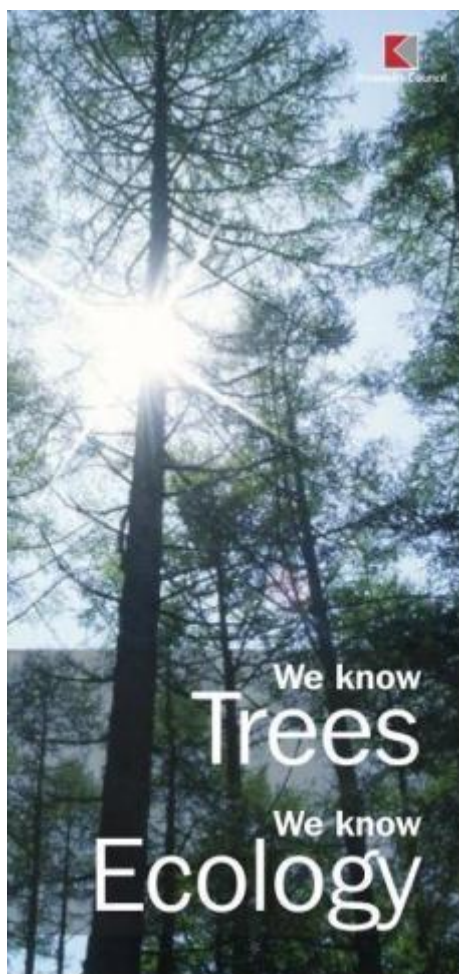


# ECOLOGICAL ASSESSMENT



## THE BRIDGE INN CHILDWALL VALLEY ROAD CHILDWALL

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## Extended Phase I Habitat Survey- The Bridge Inn, Childwall

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## **EXECUTIVE SUMMARY**

A desk top study, Extended Phase I habitat survey and Bat Scoping Survey was carried out to identify any ecological constraints on or directly adjacent to the The Bridge Inn, Childwall..

Dense scrub, scattered trees and one building on site had potential to support nesting birds. It is therefore recommended that any vegetation clearance must take place outside the period from March to September. Should this not be possible, any vegetation to be removed must be checked for nesting birds by an experienced ecologist immediately prior to the commencement of any works. If nesting birds are found, work must be delayed until the young have fledged.

Buildings 3 had high potential to support roosting bats and bat use was confirmed in building 4. The Lombardy Poplar also had moderate potential to support roosting bats. All bat species are European Protected Species (EPS) and are a material consideration in the planning process and under the Conservation of Habitats and Species Regulations 2010: planning consent cannot be given until all surveys have been completed and the data may inform potential mitigation and the planning decision. Bats are therefore a notable consideration at the site.

Further emergence/re-entry surveys are recommended in the active season between May and September to assess if bats are using any of the features for roosting with the following level of survey:

- Buildings 3 & 4- three surveys including two dusk or dawn survey and one dusk and dawn survey;
- Lombardy Poplar- two surveys including one dusk or dawn survey and one dusk and dawn survey.

If bat use is confirmed, an EPS development licence may be required.

It is also recommended that trees proposed to be retained are protected with appropriate fencing in line with *BS5837 Trees in relation to construction- Recommendations*.

Ecological enhancements have been proposed.

## **1.0 INTRODUCTION**

### **1.1 Background**

- 1.1.1 The report relates to land at The Bridge Inn, Childwall. This assessment was commissioned by Condry and Lofthouse Limited on behalf of CLAMCO Limited, to carry out an initial ecological assessment. To fulfil this brief an ecological desk study and Extended Phase 1 Habitat Survey were undertaken.

- 1.1.2 The survey was undertaken by Joe Barnes MSc BSc(Hons) M Arbor A, an experienced ecologist. The site visit took place on 10 April 2015.

## **1.2 Scope and Brief**

- 1.2.1 The purpose of the ecological assessment is to assess the presence and potential for protected species and habitats and consider the impact of any proposed works on these.
- 1.2.2 The report is to outline the survey methodology, present and assess the survey results and provide appropriate recommendations should further survey work be required. A Phase 1 Habitat Survey Map and associated target notes are located in appendix one and two respectively.

## **1.3 Site Description**

- 1.3.1 The site is located at Childwall Valley Road, Childwall (OS grid reference SJ43528 88413) and measures approximately 0.68 hectares.
- 1.3.2 The site is bounded to the north by Childwall Valley Road to the south and west by residential property and to the east by Kings Drive.
- 1.3.3 The plot consisted mainly of buildings, hard standing, dense scrub and scattered trees.
- 1.3.4 The trees on the site were mostly mature and present around the site in individuals and linear groups around the south and west boundary.
- 1.3.5 The wider landscape included residential gardens that adjoined the site and two golf courses- Childwall and Lee Park.
- 1.3.6 Some vegetation clearance had taken place prior to the site visit in order to facilitate the survey work. Tree management works were also evident by the presence of occasional tree stumps. Occasional rubbish piles were present on the hard standing areas to the front of the property that appeared to be part of estate maintenance works to tidy the area.
- 1.3.7 Photographs of the site are presented in appendix three.

## **1.4 Proposed Development**

- 1.4.1 Details of the proposed re-development of the site include the demolition of the building, and construction of a food retail unit, associated car parking and landscaping.

## **1.5 Biodiversity Legislation**

- 1.5.1 The construction and operational activities for the proposed works should comply with International, European and UK nature conservation legislation, and with national and local biodiversity policies.

- 1.5.2 The following legislation is relevant to this survey:
- Wildlife and Countryside Act 1981 (as amended);
  - Natural Environment and Rural Communities (NERC) Act 2006; and
  - Conservation of Habitats and Species Regulations 2010 (as amended).
- 1.5.3 The key policies which influence the ecology and nature conservation assessments are the:
- National Planning Policy Framework (NPPF);
  - Biodiversity 2020: A strategy for England's wildlife and ecosystem services (Defra 2012);
  - UK Biodiversity Action Plan (UKBAP); and
  - Merseyside Biodiversity Action Plan (LBAP).
- 1.5.4 Further details on legislation and policies can be found in appendix four.

## **2.0 METHODOLOGY**

### **2.1 Desk Study**

- 2.1.1 A standard desk study was carried out to identify designated nature conservation sites and existing records for protected species on the site and its surrounding area (up to 1km from the site). This data was obtained from Merseyside Biobank Local Records Centre (LRC) and is presented in appendix five.
- 2.1.2 A search for relevant nature conservation information was made using the Multi-Agency Geographic Information for the Countryside (MAGIC) ([www.magic.gov.uk](http://www.magic.gov.uk)). Aerial images and maps were also searched to identify ponds and connecting habitat.
- 2.1.3 Liverpool Council's Unitary Development Plan 2002 was also searched with regard to the site.

