Romany Poole BSc (Hons) MSc
Graduate Ecologist
Email: romanypoole@arbtech.co.uk
Arbtech Consulting Ltd
arbtech.co.uk

Preliminary Ecological Appraisal and Roost Assessment

Survey site:

39 Parkfield Road Hillingdon UB10 8LW

Client:

KDA Designs LTD

Survey date:

15th January 2024

Project:

This report is prepared to inform a planning application with the London Borough of Hillingdon. The proposal is described as:

Erection of a replacement dwelling following the demolition of the existing.

[Submitted and granted]

PEA survey methodology and legislation can be found in the Arbtech Supplement: **PEA Methodology and Legislation - 2024.**

PRA survey methodology and legislation can be found in the Arbtech Supplement: **PRA Methodology and Legislation - 2024.**

The site survey was undertaken by Romany Poole BSc (Hons) Accredited license – details available on request.					
Date of survey	Temperature (°C)	Humidity (%)	Cloud Cover (%)	Wind (km/h)	Rain
15/01/2025	9	96	100	9	None

Ecological Survey Factor **Conclusion, Impact or Recommendations**	**Detailed using desk study and site survey (carried out under good weather conditions). Any specific limitations noted within relevant section. This table may include further work you will need to commission (if any) to obtain planning permission or comply with legislation for other consent. All clients are expected to read and understand this section, or to contact the lead surveyor for advice.**
Habitats and plants (see habitat map in appendix 1, location plan in appendix 2, proposal plan in appendix 3 and photos in appendix 4). **Botanical species are described with reference to the DAFOR scale (D = Dominant; A = Abundant, F = Frequent, O = Occasional, R = Rare).**	
Summary of Survey Findings **(***UKHab codes used)*	**Site Context** The survey site is centred on National Grid Reference TQ 07823 86639 and has an area of approximately 0.147ha. The site comprises one dwelling (B1), associated outbuildings (B2 & B3) and a vegetated garden with scattered trees. It is situated 0.6km west of West Ruslip. There are scattered trees within the site and extending into the local garden landscape. Aerial imagery shows the local landscape to have an urban character, with residential dwellings in all directions . Patches of woodland can be found nearby, located ~0.90km to the northeast and north-west. Such features likely enhance the area for a variety of species, including bats, amphibians and reptiles. The site does not contain any habitats listed as a habitat of principal importance under Section 41 of the Natural Environment and Rural Communities (NERC) Act (2006). The habitats within the site are common and widespread and have low ecological value. No protected or notable plant species were recorded during the survey. Notable habitats are present within 2km. **On-site habitat descriptions** **u1b5-** Developed, sealed surface (buildings) There is one building on site (B1) with two associated outbuildings (B2 and B3). Se 'Bats' section for full PRA details. **u1b6** – Other developed land Hardstanding is present in the form of a patio located to the rear of B1.

u1c - Artificial unvegetated, unsealed surface
A gravel driveway is located to the front of B1.

u1 828 32- Built up areas and garden –vegetated garden with scattered trees
The rear of B1 is characterised as a residential vegetated garden. The lawn is heavily managed and retains a sward length of approximately <5cm. Species comprise perennial rye grass (D), dandelion (O), creeping buttercup (O) and white clover (O).

h2b – Non-native and ornamental hedgerow
An ornamental hedgerow of managed Monterey cypress formally clipped with an open archway pruned out on the western side is located within the centre of the rear garden. The average height of woody growth estimated from base of stem to the top of the shoots is approximately 4m with a width of approximately 2m. A further two managed hedgerows are present along the north-western boundary of the rear garden, comprising of Forsythia with a height of 2m, and Pyracantha located to the north-west of B1 with a height of 2m.

32 Scattered trees

There are seven scattered trees present throughout the site. Species comprise an **Extra large** Oak, and **Small** Dappled Willow, Flowering Cherry, Holly, Japanese Cherry, Pittosporum and Viburnum. All small trees are proposed to be removed and are listed below.

