject to review on at least an annual basis (but more frequently during establishment) to assess the success of these works in achieving the desired objectives. If necessary, the prescriptions will be revised to improve outcomes. Any amendments to the prescriptions provided in this LEMP would be subject to the approval of the local planning authority.

6 IMPLEMENTATION OF MANAGEMENT

- 6.1 It is expected that the habitat creation and establishment works would be led by the developer after which either the local planning authority, a management company or an appropriate other would take on the long-term management. Management would be secured and, if necessary appropriately funded, through a legal obligation.

- 6.2 The management activities for the implementation phase (during the construction phase of the proposed development), the establishment phase (expected to last up to three years following construction), and during a typical year, are summarised below. These could form the basis for 'milestones' to facilitate monitoring of the habitat restoration and management works. Management Schedules detailing the timing of works are provided in *Appendix D*.

- 6.3 Implementation Phase:

- Carry out vegetation clearance works including removal of unretained hedgerow, woodland, scrub, trees and ruderal/grassland habitats to allow for construction and landscaping works.
- Undertake enhancement works to the existing ditches within the site including removal of debris, in-channel works including bank and channel re-profiling etc.
- Preparation of soil and sow meadow, rough and amenity grassland seed mixes/turf on newly cleared areas of land and commence cutting regime as appropriate.
- Carry out new and infill hedgerow planting and commence new rotational cutting regimes.
- Plant new trees, scrub and shrubs in formal and informal areas as specified and commence management.
- Protect plantings with tree guards or temporary fencing/dead hedging as appropriate.
- Maintain bases of new tree, shrub and hedgerow planting free of weeds.
- Manage retained trees within the management area for safety.
- Create habitat piles using arisings from woodland, hedgerow and tree management.
- Install bird and bat boxes where appropriate.
- Implement measures for the control of invasive species.

- Create paths and install site furniture (including bollards, play equipment, fencing and any signage or safety equipment).

6.4 Establishment Phase:

- Manage trees and other management items for safety.
- Manage meadow, rough and amenity grassland.
- Maintain habitat piles/deadwood habitats.
- Continue management of hedgerows, scrub, treelines and woodland habitats.
- Maintain bases of new tree, shrub and hedgerow planting free of weeds and remove any protective guards after 3 years if appropriate. Loosen tree ties as required.
- Replace failed plantings as necessary.
- Cut marginal and bankside vegetation around the ditches and remove excess silt and aquatic vegetation as required.
- Maintain paths and site furniture as necessary.
- Maintain management area free of litter.
- Monitor the management area and carry out control of non-native invasive species as necessary.
- Monitor success of management activities and revise management plan as appropriate.

6.5 Typical year:

- Manage trees and other management items for safety.
- Continue the cutting regime of meadow, rough and amenity grassland.
- Maintain and create new habitat piles/deadwood habitats.
- Continue management of hedgerows, scrub, treelines and woodland habitats.
- Continue control/management of scrub habitats where appropriate.
- Cut marginal and bankside vegetation around the ditches and remove excess silt and aquatic vegetation as required.
- Maintain paths and site furniture as necessary.
- Maintain management area free of litter.
- Monitor the management area and carry out control of non-native invasive species as necessary.
- Monitor success of management activities and revise management plan as appropriate.

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CSA Environmental (2024b) *Parcel 4-5 Hogwood Farm, Finchampstead: Parcel P4 Soft Landscape Proposals, Sheet 1 of 2*. CSA Environmental, Ashwell.

CSA Environmental (2024c) *Parcel 4-5 Hogwood Farm, Finchampstead: Parcel P4 Soft Landscape Proposals, Sheet 2 of 2*. CSA Environmental, Ashwell.

CSA Environmental (2024d) *Parcel 4-5 Hogwood Farm, Finchampstead: Parcel P5 Soft Landscape Proposals, Sheet 1 of 3*. CSA Environmental, Ashwell.

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RPS (2018b) *Hogwood Farm, Finchampstead: SANG Management Plan*

RPS (2018c) *Hogwood Farm, Finchampstead: Overarching Landscape Strategy*.



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HDA Document Control and Quality Assurance Record

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Project Reference: 868.1
Document Title: Parcels 4 and 5 Landscape and Ecological Management Plan
Commissioning Party: CALA Homes Thames Ltd

Issue	Description	Date of Issue	Signed
1	Parcels 4 and 5 Landscape and Ecological Management Plan	September 2024	

	Personnel	Position
Authors	Sarah Thornton-Mills MCIEEM & Clare Bird MCIEEM	Principal Ecologist Associate Ecologist
Approved for issue	Clare Bird MCIEEM	Associate Ecologist

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APPENDIX A

Landscape Masterplan (CSA Environmental, 2024a)



0 10 20 metres

Emerging Context -
Development Parcel P2

Phase 2 LLAP
Refer to drawings
CSA/6689/102-103

Emerging Context -
Development Parcel P6

Ancient Woodland

121 - Reading Road

Ancient Woodland

SANG

FOR PLANNING

CSA
environmental

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Project: Parcel P4-S Hogwood Farm,
Finchampshead

Title: Landscape Masterplan Proposals,
Sheet 1 of 1

Client: CALA Homes Thames Ltd

Scale: 1:500 @ A0 Drawn: SS/IV

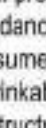
Date: June 2024 Checked: JG

Drawing No: CSA/6689/129 Rev

APPENDIX B

Soft Landscape Proposals (CSA Environmental, 2024b-f)



Softworks	
	SEMI-MATURE TREE
	EXTRA HEAVY STANDARD TREE
	STANDARD TREE
	HALF-STANDARD TREE
	MULTI-STEM TREE
	THICKET MIX
	ORNAMENTAL HEDGE PLANTING
	NATIVE HEDGE PLANTING
	ORNAMENTAL SHRUB / HERBACEOUS GRASS PLANTING
	RAIN GARDEN WITH SHRUB / HERBACEOUS / GRASS PLANTING
	SPECIMEN SHRUB PLANTING
	CLIMBING GRASS PLANTING
	BULB PLANTING
	UNIFORM GRASS SEEDING - *A22 (Low Maintenance) seed mix by Geming Seeds Ltd on equal and approx 50g m² / covered rate 20g m² /
	UNIFORM GRASS TURF - *Medialoft turf by Rolawn or equal or approved.
	WILDFLOWER MEADOW MIX - *WF52 Pleading Meadow Mix by G Seeds Ltd or equal approved.

	RECREATIONAL FOOTPATH / CYCLEWAY Bredon Golden Amber Self-binding
	GRAVEL Fine shingle laid to a depth of 100mm on non-biodegradable geotextile membrane. Finished level to be 20mm below adp ground level
	GRASS REINFORCEMENT Ground to be reinforced with cellular plastic mesh to engineers details.
	NATURAL BOULDERS "Caledonian Mixed Glacial Boulders" by CED Ltd or equal and approved, sizes, max. height above ground of 150mm smooth finished, heated into ground to level semi-dry sand/stone base.
	TIMBER SEAT "Heartform" rustic 4 slot timber bench by Steelmaster Ltd. 200mm long, treated, not fixed into concrete footings or equal approved.

Notes:

- All proposed planting had been designed to reflect the guidance set out in Chapter 4 of the NHBC Standards and assumes minimum strip foundations (0.9m) and moderate shrinkable soil.
- Structural engineers to review all proposed planting during technical design stage and advise if any species changes required to comply with NHBC Standards.