### **2.2 Field Survey**

- 2.2.1 An Extended Phase 1 Habitat Survey was carried out at the site, using the method of ecological assessment outlined in the JNCC Handbook for Phase 1 Habitat Survey a technique for environmental audit (2010). This method maps and describes the habitats that are present on site. The presence or potential presence of protected species was also noted during the survey.
- 2.2.2 The assessment was made from ground level, using a powerful torch, binoculars and camera to aid visibility and to highlight areas where appropriate.
- 2.2.3 The survey was carried out during daylight hours.
- 2.2.4 The weather at the time of survey was dry; with a temperature of 14°C; a light breeze and 30% cloud cover.

- 2.2.5 Dominant plant species were noted, as were any protected, uncommon and invasive species. Botanical nomenclature in this report follows Stace (2010) and a species list from the site is located in appendix five.
- 2.2.6 It must be noted that the survey only provides for positive identification of species or habitats.
- 2.2.7 The trees on site were searched for features that showed bat roost potential. Such features would include cavities, cracks, loose bark, epicormic growth or dense creepers (e.g. ivy).

## **2.3 Inspection of Buildings for Bats**

### External Inspection:

- 2.3.1 The buildings were assessed from ground level, using a high powered torch and binoculars to aid visibility and to highlight areas.
- 2.3.2 The search included horizontal surfaces, roof area and walls of the building. Particular attention was given to potential access points around the roof line of the building.

### Internal Inspection:

- 2.3.3 The inspection was carried out using appropriate Personal Protective Equipment (PPE) and high power torches.
- 2.3.4 The building was searched for potential to support roosting bats. Cavity walls and loose fitting exterior boards around the roof area may provide potential roost value.
- 2.3.5 The building was searched for signs of bat habitation, including:
- Direct observation of bats
  - Droppings
  - Bat carcasses
  - Feeding remains
  - Scratch marks and staining around potential entrances to roosts
  - Audible squeaking
  - Smell
- 2.3.6 The internal inspection was concentrated on the loft space in the building. The building had a cellar, however, there were no potential access points for bats into this area of the building hence the survey did not search the internal area of the cellar.
- 2.3.7 The context of the building was also assessed to determine if it was well connected via trees, hedgerows, water bodies, commuting routes and feeding areas in the surrounding landscape.

2.3.8 The methodology for the survey and assessment followed guidelines from the Bat Conservation Trust's Bat Survey Good Practice Guidelines 2nd Edition (2012) and the Bat Workers' Manual (2004).

## 2.4 Assessment of Conservation Importance and Likely Impacts

2.4.1 The importance of the main ecological features was assessed for the study area such as designated sites, habitats or species.

2.4.2 The features were assigned an ecological value of negligible, low, moderate, high or confirmed (table 1).

Confirmed	Species confirmed on site Evidence of species' activity
High	Strong linear features providing commuting opportunities for species e.g. hedgerow Buildings, trees or other structures of significance for use by protected species. Site is located near known records of protected species High quality foraging habitat
Moderate	Intermittent linear features providing commuting opportunities for species e.g. defunct hedge Buildings, trees or structures with some habitat opportunities for protected species Habitat has some foraging potential
Low	Few significant habitat opportunities Isolated site with no habitat connectivity
Negligible	No suitable habitats observed

Table 1: Potential ecological value definitions

## 3.0 DESK STUDY RESULTS

### 3.1 Nature Conservation Sites

3.1.1 The desk study revealed that no statutorily protected biodiversity sites exist within 1km of the survey area at the time of survey (MAGIC, 2014).

3.1.2 2 current, 2 proposed and 1 potential Local Wildlife Sites (LWS) were highlighted by the search:

- Loopline (current) 800m SW;
- Nursery, S. Liverpool Sewage Works Site (current) 800m S;
- South Liverpool Nursery (proposed) 800m SW;
- Loop Line Liverpool Local Wildlife Site (proposed) 800m S;
- Lee Park Golf Course Liverpool Local Wildlife Site (potential) 100m SE and fragmented by a busy kerbed road.



## 3.2 BAP Priority Habitats

3.2.1 The following Biodiversity Action Plan Priority Habitats were recorded in the search area:

- Deciduous woodland 100m SE and fragmented by a busy kerbed road.

## 3.1 Protected and Notable Species

Data for protected species records from the LRC within the search area is shown in table 2 below. Records are referenced from the SW corner of grids hence some nearest records may be greater than the search buffer.

Group	Common Name	Scientific Name	Records	Dates	Nearest Record	Designations
Amphibian	Common Frog	<i>Rana temporaria</i>	4	2009	925m NE	WCA5
	Great Crested Newt	<i>Triturus cristatus</i>	27	2007	761m S	ECH2, LBAP, NERC, UKBAP, WCA5
	Smooth Newt	<i>Lissotriton vulgaris</i>	17	2007	761m S	WCA5
Flowering Plant	Bluebell	<i>Hyacinthoides non-scripta</i>	3	1995-2009	878m NE	WCA8
Terrestrial Mammal	Common Pipistrelle	<i>Pipistrellus pipistrellus</i>	1	2008	904m N	ECH4, LBAP, UKBAP, WCA5
	European Water Vole	<i>Arvicola amphibious</i>	1	2007	716m SE	LBAP, NERC, UKBAP, WCA5, WCA6
	Pipistrelle Bat species	<i>Pipistrellus</i>	9	1989-2007	634m SE	ECH4, LBAP, UKBAP, WCA5

**Table 2: Key species records within the search area.**

**Key:**

- ECH2: Annex II of the European Communities Council Directive on the Conservation of Natural Habitats and Wild Fauna and Flora. Animal and plant species of community interest whose conservation requires the designation of Special Areas of Conservation.
- ECH4: Annex IV of the European Communities Council Directive on the Conservation of Natural Habitats and Wild Fauna and Flora. Animal and plant species of community interest in need of strict protection.
- LBAP: Local Biodiversity Action Plan species.
- NERC: Natural Environment and Rural Communities Act 2006, Section 41/42: Habitats and Species of Principle Importance in England.
- UKBAP: UK Biodiversity Action Plan species.
- WCA5: Schedule 5 of Wildlife and Countryside Act 1981 (as amended). Protected animals (other than birds).
- WCA6: Schedule 6 of Wildlife and Countryside Act 1981 (as amended). Animals which may not be killed or taken by certain methods.

3.1.1 Other notable species recorded in the search area are located in appendix seven.



### 3.2 Aerial Imagery

3.2.1 The aerial image below demonstrates the sites setting in the wider landscape (figure 1).



Figure 1: Aerial image of wider landscape surrounding the site (Google 2015).

### 3.3 Maps

- 3.3.1 One pond was identified within the 500m buffer on the Ordnance Survey map below (figure 2). This pond was separated from the site by a kerbed busy road.



Figure 2: 500m buffer of the site (MAGIC, 2015)

### 3.4 Invasive Species

Canadian Waterweed, Japanese Knotweed, Montbretia, New Zealand Pigmyweed, Rhododendron and Eastern Grey Squirrel were highlighted on the data search.

### 3.5 Planning Policy

- 3.5.1 The site is located within Primary Residential Area, policy H4, according to the Proposals Map of Liverpool Council's Unitary Development Plan 2002.