Table 1: Trees due to be removed

Species	Size	Age	Condition
Viburnum	Small	Early Mature	Moderate
Dappled Willow	Small	Early Mature	Moderate
Japanese Cherry	Small	Mature	Moderate
Flowering cherry	Small	Mature	Moderate
Holly	Small	Mature	Moderate
Pittosporum	Small	Mature	Moderate

	Condition assessment – Oak **(Good)** A. The tree is a native species B. The tree canopy is predominantly continuous C. The tree is mature D. Little or no evidence of adverse impact on tree health through human activities E. Natural ecological niches are present F. More than 20% tree canopy area is oversailing vegetation beneath Condition assessment – All remaining trees **(Moderate)** A. Trees are not a native species B. The tree canopy is predominantly continuous C. More than 50% within the block are mature D. Little or no evidence of adverse impact on tree health through human activities E. No ecological niches are present F. More than 20% tree canopy area is oversailing vegetation beneath **Local notable habitats** Patches of lowland mixed deciduous woodland (LMDW) are present is close proximity to the site. The closest is located ~0.90km to the northwest, with a second patch of LMDW ~0.95km to the northeast. The trees on-site likely have functional connectivity to these patches of woodland, given their proximity to the site and the presence of numerous trees throughout the garden landscape. LMDW is classed as a priority habitat under Section 41 of the Natural Environment and Rural Communities (NERC) Act, 2006. Further priority habitats are present within 2km of the site, including lowland meadows, woodpasture and parkland, and traditional orchards.
Foreseen Impacts	**On-site habitats** The proposed development will result in the loss of scattered trees, shrubs and hedgerow. This is likely to have a minimal impact on biodiversity due to the low ecological value of these habitats. **Notable habitats** No impacts to any notable habitats are anticipated due to the small scale and distance of the proposed development from such habitats as well as the urban location of the site with surrounding physical barriers.
Recommendations	**On-site habitats** Retained trees should be protected in line with the measures outlined in the British Standard "Trees in Relation to Design, Demolition and Construction to Construction - Recommendations" (BS 5837) (2012). **Notable habitats** None required.

Locality and Designated Sites	
Summary of Survey Findings	**On-site designations** The site is not subject to any designation. **Statutory designated sites (within 2km)** There are two statutory sites within 2km of the site, as detailed below: <u>Fray's Farm Meadows Site of Special Scientific Interest (SSSI) 1.9km west</u> • Fray's Farm Meadows are one of the last remaining examples of relatively unimproved wet alluvial grassland in Greater London and the Colne Valley. The linear features of the site - ditches, hedges and railway embankment - add further habitat diversity, and contribute to the richness of plants and animals present <u>Fray's Valley Local Nature Reserve (LNR) 1.9km west</u> • The wildlife-rich Frays River meanders through the luxuriant Frays Farm Meadows SSSI. areas Snipe; water vole and harvest mouse; kingcups and ragged robin; slow worm; willow; banded demoiselle are on site. **Non-statutory designated sites** The presence of non-statutory designated sites within 2km of the site cannot be established without data from Greenspace Information for Greater London CIC (GIGL).
Foreseen Impacts	**On-site designations** No impacts foreseen. **Statutory and non-statutory designated sites** No impacts to designated sites are anticipated due to the small scale and distance of the proposed development from such sites (where known) as well as the urban location of the site with surrounding physical barriers.
Recommendations	**On-site designations** None required. **Statutory and non-statutory designated sites** None required.
Invasive / Non-native species	
Summary of Survey Findings	No problematic invasive and non-native species recorded on site.

<table>
<tr><td>Foreseen Impacts</td><td>N/A</td></tr>
<tr><td>Recommendations</td><td>No further surveys but remain vigilant.</td></tr>
<tr><td colspan="2">Invertebrates</td></tr>
<tr><td>Summary of Survey Findings</td><td>The habitats present on-site, including lawns, ornamental shrubs and trees, likely provide common invertebrates with opportunities to forage and shelter. The site contains no further notable habitats which may provide niches for specialised or protected invertebrates.</td></tr>
<tr><td>Foreseen Impacts</td><td>None foreseen.</td></tr>
<tr><td>Recommendations</td><td>No further surveys.</td></tr>
<tr><td colspan="2">Bats</td></tr>
<tr><td>Summary of Survey Findings</td><td>EPSL data
A search of the magic.gov.uk database for granted EPSLs within a 2km radius of the site has been completed. Displaced bats from licensed sites <2km away from the survey site will find alternative habitat either within the mitigation measures implemented as part of the licence or will relocate to other known roosts sites in close proximity to the licensed site. There are two EPSLs within a 2km radius of site as detailed below:

<table>
<tr><th>EPSL reference</th><th>Bat species affected</th><th>Distance from site</th><th>Impacts allowed by licence</th></tr>
<tr><td>EPSM2010-1919</td><td>Common pipistrelle</td><td>1.4km</td><td>Destruction of a resting place</td></tr>
<tr><td>EPSM2012-4855</td><td>Common pipistrelle
Soprano pipistrelle</td><td>1.7km east</td><td>Destruction of a resting place</td></tr>
</table>

Foraging and commuting habitat
Habitats recorded on site are assessed to provide foraging and commuting opportunities for bats in the form of vegetated lawn, hedgerows and shrubs. These habitats are likely to provide micro-climatic conditions that support invertebrates that will in turn provide foraging opportunities for local bat populations.

Roosting habitat
Buildings and trees to be impacted by the proposed development are assessed for their suitability to support roosting bats below. No evidence of roosting bats was identified on or within B1 or any of the surveyed trees on-site.</td></tr>
</table>

B1 Building description	***Photographs***
Summary B1 is a two storey detached rendered residential dwelling with a single storey flat section on the north-western elevation. The roof is clay tiled with numerous gaps and missing tiles which provide suitable bat roosting and access features under roof tiles. Part of the north-eastern and south-eastern elevation is clad in clay hanging tiles. No evidence of bats was identified internally and externally during the survey, however any external evidence can be washed away or hidden under tiles. The building will be demolished to facilitate the works. The building has **moderate habitat value**.	 

Feature	*Materials*	*Condition/description/suitability*	*Photographs*
Walls	Brick rendered, clay hanging tiles on north-east and south-east elevation	**Condition/description** Rendered brickwork excellent condition with no gaps. Tight fitting hanging tiles on the north-east and south-east elevation **Suitability/access/evidence of bats** No gaps that could provide roosting opportunities for crevice dwelling bats. No evidence found but recent and current rain would wash this away externally.	
Roof	Clay	**Condition/description** Hipped roof. Roof tiles generally in good condition, however there is one broken tile on the south-western elevation alongside numerous lifted tiles on the porch. **Suitability/access/evidence of bats** Space under tiles could accommodate small numbers of crevice dwelling bats due to the small size of the porch roof. No evidence found but recent and current rain would wash this away externally	

Eaves	Overhanging	**Condition/description** Tightfitting	
Barge boards/fascia boards	N/A	N/A	N/A
Window/doors frames and lintels	Timber	Tight fitting	N/A

Internal space	Bitumen felt	**Condition/description** The loft has been lined with bitumen felt on top of the existing beams, rafters and roofing felt. The felt appears to be in good condition. **Suitability/access/evidence of bats** The loft appears to be well sealed however there is a small gap at the gable end which could allow access into the loft. No evidence of bats was identified within the loft space.	

B2 Building description	***Photographs***
Summary B2 is a timber shed located within the south-western corner of the site. The timber shed, is well sealed, however there is a gap above the door which could provide access into the shed. There are no areas of roosting habitat available for crevice dwellers. The internal area has no void, therefore no habitat value for void dwelling bats. No evidence of roosting bats was identified internally or externally during the survey. B2 is **negligible** for roosting bats.	

<table>
<tr><th>B3 Building description</th><th>Photographs</th></tr>
<tr><td>Summary

B3 is a timber shed located along the south-eastern boundary of the site. This timber shed, is well sealed, with no areas of roosting habitat available for crevice dwellers. The internal area has no void, therefore no habitat value for void dwelling bats.

No evidence of roosting bats was identified internally or externally during the survey.

B3 is negligible for roosting bats.</td><td>  </td></tr>
<tr><td>Foreseen Impacts</td><td colspan="2">Roosting habitat [Buildings]

B1
The proposed development will result in the demolition of this building. This could result in the destruction of any bat roosts present and could cause disturbance, death or injury to bats.

B2 and B3
Bats are very unlikely to be roosting within B2 and B3 and as such, there are not anticipated to be any impacts on bats in this location as a result of the proposed development.