Planting Specification is to be found on drawing CSA-6639/128

[illegible]

Shrub / Climber													
All climbing shrubs to be supported by a minimum 1.5m tall timber trellis panel attached to adjacent wall / fence													
Qty	Name	Common Name	Age	Height	Form	Girth	CrDmm	Brs	RdC	CrC	Measure Unit	Density (no/20m²)	Centres
10	Clematis arvensis	Clematis		80-100cm									
11	Jasminum officinale	Jasmine		80-100cm				3	C	SL	nr		
4	Viburnum cinnam	Chinese wattle		80-85cm				2	C	SL	W		

[illegible]

Thicket Mix 1													
Individual Thicket species to be planted in groups of approximately 5-10													
Qty	Name	Common Name	Age	Height	Form	Grth	ClOzm	Brs	Rust	Ctr	Measure Unit	Density (m2/m)	Notes
62	<i>Ostrya virginica</i>	Common hawthorn	11	60-80cm	Upright						m2	0.69	1,200
62	<i>Ilex aquifolium</i>	Holly		40-60cm					C	SL	m2	0.69	1,200
50	<i>Ligustrum vulgare</i>	Common privet		90-100cm					C	SL	m2	0.69	1,200
50	<i>Viburnum lentago</i>	Black haw	11	30-40cm							m2	0.69	1,200
25	<i>Viburnum opulus</i>	Guelder Rose	11	40-60cm	Upright						m2	0.69	1,200

Tree												
Qty	Name	Common Name	Age	Height	Form	Girth	CrDm	Bark	Root	Measure Unit	Density (cubic m)	Comment
2	Acor campestre	Field maple	2x	300-350cm	Standard	15-20cm	15-20cm	4	0	tr		
2	Acor campestre (Brazilian)	Field maple	2x	300-350cm	Standard	15-20cm	15-20cm	3	0	tr		
2	Acor horridus "Rubra Regel"	Field maple	2x	300-350cm	Standard	15-20cm	15-20cm	3	0	tr		
1	Acor glaberrimus Common King	Common king maple	3x	425-600cm	Standard (Euta King)	14-16cm	15-20cm	7	0	tr		
1	Acor glaberrimus Common King	Common king maple	4x	450-550cm	Sem Slender	20-25cm	20-25cm	0	0	tr		
1	Acor glaberrimus Common King	Common king maple	4x	500-550cm	Sem Slender	20-25cm	20-25cm	0	0	tr		
1	Alnus glaberrima (Brazilian)	Slender maple	3x	425-600cm	Standard (Euta King)	15-16cm	15-20cm	5	0	tr		
6	Anderscheria seneciifolia (Mali-Seni)	Almy Mopelia, June Berry, Senorioberry		400-450cm	Multi-stemmed	15-16cm	15-16cm	3	0	tr		
8	Betula verrucosa	Betula	2x	220-250cm	Standard (JWH)	8-10cm	10-15cm	3	0	tr		
1	Betula verrucosa	Slender Birch	2x	300-350cm	Standard	10-15cm	10-15cm	4	0	tr		
51	Carpinus betulus	Hornbeam	2x	250-400cm	Standard (JWH)	8-10cm	10-15cm	3	0	tr		
2	Carpinus betulus	Hornbeam	2x	300-350cm	Standard	10-15cm	10-15cm	4	0	tr		
12	Carpinus betulus "Terna Fontaine"	Hornbeam	2x	300-350cm	Standard	10-15cm	10-15cm	4	0	tr		
5	Corylus avellana (Mali-Seni)	Hick, Cobnut		125-150cm				5	C	40L		
3	Crotona angustata "Pachy Spatiol"	Double Red Tree, Malabar's laurel tree	2x	300-350cm	Standard	10-12cm	15-20cm	3	0	tr		
1	Mikia "Trikol"	Double Red Tree	2x	300-350cm	Standard	10-12cm	15-20cm	3	0	tr		
27	Panicum sp.	Wheat, Wild wheat	4x	300-350cm	Standard	10-12cm	15-20cm	5	0	tr		
2	Panicum sp. (Brazilian)	Wheat grass	2x	300-350cm	Standard	10-12cm	15-20cm	4	0	tr		
1	Panicum sp. (Brazilian)	Wheat grass	2x	300-350cm	Multi-stemmed	10-12cm	15-20cm	4	0	tr		
5	Sorbus torminalis	Wild service tree	2x	300-350cm	Standard	10-12cm	15-20cm	5	0	tr		
7	Tilia cordata	Small-leaved lime	2x	300-350cm	Standard	10-12cm	15-20cm	4	0	tr		
2	Ulmus "New England"	European Elm	2x	300-350cm	Standard (Brazilian)	10-12cm	15-20cm	4	0	tr		
15	Ulmus parvifolia	Chicory Elm	3x	400-450cm	Standard (Euta King)	14-16cm	15-20cm	5	0	tr		

Env	Date	By	Descriptions
Drawing Status			
FOR INFORMATION			
			
Diklars Borns, High Street, Ashwell, Hertfordshire SG7 5NT			
 	01462 743647 ashwell@csaenvironmental.co.uk csaenvironmental.co.uk		
Project	Parcel P4 5 Hogwood Farm, Fitchamstead		
Title	Parcel P5 Soft Landscape CASA, Sheet 3 of 3		
Client	CPALA Homes Thames Ltd		
Scale	1:200 @ A0	Drawn	TV
Date	June 2004	Checked	JG
Drawing No.	CSA/68R/128	Rev	

Qty	Name	Common Name	Age	Height	Form	Grth	Grize	Blks	Root	Frst	Measure Unit	Density (ind/m ²)	Grnties
24	Lucuma bainesii 'Emerald Gaily'	Spine Emerald Gaily					1	C	SL	h2	1.00	0.900	
15	'Yucca' 'Pilot'			20-40m			9	C	SL	h2	1.00	1.000	
17	Miconia chama 'Purpurea'	Purple mallow grass					3	3xSL	h2	1.00	1.000	1.000	
28	Sedum 'Nero'	Strepson								h2	5.00	0.450	
11	Ybomun davisii	Davis ybomun		20-40m			3	SL	h2	1.00	1.000	1.000	
24	'Vicia' sp. 'bicolor'	Grass peewee cat		10-15m			C	2x	h2	1.00	0.450	0.450	

[illegible]

Bulb Mix 4 - Daffs			Bulb mix to be planted in a random scatter										
Qty	Name	Common Name	Age	Height	Form	Grth	GrZn2	Bkss	RdC	Wtr	Measure Unit	Density (m2/m3)	Centres
66	Narcissus 'Actaea'	Daffodil			Bulb						m2	25.00	0.200
66	Narcissus 'Winnif'	Daffodil			Bulb						m2	25.00	0.200
66	Narcissus 'Double Master'	Daffodil			Bulb						m2	25.00	0.200
66	Narcissus 'Winnif'	Daffodil			Bulb						m2	25.00	0.200
66	Narcissus 'Double Master'	Daffodil			Bulb						m2	25.00	0.200

Qty	Name	Common Name	Age	Height	Form	Grth	GrStr	Bks	Root	Measure Unit	Density (plants/m ²)	Costs
45	<i>Anemone nemorosa</i>	Wood anemone	Bulb							m ²	25.00	0.200
45	<i>Primula veris</i>	Primula veris	Bulb							m ²	25.00	0.200
45	<i>Galanthus nivalis</i>	Common snowdrop	Bulb							m ²	25.00	0.200
45	<i>Hyacinthoides non-scripta</i>	Bluebell	Bulb							m ²	25.00	0.200