## **4.0 EXTENDED PHASE 1 HABITAT SURVEY**

### **4.1 Introduction**

- 4.1.1 The results of the survey are presented below. An Extended Phase 1 Habitat Survey Plan is located in appendix one. Notable features were detailed using target notes. The weather conditions at the time of survey are given in table 3 below.

### **4.2 Survey Constraints**

- 4.2.1 Various species of flora may not be present at all times throughout the year; therefore it must not be assumed that a full list of species has been provided.
- 4.2.2 Building 2, 3 and the annex of building 4 were not assessed internally as access was not available. It is considered that this did not restrict the findings of the survey as it was considered that building 2 had negligible potential for roosting bats and further survey is recommended for building 3 and 4.
- 4.2.3 The survey was carried out outside of the main activity period for bats therefore bat droppings are less likely to be evident due to weathering over the winter months. However, a full assessment regarding bat roost potential was implemented.

### **4.3 Habitats**

- 4.3.1 The following habitats were recorded on site during the survey:

- Dense scrub;
- Scattered trees;
- Poor semi-improved grassland;
- Tall ruderal;
- Standing open water;
- Spoil;
- Building;
- Bare ground;
- Hard-standing.

These habitats are described below.

- 4.3.2 A2.1 Dense scrub:

A large proportion of the open area at the rear of the property was covered with dense bramble (photograph 1). A path had previously been cleared in order to facilitate this and other survey work. Blackbird, Blue tit and Robin were noted repeatedly entering the scrub (TN4). A line of Elderberry and Privet were located along the western boundary (photograph 2).

- 4.3.3 A3.1 Broad-leaved scattered trees:

The scattered tree cover on site consisted of individual and groups mature trees.

A mature Lombardy Poplar (photographs 3 & 4, TN5) was located along the west boundary of the site and was covered with ivy. Mallet sounding indicated that the stem was hollow. The ivy presented potential roosting habitat for bats. Any further roosting features on the stem could not be observed due to the dense ivy coverage. An old birds nest was noted in the ivy (photograph 5).

A significant feature of the site was a linear group of lime sp. trees located along the southern boundary of the site (photograph 6, TN6). Several of the trees were ivy covered however due to the presence of more favourable roosting features on the site, the ivy was considered to provide negligible to low value roosting habitat. A small amount of deadwood was present in the trees but there were no sheets of dead bark or cavities suitable for roosting bats.

A Pendunculate Oak was located to the south-east of the site (photographs 7 & 8, TN17) with a shallow cavity from a previous branch failure. The feature was not deep enough to be suitable for roosting bats.

4.3.4 B6 Poor semi-improved grassland:

This habitat had developed in the previous formal garden surrounding the pond that had previously been intensely managed with regular mowing (photograph 6). Perennial ryegrass was dominant with occasional Yorkshire fog and Daisy appearing rarely in the sward.

4.3.5 C3.1 Tall ruderal:

Stinging nettle was dominant in areas of previous bare ground beneath the canopy of a small group of trees that had subsequently been removed.

4.3.6 G1 Standing open water:

A small pond was located to the rear of the main building (photograph 9, TN1). The pond had been drained resulting in a shallow pool of water only approximately 50mm in depth. The pond was a hard landscaped feature as it was situated within a raised wall and the base was constructed from concrete. No vegetation was present. The feature would provide negligible potential habitat for amphibians due to restricted access by the wall. Ponds are listed as BAP habitat (UKBAP), however this feature does not fall within the definition of 'Pond' priority habitat as specified within the UK Biodiversity Action Plan (UKBAP) and therefore not considered to be a notable consideration on the site.

4.3.7 I2.2 Spoil:

A combination of spoil and rubble that appear to have been recently added to the site were present near to the pond and within the walled area of the site (photograph 10, TN18). Rubble can provide habitat for reptiles but due to the fragmented nature of the site and the lack of any records it is considered highly unlikely that reptiles will be present on the site.

4.3.8 J3.6 Building:



Four buildings were present on the site. The locations of the buildings are illustrated on the plan in appendix 1 and are described below:

**Building 1 (TN2)**

An open fronted timber built shelter with a felt mono-pitched roof measuring approximately 10m by 5m (photograph 11). There was no evidence of bat use within the building such as scratch marks on roofing timbers or droppings.

**Building 2 (TN3)**

A modern brick built building with a flat roof lined with bitumen (photograph 12). The building was in use as a betting shop at the time of survey. The barge boards and other fixtures around the roof line were close fitting and offered negligible potential for bats (photograph 13). The building was not searched due to access restrictions. This is not considered to be a significant constraint due to the lack of any access points for bats.

**Building 3**

A brick built garage building with a tiled roof. Loose and hanging tiles presented numerous roosting opportunities for bats (photographs 14 & 15, TN7). A birds nest was also noted under the eaves at TN8 (photograph 16). The building was not inspected internally as access was not available at the time of survey.

**Building 4**

A large modern brick built public house with a timber framed roof structure, extensive loft void and covered with tiles (photographs 17-27). The building presented numerous features that would provide potential roosting habitat for bats. The locations of these features were target noted and presented on the site plan in appendix two. There was no access to the roof void of the annex at the west of the building.

External Survey

The roof and gutter area were inspected for bat roost potential. Negligible potential was recorded around the gutter areas as the tops of the walls were well fitting to the eaves with no potential access points recorded.

A cellar access was recorded to the west of the building (photographs 22 & 23, TN12). The doors were well sealed, again with no potential access points for bats. The only other access to the cellar was internal.

External features that presented roosting opportunities for bats are as follows:

- TN9- gap created by a missing tile (photograph 18);
- TN11- potential access to a small roof void through gaps in a vent (photograph 21);
- TN 13- gap between drain pipe and soffits allowing access to void (photograph 24);
- TN14- gaps under hanging tiles (photograph 25);
- TN15- gap created by a missing tile (photograph 17);
- TN 10 & TN16- ventilation slot to loft void in gable (photograph 18 & 27).

### Internal Survey

The loft space was approximately 2.75m in height and under-felt was present beneath the roofing tiles (photograph 28). The roof void was separated by brick walls and access between the sections was via small openings linking the roof spaces.

The roofing timbers were inspected and no scratch marks were recorded. Extensive cobwebs covered the timber joints around the apex of the voids.

The wings of Peacock butterfly were evident (photograph 29) near to a ventilation slot at TN10. The feeding remains are indicative of Brown Long-eared Bat. An old bat dropping characteristic of the same bat species was located adjacent to the feeding remains.

Rat droppings were also recorded in the loft space (photograph 31).

#### 4.3.9 J4 Bare ground:

Area that appeared to previously contain shrubs were covered with woodchip (photograph 32). These areas were devoid of vegetation.

#### 4.3.10 J5 Hard-standing:

The extensive concrete and tarmac parking areas on the site were also devoid of vegetation (photograph 32).

## **4.4 Species**

### **Amphibian**

#### 4.4.1 Great crested newt:

No species were recorded during the survey and there was no suitable aquatic or terrestrial foraging habitat on site.