Roosting habitat [Trees]
No features were identified on any of these trees and as such there are unlikely to be any impact to bats as a result of their felling.</td></tr>
</table>

	Foraging and commuting habitat The proposed development will result in the loss of small areas of vegetated garden and shrubs but given their low value and the presence of more extensive areas of foraging and commuting habitat in the locality, this is likely to be inconsequential for bats. **Artificial lighting** No new lighting will be installed as a result of the proposed development.
Recommendations	**Roosting habitat [Buildings]** Two bat emergence/re-entry surveys are required on B1 during the active bat season (May – September) to confirm presence/likely-absence of bats roosting in or on the building. These survey visits should be completed during the optimal survey period mid-May to August inclusive. The survey visits should be at least three weeks apart. Four surveyors are required to provide full coverage of the building's elevations. Infrared camera should also be employed as part of the survey to cover all elevations. Lighting mitigation may be required based on the outcome of the night bat surveys. If any bat roosts are confirmed from this survey schedule, a bat licence would be required to demolish the buildings as it would involve the destruction of roosts. This is applied for with the help of a class 2 licensed bat ecologist after planning permission is granted, but before commencement of works. If bat roosts are confirmed in the building an EPSL application will be required to Natural England. The EPSL application requires that all surveys have been undertaken within the most recent active bat season and planning permission must have been granted and all relevant wildlife-related conditions have been discharged prior to submission. **Roosting habitat [Trees]** In the unlikely event that a bat or evidence of bats is discovered during the development all work must stop and a bat licensed ecologist contacted for further advice. **Foraging and commuting habitat** No further surveys are required. **Artificial lighting** None required.

	Suggested biodiversity enhancements Enhancements are dependent on the outcome of further surveys.
Birds	
Summary of Survey Findings	**Buildings** No evidence of nesting birds was identified on or within B1 however the lifted and broken roof tiles may provide nesting opportunities. **Trees and vegetation** No bird nests were identified within the vegetation on-site, however the scattered trees and hedgerow offer nesting opportunities and nest-building resources for birds. **Barn owls** The site does not appear to provide any suitable nesting sites for barn owls. **Overwintering birds** Due to the small size of the site and the extent and type of the habitats recorded, the site not considered suitable to support a significant assemblage of protected and/or notable birds.
Foreseen Impacts	**Buildings/trees** The proposed development could result in the destruction or the disturbance and subsequent abandonment of active bird nests. **Barn owls** None foreseen. **Overwintering birds** None foreseen.
Recommendations	**Buildings/trees** Any building or vegetation removal should be undertaken outside the period 1st March to 31st August. If this timeframe cannot be avoided, a close inspection of the vegetation should be undertaken immediately, by a qualified ecologist, prior to the commencement of work. All active nests will need to be retained until the young have fledged. Precautions should be taken with machinery and noise levels when working close to any retained nests so as not to disturb any nearby nesting birds during construction works. At least a 3-5m buffer should be created between any machinery and active nests until the young have fledged.