Bulb Mix 6 - Sun													
Bulb mix to be planted in a random scatter													
Qty	Name	Common Name	Age	Height	Form	Grfs	ChDm	Bks	Root	Ctr	Measure Unit	Density (m/30.0m)	Cost
34	Allium christophii	Garlic			Bulb					m2	25.00	0.200	
34	Allium ursinum	Ramsons, Wood Garlic			Bulb					m2	25.00	0.200	
34	Camassia scottiae	Diamonds			Bulb					m2	25.00	0.200	
34	Camassia sibirica	Madonna lilies, Autumn crocus			Bulb					m2	25.00	0.200	

[illegible][illegible][illegible]

Shrub mix to be planted in single species groups of between 2 and 5 plants													
Qty	Name	Common Name	Age	Height	Form	Grth	Cr10m	B10	R10	Cr1	Measure Unit	Density (cr/10m)	Comment
116	Cuba Silver Pine	Sun roses	30-40cm					C	3L	m2	0.00	0.400	
117	Geranium 'Johnson's Blue'	Crenellat						C	3xL	m2	0.00	0.400	
107	Hola Roca Ridge		60-80cm				2	C	3.75L	m2	0.00	0.400	
118	Leucanthea angustifolia 'Munstead'	Lavender	25-30cm					C	3L	m2	0.00	0.400	
117	Perovskia atropurpurea 'Blue Spire'							C	3L	m2	0.00	0.400	
116	Rosaemula officinalis 'Miss Jessop's Orange'	Rosemary	30-40cm					C	3L	m2	0.00	0.400	
116	Sesuvium portuacastrum	African moss grass						C	3xL	m2	0.00	0.400	

6089 Large Flanks Mix													
Shrub mix to be planted in single species groups of between 2 and 5 plants													
Qty	Name	Common Name	Age	Height	Form	Girth	CRSM	Birka	CRSL	CRH	Massure Unit	Density (m2/m)	CRSL
255	<i>Acacia greggiana</i> 'Sage Moor'	Acacia	4	45-50cm				2	S	L	5.00	0.400	0.400
235	<i>Coronilla varia</i> 'Mid Winter Fire'	Coronilla	4	45-50cm				2	C	H	5.00	0.400	0.400
235	<i>Desmodium illinoense</i>	Tufted harragras or hairy sand	4	45-50cm				2	C	H	5.00	0.400	0.400
235	<i>Microrhiza serotina</i> 'Kleine Fontaine'	Maiden spg	4	45-50cm				2	C	H	5.00	0.400	0.400

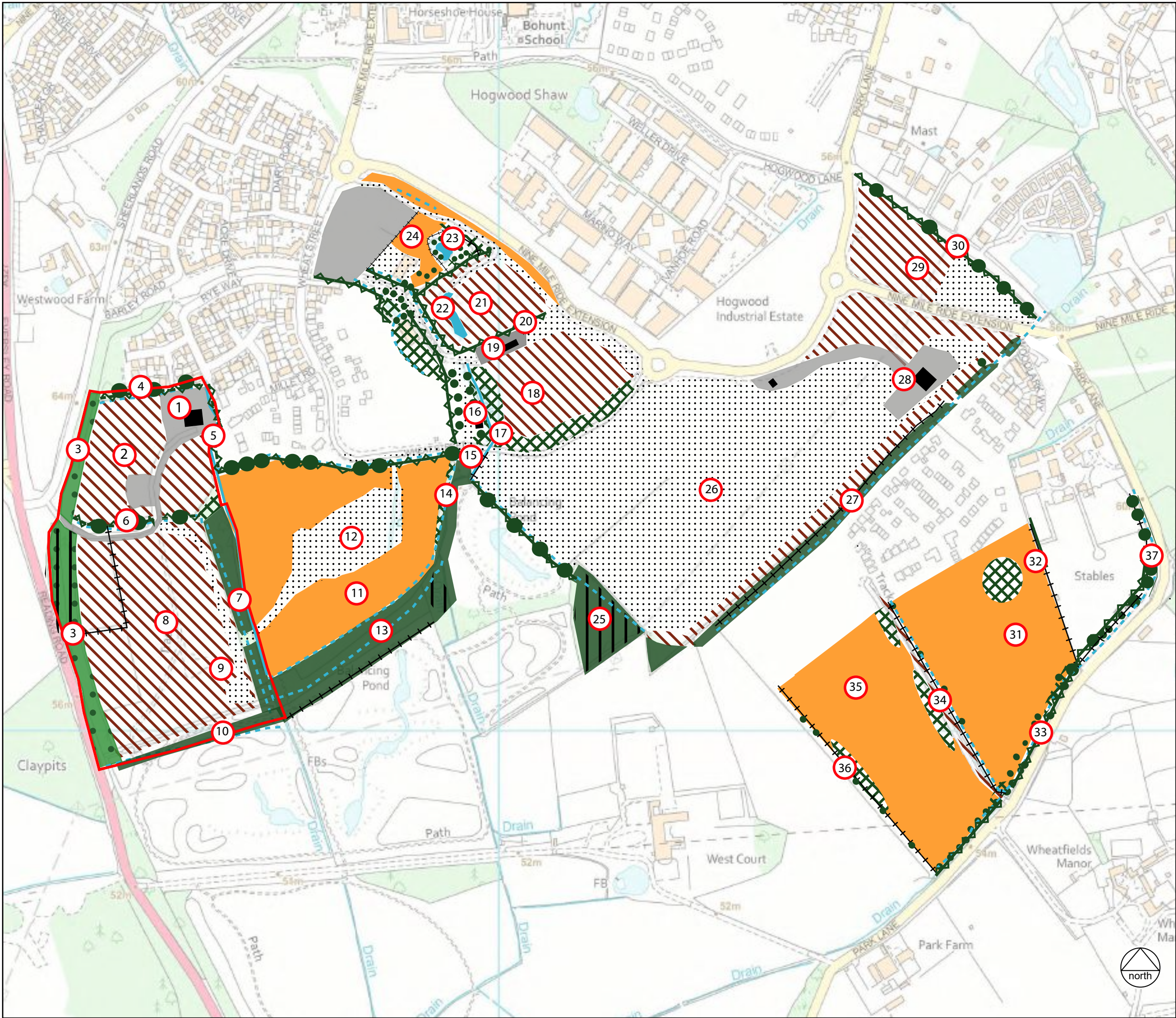
[illegible][illegible]

15	<i>Carex flacca</i>	Grey sedge	C 1/2L, m2	5.00	0.450
16	<i>Eleocharis acicularis</i>	Slender reed grass	C 1/2L, m2	5.00	0.450
15	<i>Euphorbia wulfenii</i>	Spruce	C 1/2L, m2	5.00	0.450
15	<i>Helleborus viridis</i>	Common hellebore	C 1/2L, m2	5.00	0.450
27	<i>Ligularia sibirica</i>	Ligularia	C 1/2L, m2	5.00	0.450
27	<i>Ligularia sibirica</i>	Ligularia	C 1/2L, m2	5.00	0.450
15	<i>Lucula sibirica</i>	Slender anemone	C 1/2L, m2	5.00	0.450
27	<i>Panicum virgatum</i>	Switch grass	C 1/2L, m2	5.00	0.450
55	<i>Pensicola affinis</i>	Chrysanthemum	C 1/2L, m2	5.00	0.450

[illegible][illegible]