### **Bird**

4.4.2 No Birds of Conservation Concern or bird species protected under Schedule 1 of the Wildlife and Countryside Act were observed during the survey, however suitable nesting bird habitat occurred in the dense scrub, ivy on the Lombardy Poplar (TN5) and under the eaves of Building 3 (TN8).

4.4.3 Blackbird, Blue Tit and Robin were noted as active within the dense scrub on site.

### **Flowering Plant**

4.4.4 No notable/protected species were recorded on site.

## **Reptile**

- 4.4.5 No species were recorded during the survey; however as noted in 4.3.7, a combination of spoil and rubble was located at TN18 that appeared to have been recently added to the site were present near to the pond and within the walled area of the site (photograph 10). Rubble can provide habitat for reptiles but due to the fragmented nature of the site and the lack of any records it is considered highly unlikely that reptiles will be present on the site

## **Terrestrial Mammal**

- 4.4.6 Bat:  
Buildings 3 had high potential to support roosting bats and bat use was confirmed in building 4 due to the number of features highlighted in 4.3.8.
- The Lombardy Poplar had moderate potential to support roosting bats in the extensive ivy and in any potential cavities in the stem beneath the ivy.
- 4.4.7 Water Vole:  
There was no suitable habitat on site for this species.

## **4.5 Invasive Plant Species**

- 4.5.1 No invasive plant species were recorded during the survey.

## **4.6 Other Protected and Notable Species**

- 4.6.1 There was no potential for any other protected or notable species.

## **5.0 DISCUSSIONS AND CONCLUSIONS**

### **5.1 Nature Conservation Sites**

- 5.1.1 It is considered that any works at the site would not impact the Local Wildlife Sites highlighted in the desk study, the nearest site was Lee Park Golf Club, part of which was approximately 100 metres to the south-east.

### **5.2 BAP Priority Habitats**

- 5.2.1 No Biodiversity Action Plan habitats existed on site and it is considered that any development works would not affect BAP habitat highlighted in the desk study.



### 5.3 Habitats

5.3.1 Table 3 below provides a summary of any habitats that may be impacted and whether they are considered to be a notable consideration on this site and therefore require further action on this site.

Habitat	NERC priority habitat?	Likely to be impacted?	Potential level of impact	Notable consideration on site?
Dense scrub	No	Yes	High	Yes
Scattered trees	No	Maybe	Moderate	Yes
Poor semi-improved grassland	No	Yes	Negligible	No
Tall ruderal	No	Yes	Negligible	No
Standing open water	No	Yes	Negligible	No
Building 1	No	Yes	Negligible	No
Building 2	No	Yes	Negligible	No
Building 3	No	Yes	High	Yes
Building 4	No	Yes	High	Yes
Bare ground	No	Yes	Negligible	No
Hard-standing	No	Yes	Negligible	No

**Table 3: An assessment of impacts on habitat/s of notable consideration.**

5.3.2 Dense scrub and scattered trees:

These habitats had the potential to support nesting birds. Where vegetation is scheduled for removal, recommendations are given below. The Lombardy Poplar (TN5) also had moderate potential to support roosting bats.

5.3.3 Building 3 & 4:

At the time of survey the buildings were considered to have a high potential to support roosting bats. Recommendations are given below regarding bats. A birds nest was also present on Building 3.

## 5.4 Species

5.4.1 Table 4 below provides a summary of notable/protected species identified within the desk study, on site, and potential presence due to suitable habitat recorded on site.

Species or Group		Highlighted in data search?	Key habitat	Likely to be impacted?	Level of impact	Notable consideration on site?
Amphibian		Yes	None present on site	No	Negligible	No
Bird		No	Dense scrub, and scattered trees	Yes	High	Yes
Flowering plant		Yes	None present on site	No	Negligible	No
Reptile		No	None present on site	No	Negligible	No
Terrestrial mammals	Bats	Yes	Building 3 & 4 and scattered tree	Yes	High	Yes
	Water Vole	Yes	None present on site	No	Negligible	No

**Table 4: A summary of impacts on notable/protected species.**

### 5.4.2 Birds:

As stated in 5.3.2 and 5.3.3, some habitats on site had potential to support nesting birds.

### 5.4.3 Bats:

As noted above in paragraph 5.3.2 and 5.3.3, building 3 & 4 and the Lombardy Poplar had potential to support roosting bats. All bat species are European Protected Species (EPS) and are a material consideration in the planning process and under the Conservation of Habitats and Species Regulations 2010: planning consent cannot be given until all surveys have been completed and the data may inform potential mitigation and the planning decision. Bats are therefore a notable consideration at the site.

## 5.5 Non Native/ Invasive Species

5.5.1 No recommendations are made regarding invasive species.

## 6.0 RECOMMENDATIONS

### 6.1.1 Bats:

Further emergence/re-entry surveys are recommended in the active season between May and September to assess if bats are using any of the features for roosting with the following level of survey:

- Buildings 3 & 4- three surveys including two dusk or dawn survey and one dusk and dawn survey;
- Lombardy Poplar- two surveys including one dusk or dawn survey and one dusk and dawn survey.

If bat use is confirmed, an EPS development licence may be required.

Any tree loss due to re-development will be minimal and it is considered that any impact to foraging habitat for bats will be negligible. Foraging habitat is likely to be enhanced with the implementation of a future landscaping scheme.

### 6.1.2 Birds:

Any vegetation clearance must take place outside the period from March to September. Should this not be possible, any vegetation to be removed must be checked for nesting birds by an experienced ecologist immediately prior to the commencement of any works. If nesting birds are found, work must be delayed until the young have fledged.

### 6.1.3 Trees:

It is recommended that trees proposed to be retained are protected with appropriate fencing in line with *BS5837 Trees in relation to construction- Recommendations (BS5837 2012)*.

### 6.1.4 Other species:

No further surveys are recommended.

## 7.0 ENHANCEMENTS

7.1.1 It is required under the National Planning Policy Framework that development promotes enhancements of the biodiversity and habitat. Appropriate habitat enhancements are suggested below in table 5.

Habitat/ Species	Potential Enhancements
Habitats	Native specimen tree planting. Wild flower areas around existing mature trees.
Bird	Nest boxes may be incorporated into any retained scattered trees. Nest boxes may be incorporated into any new building.
Bat	Bat boxes may be incorporated into any retained scattered trees. Bat boxes may be incorporated into any new building.