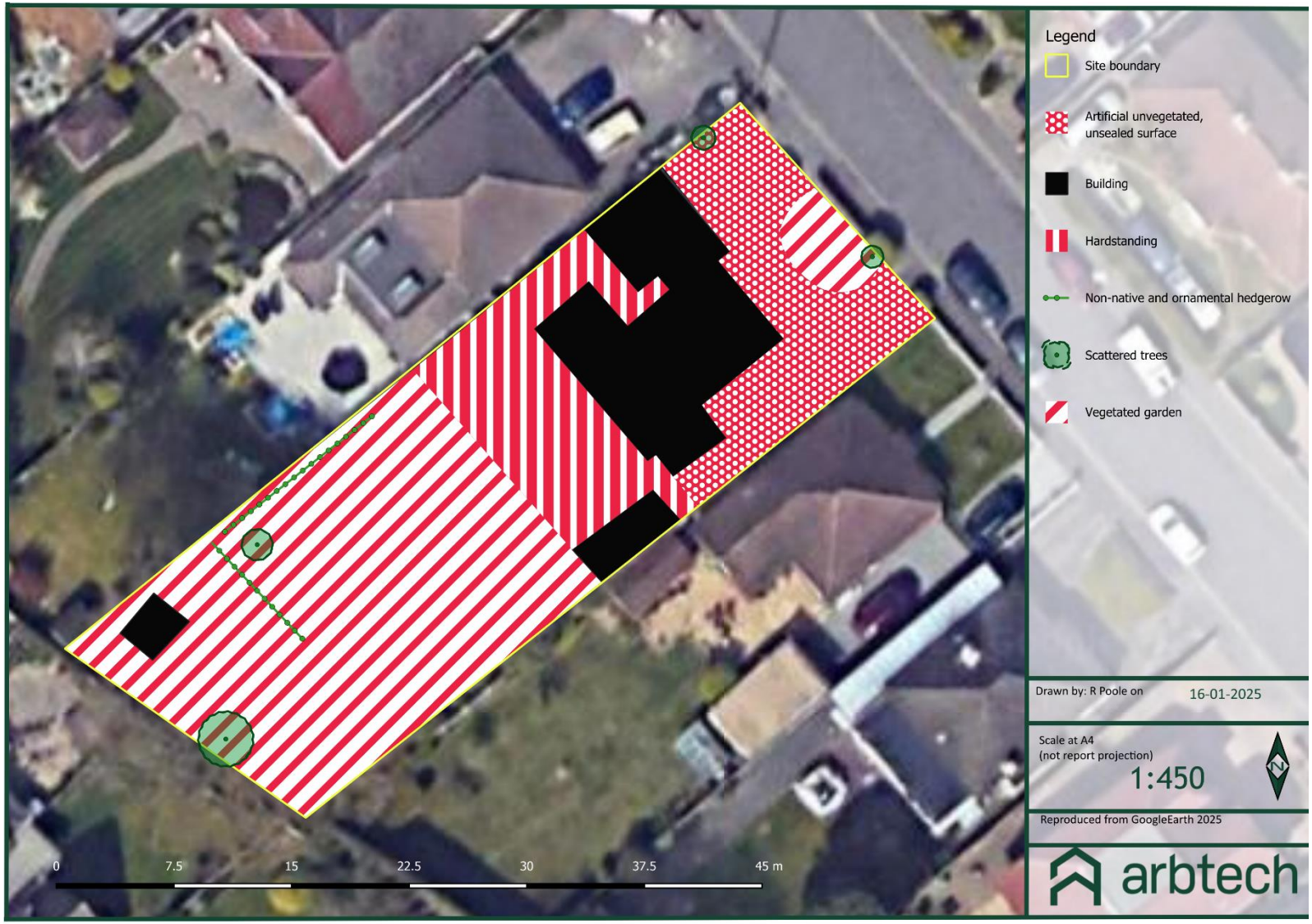
	Barn owls None required. **Overwintering birds** None required. **Suggested biodiversity enhancements** The installation of a minimum of two bird boxes integrated into the façade of the new dwelling will provide additional nesting habitat for birds e.g. Schwegler No 17 Swift Nest Box (buildings) Schwegler 1SP Sparrow Terrace (buildings) Or a similar alternative brand. Tree boxes should be positioned approximately 3m above ground level where they will be sheltered from prevailing wind, rain and strong sunlight. Small-hole boxes are best placed approximately 1-3m above ground on an area of the tree trunk where foliage will not obscure the entrance hole. Swift and sparrow boxes should be positioned at the eaves of a building and can be incorporated into the fabric of the building during construction.
Reptiles	
Summary of Survey Findings	**EPSL data** A review of the MAGIC database returned no granted EPSL records for protected reptiles within 2km of the site. **Habitat suitability** There is no suitable habitat present on site for reptiles due to a lack of habitats such as scrub and rank grassland which would offer refuge for these species. Further, the site is surrounded by urban development (i.e. roads and buildings) which is considered sub-optimal for reptile migration and therefore reptiles are considered unlikely to migrate from any nearby suitable habitats to the development site. As such it is likely that reptiles are absent from the development site.
Foreseen Impacts	No impacts are anticipated on reptiles as a result of the proposed development.
Recommendations	None required.
Amphibians	
Summary of Survey Findings	**EPSL and survey data** A review of the MAGIC database returned no granted EPSL records for great crested newts within 2km of the site. However, the MAGIC database did return four Great Crested Newt Class Survey Licence Returns. These records are located 0.8km and