APPENDIX C

Existing Ecological Features



KEY

- Parcels 4 and 5 boundary
- Lowland mixed deciduous woodland - (w1f)
- Other woodland - mixed - mainly broadleaved (w1h5)
- Ancient Woodland
- Scattered trees
- Native hedgerow - (h2a)
- Native hedgerow with trees - (h2a - 11)
- Non-native and ornamental hedgerow - (h3b)
- Mixed scrub - (h3h)
- Ruderal - (81)
- Developed land - sealed surface - (u1b)
- Modified grassland - (g4)
- Standing open water - (r1)
- Wet ditch / Dry ditch - (50)
- Bare ground - (510)
- Buildings
- Fence
- Target notes

CLIENT:
CALA Homes (Thames) Ltd

PROJECT:
Hogwood Farm, Finchampstead

TITLE:
Parcels 4 & 5 - Phase 1 Habitat Survey Plan

SCALE AT A3:
NTS

DATE:
June 2024

868.1/89

Based on Ordnance Survey mapping with permission of Her Majesty's Stationery Office
Licence no. AR187372

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Landscape Architecture
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Target Notes – Arborfield

1. Site yard comprised a hardstanding area with mobile cabins.
2. Relatively sparse ruderal vegetation dominated by Common Nettle *Urtica dioica*, Spear Thistle *Cirsium vulgare*, Common Ragwort *Senecio jacobaea*, Bristly Oxtongue *Helminthotheca echinoides* and Common Dandelion *Taraxacum officinale*. Small areas of scattered bare ground/ recently disturbed ground are present. Field margins vary between 1 – 5m and are more densely vegetation with the above species with the inclusion of Annual Meadow Grass *Poa annua*, Red Fescue *Festuca rubra*, Cleavers *Galium aparine*, Broad-leaved Dock *Rumex obtusifolius*, Cut Leaved Cranes Bill *Geranium dissectum*, Field Forget-me-not *Geranium dissectum* and Scarlett Pimpernel *Anagallis arvensis*.
3. Mixed woodland along the western boundary with species including Ash *Fraxinus excelsior*, Larch *Larix decidua*, Scots Pine *Pinus sylvestris*, Beech *Fagus sylvatica*, Pedunculate Oak *Quercus robur* and Black Poplar *Populus nigra*. Some of the trees are mature and have suitable bat roosting features. The understorey is comprised of Elder *Sambucus nigra*, Hawthorn *Crataegus monogyna*, Holly *Ilex aquifolium*, Willow *Salix* Sp. and Hazel *Corylus avellana*. The ground layer is dominated by Bramble *Rubus fruticosus* and Common Nettle with Bracken *Pteridium aquilinum*, Ground Ivy *Glechoma hederacea*, Cleavers, Wood Avens *Geum urbanum*, Herb Robert *Geranium robertianum*, White Bryony *Bryonia dioica* and Black Bindweed *Fallopia convolvulus*. Part of the southern area of this woodland is listed on Natural England's Ancient Woodland Inventory; this area is especially dominated by Larch and other introduced coniferous species.
4. Native defunct hedgerow with trees comprising a hedgerow of Field Maple *Acer campestre*, Hazel, Blackthorn *Prunus spinosa* and Ash, with Ash and Oak mature trees and a dry ditch below.
5. Newly created culvert with a small area of standing water.
6. Treeline of mature Ash and Pedunculate Oak trees with relic species rich hedgerow of Hazel, Holly, Field Maple, Hawthorn and Blackthorn. Some of the mature trees have the potential to support roosting bats. The ground layer vegetation is sparse and mostly comprised of Bramble with occasional Cowslip *Primula veris* and Creeping Thistle *Cirsium arvense*.
7. Lowland mixed deciduous woodland comprised of Pedunculate Oak and coppiced Ash with Wild Cherry *Prunus avium*, Field Maple, Hazel, Hawthorn and Blackthorn. Mature trees are present, some of which have features of bat roosting potential. The ground layer includes Bramble, Cow Parsley *Anthriscus sylvestris*, Ground Ivy, Germander Speedwell *Anthriscus sylvestris*, Common Sorrel *Rumex acetosa* and Lords-and-ladies *Arum maculatum*. A dry ditch is present along the western boundary of the parcel and a ditch that was wet at the time of the survey along the eastern boundary.
8. A field of ruderal vegetation of varying height from 10cm to 50cm in height dominated by Spear Thistle, Common Nettle and Perennial Ryegrass and White Clover *Trifolium repens* with the occasional Creeping Buttercup *Ranunculus repens*, Common

Hogweed *Heracleum sphondylium*, Ragwort and Broad Leaved Dock and Cleavers. Small areas within the parcel are sparsely vegetated with areas of bare ground with occasional ruderal species mentioned above but include Scarlett Pimpernel and Bird Foot Trefoil *Lotus corniculatus*.

9. A small depression of bare ground that had standing water at the time of the survey with occasional Yellow Flag Iris present.
 10. Plantation lowland mixed deciduous woodland comprised of White Poplar, Pedunculate Oak, Ash and Field Maple. Mature trees are present, some of which have features of bat roosting potential. Understorey comprised of Holly, Dog Rose *Rosa canina*, Common Nettle, Cow Parsley, Cleavers, Curled Dock *Rumex crispus*, Bramble and Ground Ivy. A dry ditch is present along the boundary along the southern boundary of the wooded strip.
 11. Species poor modified grassland of varying sward length between 5cm – 40cm comprised of Perennial Ryegrass, Cocksfoot *Dactylis glomerata*, White Clover, Oxeye Daisy *Leucanthemum vulgare*, Creeping Buttercup with occasional Broad Leaved Dock, Dandelion and Scarlett Pimpernel. Field margins are approximately 4-6m wide and are comprised of Common Nettle, Spear Thistle, Common Vetch *Vicia sativa* and Cow Parsley.
 12. Area of bare ground used for storage of construction materials.
 13. Lowland mixed deciduous woodland comprised of Pedunculate Oak standards and coppiced Ash with Wild Cherry *Prunus avium*, White Poplar, Field Maple, Hazel, Willow, English Elm *Ulmus procera*, Holly, Hawthorn and Blackthorn. Mature trees are present, some of which have features of bat roosting potential. The ground layer includes Bramble, Wood Avens *Geum urbanum*, Herb Robert, Common Ivy, Wood Spurge *Euphorbia amygdaloides*, Violet *Viola sp.*, Greater Stitchwort *Stellaria holostea*, Common Nettle, Remote Sedge *Carex remota*, False Brome *Brachypodium sylvaticum* and Butcher's Broom *Ruscus aculeatus* present. Standing and fallen dead wood is present throughout the woodland area. The woodland becomes increasingly wet to the west where Willow becomes dominant and dry ditches border most of the woodland edges, a further dry ditch running centrally through the southern area of woodland is also present. The eastern area of this woodland is listed on Natural England's Ancient Woodland Inventory; here the dominant tree species is White Poplar in the south and Pedunculate Oak in the north. This area is demarcated in its western boundary by a small woodbank.
 14. Mixed Scrub comprised of Bramble, Blackthorn, Dog Rose and Pendulate Oak samplings over a dry ditch.
-
16. A wooden bat barn set between treelines of Pendulate Oak, Ash and Hazel.
 17. Mixed scrub comprised of Bramble, Elder and Holly with large amounts of deadwood above a steep-sided wet ditch. Towards the eastern end of the scrub parcel, Elder becomes the dominant species with the inclusion of ruderals in the ground layer including Common Nettle, Spear Thistle, Cleaver and Broad Leaved Dock.