**Table 5: Potential enhancements for the development.**

## 8.0 REFERENCES

**BCT** (2012) *Bat Surveys, Good Practice Guidelines (2<sup>nd</sup> Edition)*. Bat Conservation Trust, London

**BS5837** (2012) *Trees in relation to construction-Recommendations* British Standards Institute, London

**English Nature** (2001) *Great Crested Newt Mitigation Guidelines* English Nature. Peterborough

**Google** <http://maps.google.co.uk> (Site accessed 22 April 2015)

**Joint Nature Conservation Council** (2010) *Handbook for Phase 1 Habitat Survey – a Technique for Environmental Audit* JNCC Publications, Peterborough

**Multi-Agency Geographic Information for the Countryside** [www.magic.defra.gov.uk](http://www.magic.defra.gov.uk) (Site accessed 22 April 2015)

**Stace C.A.** (2010) *New Flora of the British Isles, 3<sup>rd</sup> Edition* Cambridge University Press

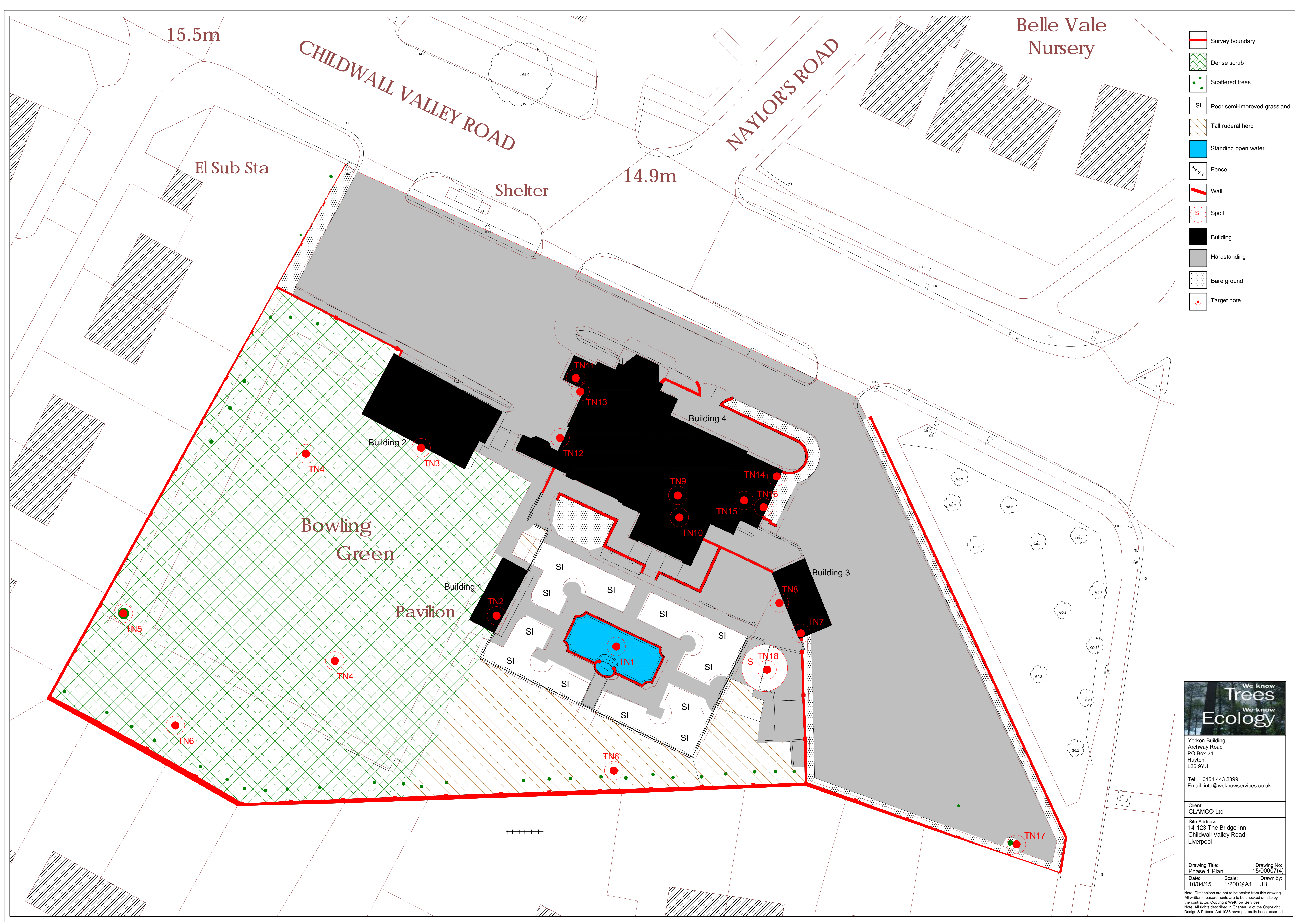
**The Conservation (Natural Habitats &c) Regulations 2010 (as amended)** S.I. 2716. HMSO London

**The Wildlife and Countryside Act 1981 (as amended)**. HMSO, London

**UK Biodiversity Action Plan** [www.ukbap.org.uk](http://www.ukbap.org.uk) (Site accessed 22 April 2015)

## **Appendix One- Extended Phase 1 Habitat Survey Plan**





- Survey boundary
- Dense scrub
- Scattered trees
- SI Poor semi-improved grassland
- Tall ruderal herb
- Standing open water
- Fence
- Wall
- Spoil
- Building
- Hardstanding
- Bare ground
- Target note



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Client:  
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Childwall Valley Road  
Liverpool

Drawing Title: Phase 1 Plan	Drawing No: 15/00007(4)
Date: 10/04/15	Scale: 1:200 @ A1
Drawn by: JB	

Note: Dimensions are not to be scaled from this drawing.  
All written measurements are to be checked on site by the contractor. Copyright Weknow Services.  
Note: All rights described in Chapter IV of the Copyright Design & Patents Act 1988 have generally been asserted.



## **Appendix Two- Phase 1 Habitat Survey Target Notes**



<b>TN</b>	<b>Target Note Description</b>	<b>Protected and Notable Species</b>	<b>Photographs</b>
TN1	Pond	N/A	9
TN2	Building 1	N/A	11
TN3	Building 2	N/A	12 & 13
TN4	Dense scrub	Nesting birds	1 & 2
TN5	Ivy on Lombardy Poplar	Nesting birds & roosting bats	3 & 4
TN6	Scattered trees	N/A	6
TN7	Hanging tiles on Building 3	Roosting bats	14 & 15
TN8	Nest	Nesting birds	16
TN9	Missing tile	Roosting bats	18
TN10	Ventilation slot to loft void in gable	Roosting bats	18
TN11	Vents in annex	Roosting bats	21
TN12	Cellar hatch	N/A	22 & 23
TN13	Gap between drain pipe and soffits allowing access to void	Roosting bats	24
TN14	Gaps under hanging tiles	Roosting bats	25
TN15	Missing tile	Roosting bats	17
TN16	Ventilation slot to loft void in gable	Roosting bats	27
TN17	Wound on tree	N/A	7 & 8
TN18	Spoil/rubble pile	N/A	32