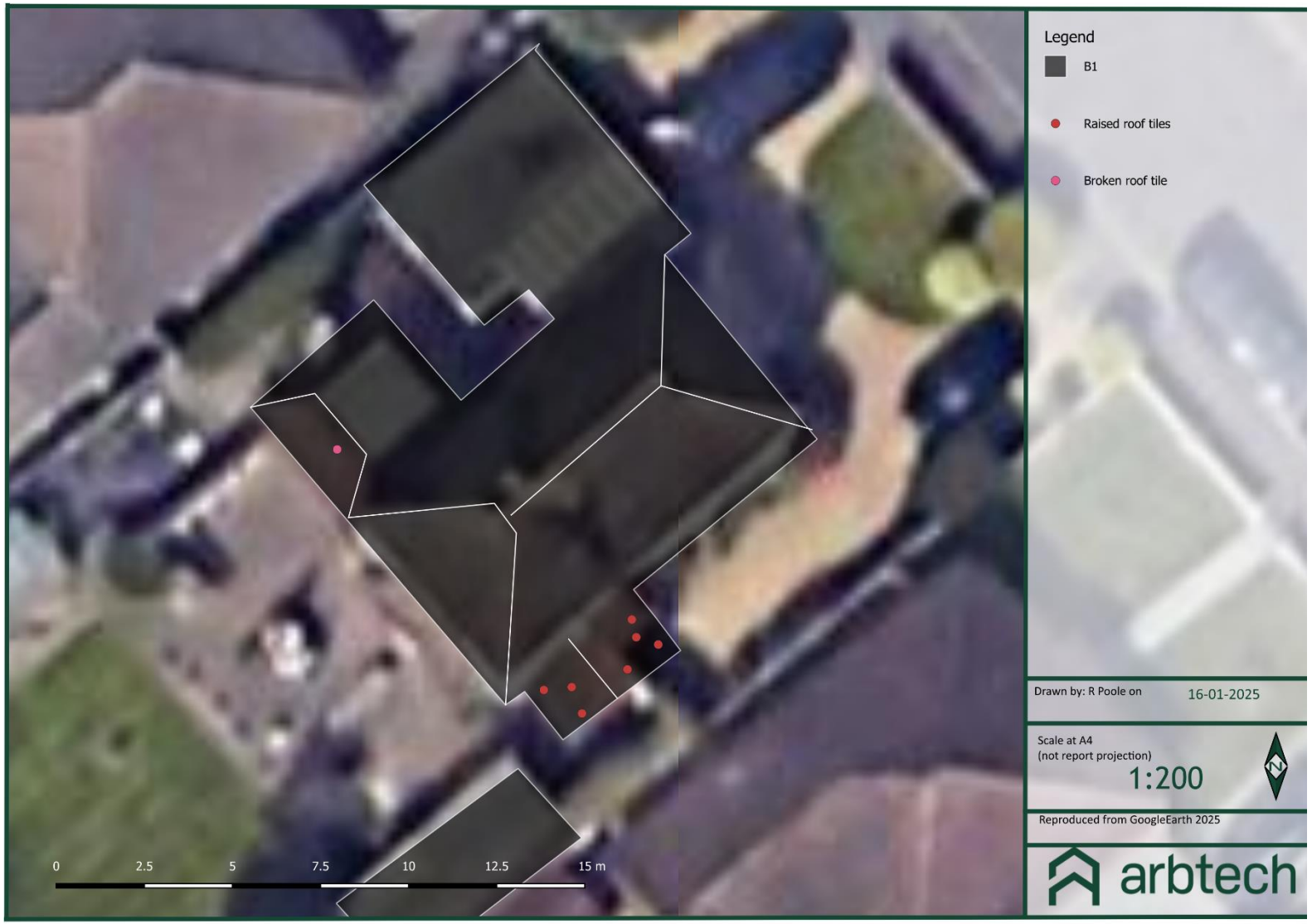
	0.85km south-east and north-west and 1.64km and 1.67km west. Great crested newts exist in metapopulations and are known to utilise ponds connecting terrestrial habitat during their life cycle; great crested newts are typically found within terrestrial habitats up to 500m from breeding ponds (Langton *et al.* 2001). As such, the great crested newt metapopulation known to be present are not suitably connected to the site. **Habitat suitability** No ponds are present on site or within 500m of the site. The site provides limited suitable terrestrial habitat for amphibians given the lack of optimal habitat (i.e. scrub, rank grassland). The areas of hard standing and vegetated lawn offer sub-optimal habitat for terrestrial amphibians. The hedgerows may offer refuge for these species, however given the urban nature of the surrounding landscape (i.e. dominated by roads and hard standing which are sub-optimal for amphibians) it is unlikely that amphibians will migrate on to site. Further, there is limited suitable terrestrial habitat across the wider landscape reducing the likelihood of amphibians being present on site and across the surrounding areas.
Foreseen Impacts	Given the lack of suitably connected breeding ponds within 500m of the site, the presence of GCN on-site is considered unlikely and therefore impacts to amphibians as a result of the proposed development are deemed to be acceptably low.
Recommendations	None required.
Badger	
Summary of Survey Findings	No badger setts were noted on site or within a 30m radius of the site. The site is considered unsuitable for badgers given the lack of suitable sett excavation areas/ground. Further, there is limited suitable badger foraging habitat on site given the lack of fruiting trees/scrub. The site is also surrounding by urban development (i.e. roads and buildings), which is sub-optimal habitat therefore reducing the likelihood of badgers being present within the surrounding area of the site.
Foreseen Impacts	No impacts are anticipated on badgers as a result of the proposed development.
Recommendations	None required.
Riparian animals	
Summary of Survey Findings	A review of the MAGIC database returned no granted EPSL records for otters or water voles within 2km of the site. There are no water courses on or connected to the site. There are also no riparian habitats present on site or within an influencing distance.
Foreseen Impacts	No impacts are anticipated on riparian animals as a result of the proposed development.
Recommendations	None required.