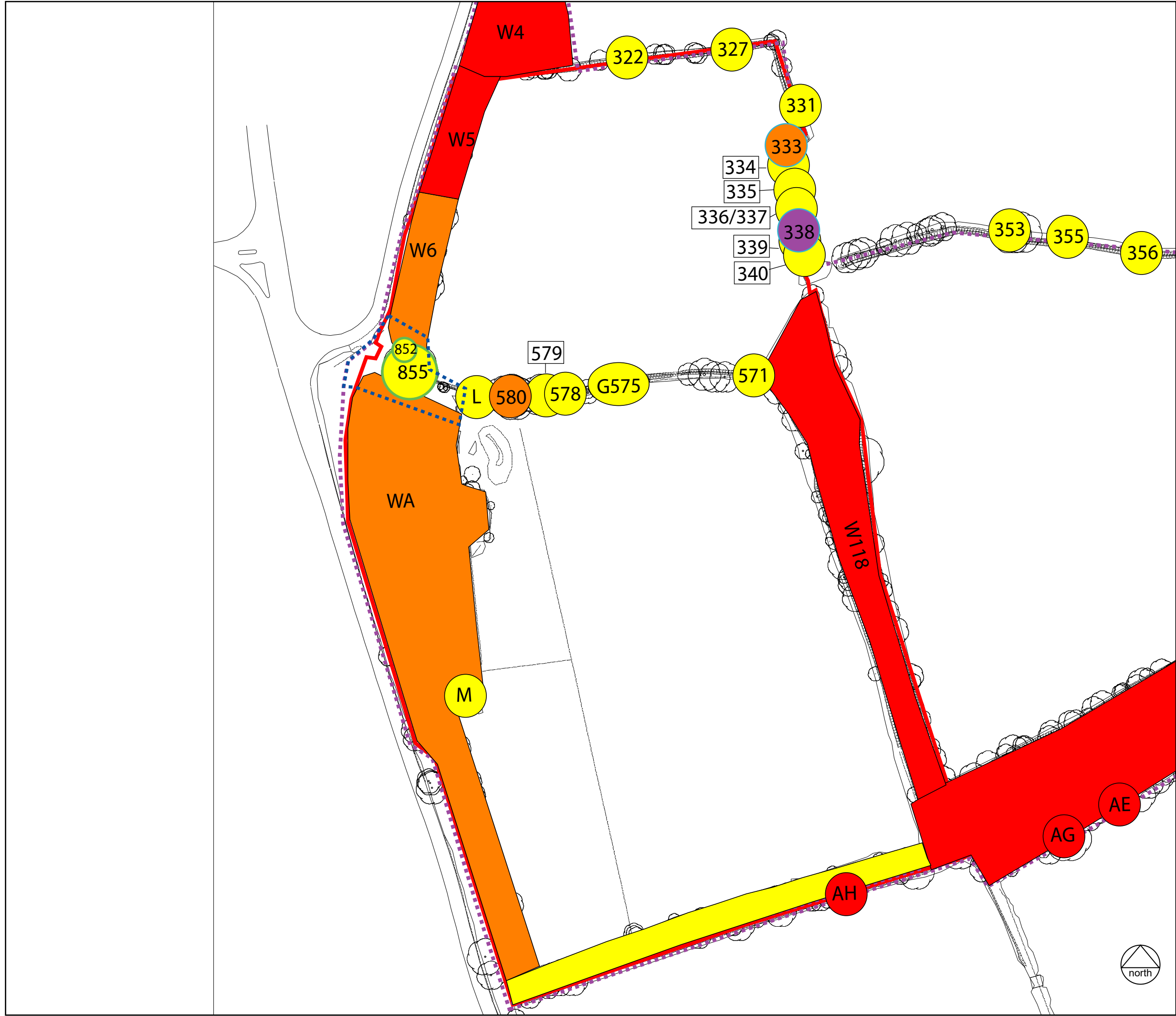
18. Ruderal vegetation comprised of Perennial Rye Grass, Spear Thistle, Common poppy *Papaver rhoeas*, Cocks Foot, Rosebay Willowherb *Chamerion angustifolium*, Annual Sow Thistle *Sonchus oleraceus*, Common Nettle, and Curled Dock.
19. Listed building with multiple features with bat roost potential including lifted roof tiles and cracks in the brickwork. Situated on an area of concrete hardstanding. Surrounded by scaffolding at the time of the survey.
20. Species-rich native hedgerow comprised of Hawthorn, Hazel, Blackthorn, English Elm and Ash.
21. Ruderal vegetation similar to TN 20 with the inclusion of Oxeye Daisy at high densities and occasional Red Campion *Silene dioica*.
22. A SUDS pond within a parcel of ruderal vegetation described in TN21. Sloping earth banks with occasional Pendulous Sedge *Carex pendula*.
23. A shaded pond approximately 30cm in depth. Tussocks of Pendulous Sedge and patches of encroaching Bramble, Willow, Pedunculate Oak and Alder, border the edge of the pond. The pond area is enclosed by a chicken-wire fence.
24. Modified grassland with a short sward length of approximately 20cm in length comprised of Perennial Rye Grass, Cocks Foot, Red Fescue, Meadow Buttercup, Broadleaved Dock and Dandelion.
25. Lowland mixed deciduous woodland. Dominant species within the woodland include Ash, Pedunculate Oak and Alder with a Hawthorn and Field Maple understorey. The ground layer includes Bramble, Wood Aven, Herb Robert, Ground Ivy, and Hairy Brome *Bromopsis ramosa*. There are fallen wood and dead-wood piles throughout the woodland area and multiple trees with possible bat roosting potential. The woodland, in part, is listed on Natural England's Ancient Woodland Inventory.
26. Large parcel of bare ground with large spoil heaps. During the time of the survey, excavators were topping soil within the parcel. Field margins were sparsely vegetated with ruderal species including Bramble, Curly Dock, Spear Thistle, Ragwort and Common Nettle.
27. Lowland mixed deciduous woodland. A thin strip of broadleaved woodland plantation behind this comprised of Ash, Lombardy Poplar, Field Maple, White Willow, Grey Willow, Dogwood, Hazel, Hawthorn, Blackthorn and Bramble with Common Ivy and Cleavers dominating the ground layer. Some of the trees have features of possible bat roosting potential. A ditch that had small pools of standing water is present along the southern side of the wooded strip.
28. Site compound on hardstanding area.
29. Short ruderal vegetation within the northern end of the parcel similar in species composition to TN18 with the inclusion of Ribwort Plantain *Plantago lanceolata*, Timothy *Phleum pratense*, Musk Mallow *Malva moschata* and Bristly Oxtongue. Bare ground is present across the southern area of the parcel with small field margins

approximately 1m in width comprised of similar short ruderal species as the northern area.