## **Appendix Three- Site Photographs**



Photograph 1



Photograph 2



**Photograph 3**



**Photograph 4**





Photograph 5



Photograph 6



Photograph 7



Photograph 8





**Photograph 9**



**Photograph 10**





Photograph 11



Photograph 12



Photograph 13



Photograph 14





Photograph 15



Photograph 16



Photograph 17



Photograph 18





Photograph 19



Photograph 20



Photograph 21



Photograph 22





Photograph 23



Photograph 24





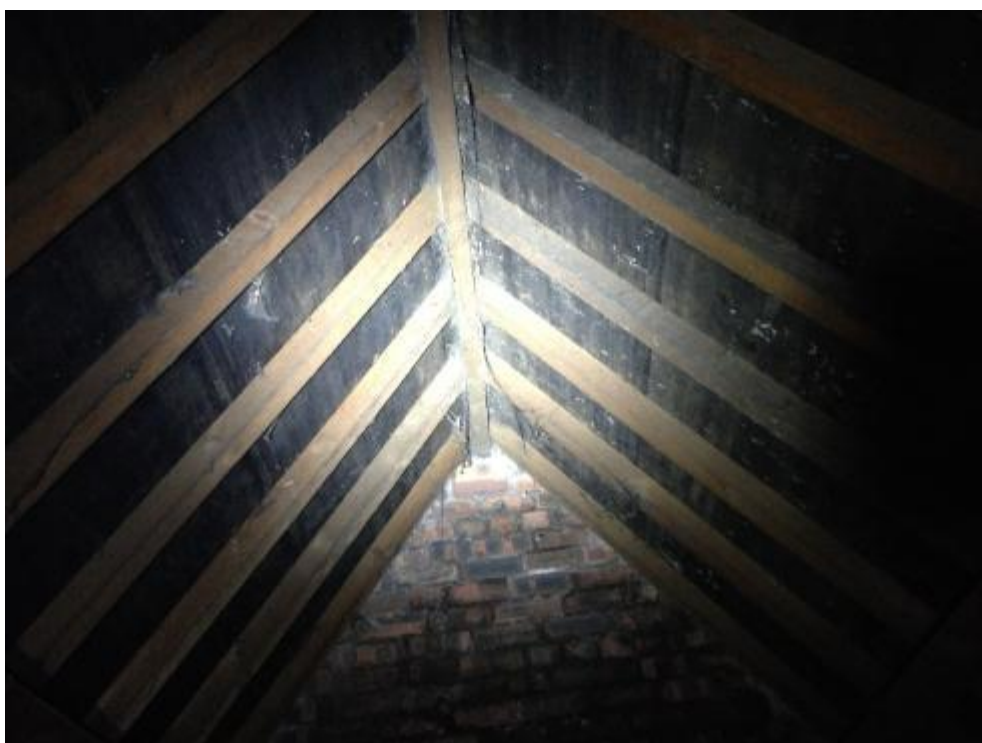
Photograph 25



Photograph 26



Photograph 27



Photograph 28





Photograph 29



Photograph 30



Photograph 31



Photograph 32

## **Appendix Four- Biodiversity Legislation and Policy**

## **GENERAL LEGISLATION AND POLICY**

The framework of legislation and policy which underpins nature conservation in England. This is a material consideration in the planning process in England.

Conservation of Habitats and Species Regulations 2010 (Habitats Regulations 2010 as amended)

The Habitats Regulations 2010 consolidate and update the Conservation Regulations 1994 and all its various amendments. The Habitats Regulations 2010 are the principal means by which the EEC Council Directive 92/43 (The Habitats Directive) as amended is transposed into English and Welsh law.

The Habitats Regulations 2010 place duty upon the relevant authority of government to identify sites which are of importance to the habitats and species listed in Annexes I and II of the Habitats Directive. Those sites which meet the criteria are, in conjunction with the European Commission, designated as Sites of Community Importance, which are subsequently identified as Special Areas of Conservation (SAC) by the European Union member states. The regulations also place a duty upon the government to maintain a register of European protected sites designated as a result of EC Directive 79/409/EEC on the Conservation of Wild Birds (The Birds Directive). These sites are termed Special Protection Areas (SPA) and, in conjunction with SACs, form a network of sites known as Natura 2000. The Habitats Directive introduces for the first time for protected areas, the precautionary principle; that is that projects can only be permitted having ascertained no adverse effect on the integrity of the site. Projects may still be permitted if there are no alternatives, and there are imperative reasons of overriding public interest.

The Habitats Regulations 2010 also provide for the protection of individual species of fauna and flora of European conservation concern listed in Schedules 2 and 5 respectively. Schedule 2 includes species such as otter and great crested newt for which the UK population represents a significant proportion of the total European population. It is an offence to deliberately kill, injure, disturb or trade these species. Schedule 5 plant species are protected from unlawful destruction, uprooting or trade under the regulations.

### **The Wildlife and Countryside Act (WCA) 1981 (As amended)**

The WCA, as amended, consolidates and amends pre-existing national wildlife legislation in order to implement the Bern Convention and the Birds Directive. It complements the Conservation (Natural Habitats. & c.) Regulations 1994 (as amended), offering protection to a wider range of species. The Act also provides for the designation and protection of



national conservation sites of value for their floral, faunal or geological features, termed Sites of Special Scientific Interest (SSSIs).

Schedules of the act provide lists of protected species, both flora and fauna, and detail the possible offences that apply to these species. All relevant species specific legislation is detailed later in this Appendix.

### **The Countryside and Rights of Way (CRoW) Act 2000**

The CROW Act, introduced in England and Wales in 2000, amends and strengthens existing wildlife legislation detailed in the WCA. It places a duty on government departments and the National Assembly for Wales to have regard for biodiversity, and provides increased powers for the protection and maintenance of SSSIs.

The Act also contains lists of habitats and species (Section 74) for which conservation measures should be promoted, in accordance with the recommendations of the Convention on Biological Diversity (Rio Earth Summit) 1992.

### **The Natural Environment and Rural Communities (NERC) Act 2006**

Section 40 of the NERC Act places a duty upon all local authorities and public bodies in England and Wales to promote and enhance biodiversity in all of their functions. Sections 41 (England) and 42 (Wales) list habitats and species of principal importance to the conservation of biodiversity. These lists supersede Section 74 of the CRoW Act 2000. These species and habitats are a material consideration in the planning process.

### **The Hedgerow Regulations 1997**

The Hedgerow Regulations make provision for the identification of important hedgerows which may not be removed without permission from the Local Planning Authority.

### **UK Biodiversity Action Plan**

The United Kingdom Biodiversity Action Plan (UKBAP), first published in 1994 and updated in 2007, is a government initiative designed to implement the requirements of the Convention of Biological Diversity to conserve and enhance species and habitats. The UKBAP contains a list of priority habitats and species of conservation concern in the UK, and outlines biodiversity initiatives designed to enhance their conservation status. Lists and Broad and Local habitats are also included. The priority habitats and species correlate with those listed on Section 41 and 42 of the NERC Act.

The UKBAP requires that conservation of biodiversity is addressed at a County level through the production of Local BAPs. These are

complementary to the UKBAP, however are targeted towards species of conservation concern characteristic of each area. In addition, a number of local authorities and large organisations have produced their own BAPs.

UKBAP and Local BAP targets with regard to species and habitats are a material consideration in the planning process.

### **Planning Policy (England) and National Planning Policy Framework**

In early 2012, the National Planning Policy Framework (NPPF) replaced much previous planning policy guidance, including Planning Policy Statement 9: Biological and Geological Conservation. The government circular 06/05: Biodiversity and Geological Conservation - Statutory Obligations and Their Impact within the Planning System, which accompanied PPS9, still remains valid. A presumption towards sustainable development is at the heart of the NPPF. This presumption does not apply however where developments require appropriate assessment under the Birds or Habitats Directives.