Hazel dormouse	
Summary of Survey Findings	**EPSL data** A review of the MAGIC database returned no granted EPSL records for hazel dormice within 2km of the site. **Habitat suitability** Dormice typically utilise a three-dimensional habitat structure as to commute between feeding and breeding sites whilst avoiding predation. As such habitats on site are considered unsuitable for hazel dormice and therefore the likelihood of this species being present on site is considered acceptably low.
Foreseen Impacts	No impacts are anticipated on hazel dormice as a result of the proposed development.
Recommendations	None foreseen.
Other e.g. hedgehog	
Summary of Survey Findings	The vegetated lawn onsite provides limited foraging and commuting opportunities for hedgehogs.
Foreseen Impacts	Vegetated lawn will be removed during construction. The loss of such habitats is likely to be inconsequential to local hedgehog populations owing to their low value and the presence of more extensive habitat locally. However, construction activities could result in the death or injury of hedgehogs, if present.
Recommendations	Similar to the badgers, a precautionary working method will be implemented during construction, including the following measures: • Any excavations will be covered overnight, or a ramp will be installed to enable any trapped animals to escape. • The use of night-time lighting will be avoided, or sensitive lighting design will be implemented to avoid light spill on to retained habitats which hedgehogs could use. • Any chemicals or pollutants used or created by the development should be stored and disposed of correctly according to COSHH regulations. If any hedgehogs are found in the working area these should be allowed to disperse of their own accord or, if at immediate risk, should be moved by hand to a sheltered, vegetated area away from disturbance. **Suggested biodiversity enhancements** The following habitat creation and enhancement opportunities could be incorporated into the proposed development which would be beneficial for hedgehogs: • Planting fruit bearing trees and species-rich grassland to increase foraging opportunities.

	• Creation of brash piles or installation of hedgehog houses in shady areas. • Installation of gaps under boundary fencing to enable hedgehogs to move freely through the site.