30. A dense, intact, species-rich native hedgerow with trees comprising Pedunculate Oak, Beech, Ash, Goat Willow *Salix caprea*, Black Poplar *Populus nigra*, Field Maple, Dogwood, Hazel, Holly, Bramble and Common Broom *Sarothamnus scoparius*. The hedgerow is approximately 15 years old and tree guards are present on some individual plantings with some mature trees present along the roadside, especially within the southern section of the hedgerow.
31. Modified grassland with species including Yorkshire Fog, Perennial Rye-grass, False Oat-grass *Arrhenatherum elatius*, Cock's Foot, Red Fescue, Common Bent, Creeping Buttercup, White Clover, Doves-foot Cranesbill *Geranium molle*, Common Vetch, Common Mouse-ear *Cerastium fontanum*, Scentless Mayweed *Tripleurospermum inodorum*, Creeping Thistle, Spear Thistle, Common Sorrel, Ragwort, Greater Willowherb *Epilobium hirsutum*, Cleavers, Broad-leaved Dock, Common Knapweed *Centaurea nigra*, Meadow Vetchling *Lathyrus pratensis*, Forget-me-not sp., Fleabane *Pulicaria dysenterica* and Self-Heal *Prunella vulgaris*. Along the treeline to the south, Hemp Nettle *Galeopsis tetrahit*, Lady's Thumb *Persicaria maculosa*, Scentless Mayweed, Prickly Sow-Thistle and Clustered Dock with wet flushes of Sedge and Soft Rush. There are two soil bunds/soil storage piles with tall ruderals dominated by Spear Thistle, Common Nettle, Broadleaved Dock and Smooth Hawksbeard *Crepis capillaris* with large patches of scrub within the grassland with species including Bramble, Elder, Silver Birch and Dog-rose with Common Nettle. There are also piles of deadwood near and within the scrub.
32. Non-native and ornamental species-poor hedgerow comprising Cherry Laurel *Prunus laurocerasus*, Leylandii Cypress *Cupressus x leylandii* and Elder, broken by Bramble scrub on the north-eastern edge of the grassland field (TN 31). To the south of the hedgerow, continuing along the field boundary is a wooden post and electric wire fence which is overgrown with tall grasses and ruderal vegetation.
33. An outgrown, defunct native species-rich hedgerow with trees adjacent to Park Lane, with a dry ditch below. Species within the hedgerow include Pedunculate Oak, Black Poplar, Gorse (*Ulex europaeus*), Holly, Grey Willow, Blackthorn, Bracken and Bramble. A treeline of Pedunculate Oak is present approximately 5m into the field from the hedgerow.
34. A ditch that was dry at the time of survey with scattered Bramble scrub and trees including Willow and Pedunculate Oak, some of which have possible bat roosting potential. Behind the ditch is a fence and a dirt track, used as an access route into the site. A scrub line is present along the eastern side of the track and is 1-2m wide comprised of Grey Willow, Dog Rose, Oak and Bramble scrub. Track supports ephemeral vegetation including Scentless Mayweed, Cocks Foot, Smooth Hawksbeard, Common Yarrow, Hawthorn saplings, Common Bent and Spear Thistle.
35. Modified grassland field with a similar species composition to Target Note 31, with more Bent dominant in the north and False Oatgrass and Fescue sp. dominated to the south. Occasional species include Greater Plantain, Ribwort Plantain, Greater Birds-foot Trefoil, Common Hogweed, Cleavers, Meadow Vetchling, Mouse-ear, Common Vetch, Common Fleabane, Creeping Buttercup, Red Fescue and Soft Rush.

Bramble scrub is present along many of the field boundaries, with Common Nettle also present. A wet flush is present within the west of the field and contains Common Horsetail, Common Nettle, Sow Thistle, Soft Rush and occasional Hemp Nettle.

36. Scattered semi-mature trees and scattered areas of dense scrub along fence line. Species present include Oak, Ash, Blackthorn, Dog Rose, Bramble and Common Nettle.
37. A line of scrub and trees with a dry ditch bordering Park Lane.



KEY

- Parcel 4 and 5 site boundary
- 2022 survey area boundary
- 2024 survey area boundary
- Tree/building subject to emergence/ re-entry survey in 2020 by HDA
- Tree subject to aerial inspection survey in 2024 by HDA

TREES

- Confirmed roost
- High bat roosting potential
- Moderate bat roosting potential
- Low bat roosting potential (PRF-I)

The highest bat roosting potential recorded are shown for the groups(G)/woodlands(W).

All other trees/tree groups within the survey area are regarded as having 'Negligible' potential to support roosting bats.

Roosting categories relate to roost potential in accordance with the best practise guidelines at the time of the survey (BCT, 2016; BCT, 2023).

CLIENT:
CALA Homes Thames Ltd.

PROJECT:
Hogwood Farm, Finchampstead

TITLE:
Bat Roost Survey Summary Plan - Parcels 4 and 5

SCALE AT A3:
NTS

DATE:
September 2024

868.1/67

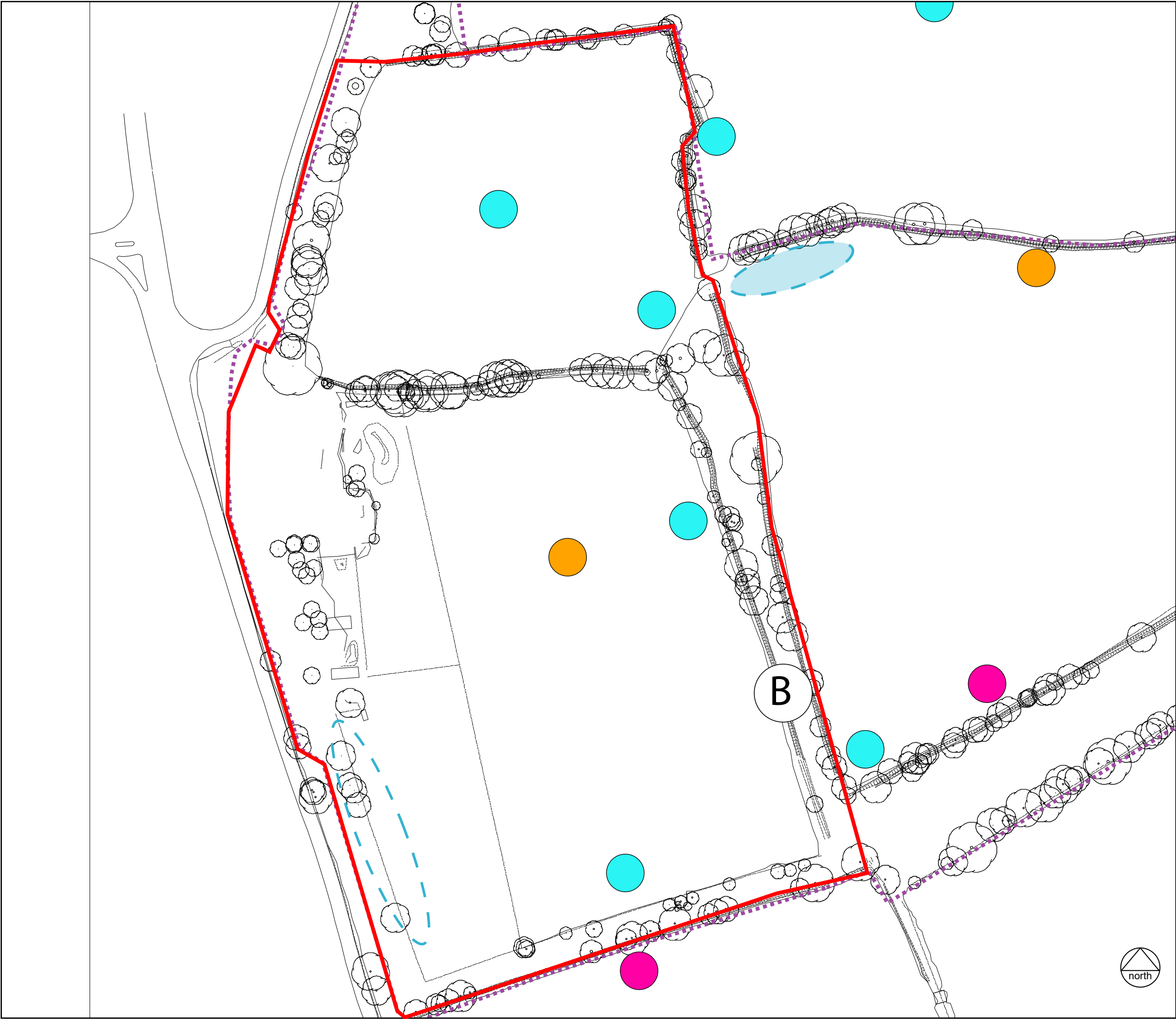
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**Landscape Architecture
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KEY