Chapter 11, on conserving and enhancing the natural environment, sets out how the planning system should contribute to and enhance the natural and local environment by minimising impacts on biodiversity and, where possible, provide net gains in biodiversity. Opportunities to incorporate biodiversity gains into a development should be encouraged.

If a proposed development would result in significant harm to the natural environment which cannot be avoided (through the use of an alternative site with less harmful impacts), mitigated or compensated for (as a last resort) then planning permission should be refused.

## SPECIES SPECIFIC LEGISLATION

This section contains a summary of legislation with relation to the species present or potentially present in the survey area. The reader should refer to the original legislation for definitive interpretation.

### Bats

Bats and the places they use for shelter or protection (i.e. roosts) receive European protection under The Conservation of Habitats and Species Regulations 2010 (Habitats Regulations 2010 as amended). They receive further legal protection under the Wildlife and Countryside Act (WCA) 1981, as amended. This protection means that bats, and the places they use for shelter or protection, are capable of being a material consideration in the planning process.

Regulation 41 of the Habitats Regulations 2010, states that a person commits an offence if they:

- deliberately capture, injure or kill a bat;
- deliberately disturb bats; or
- damage or destroy a bat roost (breeding site or resting place).

Disturbance of animals includes in particular any disturbance which is likely to impair their ability to survive, to breed or reproduce, or to rear or nurture their young, or in the case of animals of a hibernating or migratory species, to hibernate or migrate; or to affect significantly the local distribution or abundance of the species to which they belong.

It is an offence under the Habitats Regulations 2010 for any person to have in his possession or control, to transport, to sell or exchange or to offer for sale, any live or dead bats, part of a bat or anything derived from bats, which has been unlawfully taken from the wild.

Whilst broadly similar to the above legislation, the WCA 1981 (as amended) differs in the following ways:

- Section 9(1) of the WCA makes it an offence to *intentionally* (rather than deliberately) kill, injure or take any protected species.
- Section 9(4) (a) of the WCA makes it an offence to *intentionally or recklessly\** damage or destroy, *or obstruct access to*, any structure or place which a protected species uses for shelter or protection.
- Section 9(4) (b) of the WCA makes it an offence to intentionally or recklessly\* disturb any protected species while it is occupying a structure or place which it uses for shelter or protection.

\*Reckless offences were added by the Countryside and Rights of Way (CROW) Act 2000.

As bats re-use the same roosts (breeding site or resting place) after periods of vacancy, legal opinion is that roosts are protected whether or not bats are present.

The following bat species are listed on the UK BAP and Section 41 of the NERC Act 2006: Barbastelle Bat *Barbastella barbastellus*, Bechstein's Bat *Myotis bechsteini*, Noctule Bat *Nyctalus noctula*, Soprano Pipistrelle *Pipistrellus pygmaeus*, Brown Long-eared Bat *Plecotus auritus*, Greater Horseshoe Bat *Rhinolophus ferrumequinum* and Lesser Horseshoe Bat *Rhinolophus hipposideros*.

The reader should refer to the original legislation for the definitive interpretation.

### **Bluebell**

Bluebell receives limited protection under Schedule 8 of the Wildlife and Countryside Act (1981) as amended against sale only.

### **Common Amphibians**

Common frogs, common toad, smooth newt and palmate newt are protected in Britain under Schedule 5 of the Wildlife and Countryside Act (1981, as amended) with respect to sale only. They are also listed under Annex III of the Bern Convention 1979. This protects these species from 'exploitation (indiscriminate mass killing, trading and any means capable of causing local disappearance or serious disturbance)' and requires the species and their habitats be managed to keep them out of danger (Betts 2002).

Common toad is listed as a priority species on the UK Biodiversity Action Plan (BAP) and Section 41/42 of the Natural Environment and Rural Communities (NERC) Act 2006.

The reader should refer to the original legislation for the definitive interpretation.

### **Great Crested Newts**

GCN are listed as priority species on the UK Biodiversity Action Plan (BAP) and Section 42 of the Natural Environment and Rural Communities (NERC) Act 2006. GCN are also priority species on the Merseyside Local BAP.

Great crested newts (GCN) and the places they use for shelter or protection receive European protection under The Conservation of Habitats and Species Regulations 2010 (Habitats Regulations 2010). They receive further legal protection under the Wildlife and Countryside Act (WCA) 1981, as amended. This protection means that GCN, and the places they use for shelter or protection, are capable of being a material consideration in the planning process.



Regulation 41 of the Habitats Regulations 2010, states that a person commits an offence if they:

- deliberately capture, injure or kill a GCN;
- deliberately disturb GCN;
- deliberately take or destroy eggs of a GCN; or
- damage or destroy a GCN breeding site or resting place.

Disturbance of animals includes in particular any disturbance which is likely to impair their ability to survive, to breed or reproduce, or to rear or nurture their young, or in the case of animals of a hibernating or migratory species, to hibernate or migrate; or to affect significantly the local distribution or abundance of the species to which they belong.

It is an offence under the Habitats Regulations 2010 for any person to have in his possession or control, to transport, to sell or exchange or to offer for sale, any live or dead GCN, part of a GCN or anything derived from GCN, which has been unlawfully taken from the wild. This legislation applies to all life stages of GCN. Whilst broadly similar to the above legislation, the WCA 1981 (as amended) differs in the following ways:

- Section 9(1) of the WCA makes it an offence to *intentionally* (rather than deliberately) kill, injure or take any protected species.
- Section 9(4) (a) of the WCA makes it an offence to *intentionally or recklessly\** damage or destroy, *or obstruct access to*, any structure or place which a protected species uses for shelter or protection.
- Section 9(4) (b) of the WCA makes it an offence to intentionally or recklessly\* disturb any protected species while it is occupying a structure or place which it uses for shelter or protection.

\*Reckless offences were added by the Countryside and Rights of Way (CRoW) Act 2000.

GCN are listed as priority species on the UK Biodiversity Action Plan (BAP) and Section 42 of the Natural Environment and Rural Communities (NERC) Act 2006.

The reader should refer to the original legislation for the definitive interpretation.

### **Nesting and Nest Building Birds**

Nesting and nest building birds are protected under the Wildlife and Countryside Act WCA 1981 (as amended). Some species (listed in Schedule 1 of the WCA) are protected by special penalties.

Subject to the provisions of the act, if any person intentionally:

- kills, injures or takes any wild bird;

- takes, damages or destroys the nest of any wild bird while that nest is in use or being built; or
- takes or destroys an egg of any wild bird,

he shall be guilty of an offence.

‘Reckless’ offences with regard to the disturbance of nesting wild birds included in Schedule 1 of the Wildlife and Countryside Act were added by the Countryside and Rights of Way Act 2000.

The Natural Environment and Rural Communities (NERC) Act 2006 places a duty on Government Departments to have regard for the conservation of biodiversity and maintains lists of species and habitats which are of principal importance for the purposes of conserving biodiversity in England and Wales. These lists include a number of bird species.