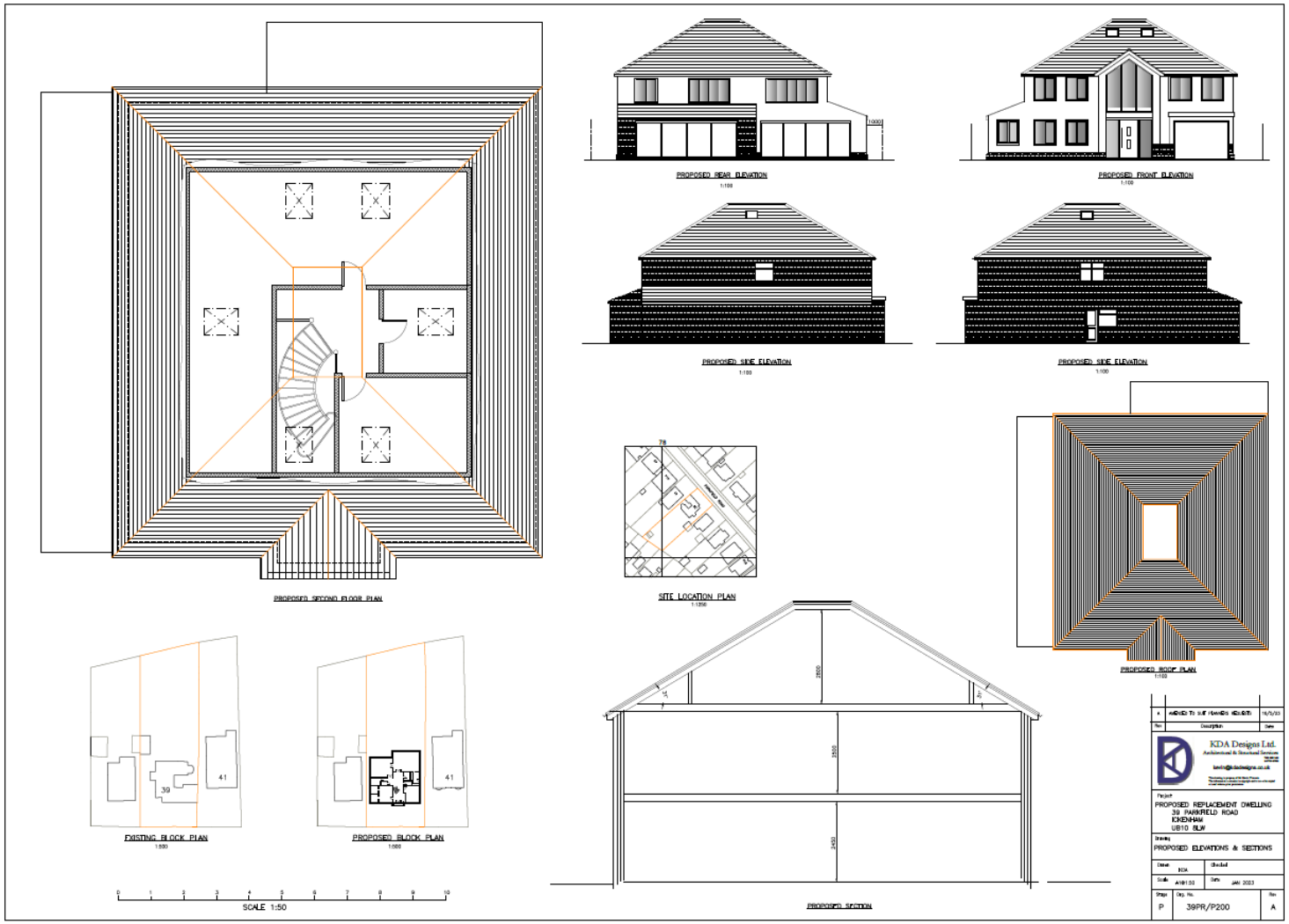
Appendix 1: Survey/Habitat map




Legend
B1
Raised roof tiles
Broken roof tile
Drawn by: R Poole on
16-01-2025
Scale at A4
(not report projection)
1:200
Reproduced from GoogleEarth 2025
arbtech
0
2.5
5
7.5
10
12.5
15 m

Appendix 2: Location map

Appendix 3: Proposed plan



Appendix 4: Photos

Photograph	Description
	**Figure 1: The main dwelling (B1) on site due to be demolished.**
Photograph	**Description**
	**Figure 2: Vegetated lawn with scattered trees located to the rear of B1.**

Photograph	Description
	**Figure 3: Japanese Cherry tree due to be felled.**
Photograph	**Description**
	**Figure 4: Ornamental Monterey Cypress hedgerow due to be removed**

Photograph	Description
	**Figure 5: Forsythia hedgerow along the north-western boundary of the rear garden**
Photograph	**Description**
	**Figure 6: Hardstanding patio to the rear of B1.**

Photograph	Description
	**Figure 7: Gravel driveway**

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Version control			
Status	**Issue**	**Name**	**Date**
Draft	0.1	Romany Poole BSc (Hons) MSc, Graduate Ecologist	20/01/2025
Proof	0.2	Mel Reid BSc (Hons) MRes MRSB, Senior Consultant	29/01/2025
Final	1.0	Romany Poole BSc (Hons) MSc, Graduate Ecologist	29/01/2025