Parcel 4 and 5 site boundary

2022 survey area boundary

A

Automated detector location

Phase 2 Activity Transect Survey Results

Common Pipistrelle

Single bat pass

Occasional bat pass/foraging

Moderate bat foraging

Soprano Pipistrelle

Single bat pass

Moderate bat foraging

Noctule

Single bat pass

Moderate bat foraging

Brown Long-eared bat

Single bat pass

Myotis sp. bat

Single bat pass

CLIENT:
CALA Homes Thames Ltd

PROJECT:
Hogwood Farm, Finchampstead

TITLE:
Parcels 4 & 5 - 2022 Bat Activity Survey Summary Plan

SCALE AT A3:
NTS

DATE:
September 2024

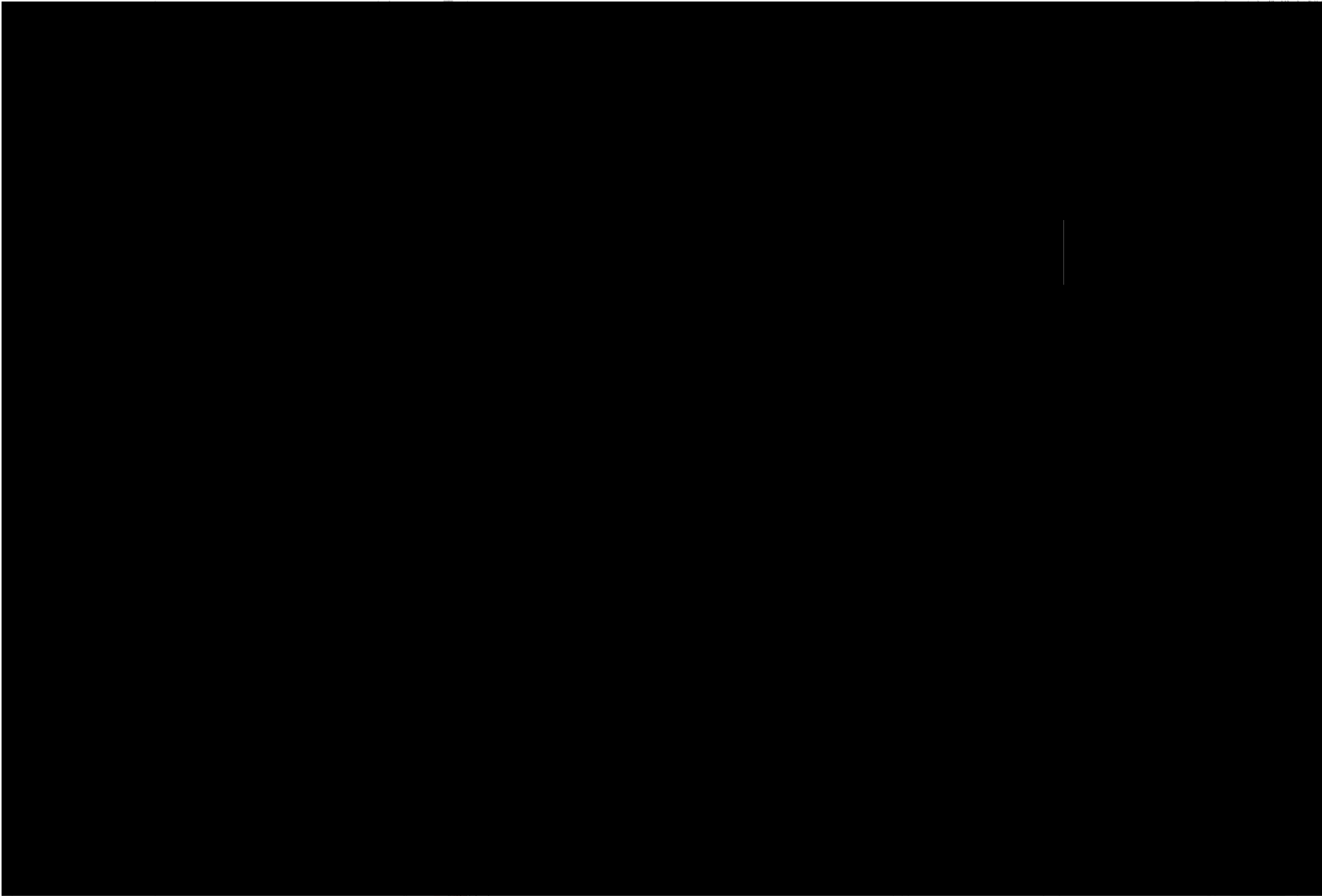
868.1/68

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Landscape Architecture
Masterplanning
Ecology

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APPENDIX D

Management Schedules

Grassland Management

Habitat Type	Management Phase	Operational objective	Activity	J	F	M	A	M	J	J	A	S	O	N	D
Wildflower meadow	Establishment	Ensure establishment of a healthy sward.	Once established cut to a height of approximately 10cm. Remove cuttings. Carried out every 6-8 weeks throughout first growing season from mid-summer onwards.												
	Maintenance	Maintain and enhance meadow grassland for ecological diversity.	Cut once annually to no less than 10cm, at the end of August. Remove cuttings.												
Rough	Establishment	Ensure establishment of a healthy sward.	Once established cut to a height of approximately 10cm. Remove cuttings. Carried out every 6-8 weeks throughout first growing season from mid-summer onwards.												
	Maintenance	Maintain and enhance rough grassland areas.	Single cut to 10cm in late-spring on 2-3 year rotation. 30-40% to be cut in any one year.					1							
Amenity	Establishment	Ensure establishment of a healthy sward.	Carry out first cut once grass has reached 5cm, cutting off 1cm, and lightly roll. Maintain sward at 5cm by regular cutting at appropriate intervals through the growing season.			1	1	2	2	2	2	1	1		
	Maintenance	Maintain a short, neat sward for moderate recreational use. Prevent encroachment of woody species.	Regular cutting to 5cm throughout March-October (up to 14 times per year). Water and weed when needed.			1	1	2	2	2	2	1	1		
All new grassland	Establishment	Control problem species, e.g. Ragwort, Nettles, Thistle	Apply spot herbicide as required (Assume 1% of total area to be treated) or hand pull if within 5m of waterbodies					1							
	Maintenance	To maintain a healthy and uniform sward. Do not apply organic or inorganic fertilisers or lime. Do not apply insecticides, herbicides or fungicides; the exception is herbicides for the control of specific problem weeds – herbicides for these species should be applied by weed wiper or spot treatment with a back-pack sprayer.	Repair any erosion and settlement with re-seeding with the same species seed mix as used originally at appropriate time during the growing season. Control encroaching scrub.												

Note: Shaded blocks indicate recommended window for the relevant management activity to be carried out. Numbered blocks indicate that management should be carried out at this time and the frequency.

Hedgerows and Boundary Management

Type	Management Phase	Operational Objective	Activity	J	F	M	A	M	J	J	A	S	O	N	D
Native and Ornamental Hedgerows (new)	Establishment	Establish new species-rich native hedgerows, native hedgerows and ornamental hedgerows.	Plant hedgerows and protect with appropriate guards (see 'Trees and Scrub' schedule). Cut annually for 3 years to encourage bushy growth.												
	Maintenance	Maintain and enhance ecological value. Allow the development of standard trees within the hedges.	Species-rich native hedgerows (informal): Cut on 2-3 year cycle with tractor mounted cutter or hand held equipment, with 1/3 of hedges being cut every year on rotation.												
			Native hedgerows and ornamental hedgerows (formal): Cut up to 3 times a year using tractor mounted cutter or hand held equipment (preceded by nesting bird check where appropriate).						1		1		1		
Native Hedgerows (existing)	Establishment	Enhance hedgerows for wildlife and habitat connectivity. Plant up gaps in existing hedgerow.	Plant up gaps to correspond with existing width of hedgerow and protect new planting with appropriate guards (see 'Trees and Scrub' schedule). Cut annually until height matches with existing.												
	Maintenance	Maintain and enhance ecological value. Allow the development of standard trees within the hedges.	Cut on 2-3 year cycle with tractor mounted cutter or hand held equipment, with 1/3 of hedges being cut every year.												
Plant guards	Establishment	Protect from animal damage.	Inspect and maintain guards twice a year for up to 5 years after planting (see 'Trees and Scrub' schedule).												
Fences and gates	Maintenance	Maintain condition and safety, and integrity of fencing and any gates not pertaining to private curtilages.	Inspect annually and repair as necessary.												
All boundaries	Maintenance	Maintain condition and ensure boundaries are fulfilling duties.	Inspect twice per annum.												

Note: Shaded blocks indicate recommended window for the relevant management activity to be carried out. Numbered blocks indicate that management should be carried out at this time and the frequency.

Native Scrub and Tree Management

Habitat Type	Management Phase	Operation Objective	Activity	J	F	M	A	M	J	J	A	S	O	N	D
New trees and native scrub planting	Establishment	Ensure establishment of healthy trees and scrub.	Protect with appropriate guards/fencing.												
			Maintain >1m weed-free zone around base of newly planted trees and shrubs using mulch and/or 3 herbicide applications per year (or hand pulling if within 5m of waterbodies).				1		1			1			
			• Replace any dead plants during establishment period.												
		Ensure establishment by observing moisture levels around base of trees during dry months and tree stakes are intact.	• Water during long, dry spells. • Regularly check tree stakes until fully established, 3 times per year. Repair and replace damaged tree stakes and ties. Remove stakes once established. • Keep clear stems up to 2m.												
	Maintenance	Maintain and enhance for ecological diversity, amenity and public safety.	• Coppice shrubs on a 10 year rotation (or as required), cutting no more than 1/5 of all shrubs each year. Use brash from cuttings to protect stools, and stack logs. • Thin tree canopy from new woodland areas by gradually removing nurse species. Assess annually. • Inspect. Stop low branches and scrub encroaching onto footpaths.												
		Maintain for public safety and check for diseases.	Inspect. Fell dangerous trees, remove dangerous branches.												
Plant guards	Establishment	Protect from animal damage.	Inspect and maintain guards twice a year for up to 5 years after planting.												
Tree stakes	Maintenance	Maintain for support of trees until self supporting.	Check ties 3 times per year. Tighten/loosen and replace as necessary. Remove stakes once established.												

Note: Shaded blocks indicate recommended window for the relevant management activity to be carried out.

Woodland

Type	Management Phase	Operational Objective	Activity	J	F	M	A	M	J	J	A	S	O	N	D
Existing woodland	Establishment	Removal of man-made debris and abandoned items/waste	Clearance of debris from woodlands.												
		Reinstate coppicing, establish coupes and a programme of rotation.	Coppice selected stools, protect regrowth using brash or fencing and monitor.												
		Establishment of native broadleaved woodland of a diverse biodiversity and age structure.	Establish ecotones within buffer zones along woodland edges (refer to 'Grassland' and 'Trees and Scrub' for establishment and aftercare.												
			• Installation of bat and bird boxes. • Construction of log and brash piles.												
	Maintenance	Coppicing.	Continue coppicing of selected stools (subject to outcome of monitoring), protect and monitor regrowth. Establishment of new stools if required.												
		Cut back vegetation encroaching onto woodland paths to ensure safe and accessible route.	Annually.												
		Thinning of trees and understorey to encourage diversity of ground flora.	Assess annually.												
		Fell dangerous trees	As appropriate to ensure the woodlands are a safe environment for local residents.												
		Inspect and repair or replace bat/bird boxes	Inspect every 6 months.												
		Construct log/brash piles from deadwood and felled trees/cleared vegetation.	As required following vegetation clearance.												

Note: Shaded blocks indicate recommended window for the relevant management activity to be carried out.

Wetland Management																
Habitat Type	Management Phase	Operational Objective	Activity	J	F	M	A	M	J	J	A	S	O	N	D	
Existing ditches	Establishment	Re-profile and ecologically enhance the ditches.	• Remove and dispose of any debris present.													
			• Removal of excessive silt.													
			• Introduction of in channel features and reprofiling of banks.													
	Maintenance	Maintain the ditches as wildlife habitat.	• Remove self-seeded scrub and woody species by hand.													
			• Cut or hand pull aquatic and marginal species as required to maintain at least 50% open water and variety of edge habitat.													
			• Removal of excessive silt (no more than 20% in any one year).													
		Maintain ditches in a safe condition.	Monitor condition and maintain any signage and safety equipment.			1									1	

Note: Shaded blocks indicate recommended window for the relevant management activity to be carried out. Numbered blocks indicate that management should be carried out at this time and the frequency.

Furniture, Footpath and Miscellaneous Management

Type	Management Phase	Operational Objective	Activity	J	F	M	A	M	J	J	A	S	O	N	D
Furniture (Informal Play Equipment, benches, bins etc)	Maintenance	Ensure furniture is safe and fit for purpose. Become aware of any site vandalism.	Assessment carried out annually during site inspection.												
Footpaths	Maintenance	Maintain footpaths in good order, removing encroaching vegetation, weeds and repair any structural damage.	Apply herbicide annually if required. Review potholes annually and reprofile as necessary.												
Litter and fly tipping	Establishment, Maintenance	Ensure site is kept free from litter and fly tipping.	Clear litter from site while undertaking maintenance tasks throughout the year. Fly tipping to be monitored and reviewed.	1	1	1	1	1	1	1	1	1	1	1	1
Deadwood	Maintenance	Construct log and brash piles through areas of habitat from deadwood and felled trees/scrub.	Create piles from deadwood and felled vegetation during maintenance.												
Non-native Invasive Species	Establishment, Maintenance	Prevent re-establishment of non-native invasive species.	• Inspect annually and control any alien or invasive species (e.g. Rhododendron) as they appear.												
Site inspection and audit	Maintenance	Ensure site is establishing, identify any particular problems as early as possible. Ensure maintenance is running effectively in the long term.	Inspection of site establishment and maintenance effectiveness every 6 months. Update management plan as appropriate.												

Note: Shaded blocks indicate recommended window for the relevant management activity to be carried out. Numbered blocks indicate that management should be carried out at this time and the frequency.