The reader is referred to the original legislation for the definitive interpretation.

### **Red Squirrel**

The red squirrel *Sciurus vulgaris* is listed on Appendix III of the Bern Convention (Convention on the Conservation of European Wildlife and Natural Habitats) which protects the listed species against exploitations (indiscriminate mass killing, trading and any means capable of causing local disappearance or serious disturbance to the species). This species is also protected by Schedules 5 and 6 of the Wildlife and Countryside Act, 1981. These Schedules provide protection for the red squirrel against:

- intentional killing, injuring or taking; possessing (including parts or derivatives);
- intentional or reckless damage, destruction or obstruction of any structure or place used for shelter or protection.

It is also an offence to sell, offer for sale, expose for sale or have for the purpose of sale, any red squirrel, or to infer that red squirrels can, or are intended to be bought or sold (“alive or dead, including parts or derivatives”).

In England and Wales, this Act has been amended by the Countryside and Rights of Way Act 2000 (CroW), which adds an extra offence, makes species offences arrestable, increases the time limits for some prosecutions and increases penalties. The Natural Environment and Rural Communities (NERC) Act 2006 places a duty on Government Departments to have regard for the conservation of biodiversity and maintains lists of species and habitats which are of principal importance for the purposes of conserving biodiversity. These lists include red squirrel.

Red squirrels are also protected under the Wild Mammals (Protection) Act 1996, which makes it illegal to subject them to any wilful act of cruelty or abuse such as mutilation, kicking, beating, nailing or otherwise impaling, stabbing, burning, stoning, crushing, drowning, dragging or asphyxiating.

## **Reptiles**

All of the UK's native reptiles are protected by law. The two rarest species – sand lizard (*Lacerta agilis*) and smooth snake (*Coronella austriaca*) – benefit from the greatest protection. Common lizard (*Lacerta vivipara*), slow-worm (*Anguis fragilis*), adder (*Vipera berus*) and grass snake (*Natrix natrix*) are protected under the Wildlife and Countryside Act 1981 as amended from intentional killing or injuring.

Sand lizard and smooth snake are protected under the Wildlife and Countryside Act 1981 (as amended) and The Conservation of Habitats and Species Regulations 2010 which together make it illegal to kill, injure, capture, handle or disturb these animals. Places they use for breeding, resting, shelter and protection are protected from being damaged or destroyed. It is also illegal to obstruct these animals from using such areas.

In England and Wales, this Act has been amended by the Countryside and Rights of Way Act 2000 (CroW), which adds an extra offence, makes species offences arrestable, increases the time limits for some prosecutions and increases penalties. The Natural Environment and Rural Communities (NERC) Act 2006 places a duty on Government Departments to have regard for the conservation of biodiversity and maintains lists of species and habitats which are of principal importance for the purposes of conserving biodiversity in England and Wales. All native reptile species are included on these lists. The reader is referred to the original legislation for the definitive interpretation.

## **Water Vole**

The Wildlife and Countryside Act 1981 (as amended) was updated on April 6th 2008 and the protection which water voles receive was increased to make it an offence to:

- Intentionally kill, injure or take water vole from the wild;
- Possess or control live or dead water voles or derivatives;
- Intentionally or recklessly damage, destroy or obstruct access to any structure or place which water voles use for shelter or protection;
- Intentionally or recklessly disturb water voles whilst occupying a structure or place used for that purpose; or
- Sell water voles or offer or offer or expose for sale or transport for sale.



In England and Wales, this Act has been amended by the Countryside and Rights of Way Act 2000 (CroW), which adds an extra offence, makes species offences arrestable, increases the time limits for some prosecutions and increases penalties. The Natural Environment and Rural Communities (NERC) Act 2006 places a duty on Government Departments to have regard for the conservation of biodiversity and maintains lists of species and habitats which are of principal importance for the purposes of conserving biodiversity in England and Wales. These lists include water vole.

## **Appendix Five- Biological Records**



# **Biodiversity Information Report 26/03/2015**

**MBB reference: 1410-WKS**

**Site: The Bridge Inn**

Your Ref: None supplied  
Your contact: Joe Barnes

MBB Ref: 1410-WKS  
MBB Contact: Ben Deed

Date: 26/03/2015

## Merseyside BioBank biodiversity information report

These are the results of your data request relating to an area at **The Bridge Inn** defined by a buffer of **1000 metres** around the centre of grid reference **SJ4352888413**.

You have been supplied with the following:

- records of **protected** taxa that intersect the search area
- records of **BAP** taxa that intersect the search area
- records of **Red Listed** taxa that intersect the search area
- records of other '**notable**' taxa that intersect the search area
- records of WCA schedule 9 taxa (including '**invasive plants**') that intersect the search area
- a map showing the location of monad and tetrad references that overlap the search area
- a list of all **designated sites** that intersect your search area
- citations, where available, for intersecting Local Wildlife Sites
- a list of **other sites of interest** (e.g. Ancient Woodlands) that intersect your search area
- a map showing such sites
- a list of all **BAP habitats** which intersect the search area
- a map showing BAP habitats
- a summary of the area for all available mapped **Phase 1 and/or NVC habitats** found within 500m of your site
- a map showing such habitats

Merseyside BioBank (MBB) is the Local Records Centre (LRC) for North Merseyside. We collect and collate biological and environmental information and make it available to people and organisations that have need to access such information in North Merseyside. We promote the North Merseyside Biodiversity Action Plan and wider participation in conservation through education, community involvement and by supporting the biological recording community of North Merseyside.

Merseyside BioBank is an information node of the National Biodiversity Network (NBN) and integrate records from our own databases with those of the NBN Gateway.

The handling charge for this data request is not a charge for the data themselves, but rather a partial charge for the staff time required to service the request. Our annual income from data requests is something less than 20% of our total running costs.

## Species records

The biological records held by Merseyside BioBank come from a variety of sources; from large organisations to individual amateur naturalists. Merseyside BioBank operates as managers or custodians of these records but the individuals and groups, who provide their records free of charge, retain copyright on their data. Without their contribution, we would not be able to provide the records included in this report. Their efforts, expertise and goodwill make a substantial contribution to the protection of North Merseyside's biodiversity.



**You may only use the records in this document subject to our access terms and conditions which can be found in Appendix 1. Non-adherence to these terms and conditions will be viewed as a breach of contract, which may result in legal redress being sought.**

This report also integrates records from the NBN Gateway. Some NBN data providers give us permission to download and integrate their records at a higher resolution than available through public access in order to contribute to the protection of North Merseyside's biodiversity.

Details of the biological records summarised in the following tables, and the sources from which they are derived, are included in appendix 2 of this report. Note that the date ranges in the summary tables (headed 'Dates') show the earliest and latest years for which records have been summarised for each taxon.

### **UK Protected Species**

'UK Protected species' are those taxa specifically identified by UK legislation including: Wildlife & Countryside Act 1981 (as amended); Protection of Badgers Act 1992; Conservation of Habitats and Species Regulations 2010. The latter regulations enact the European Union's (EU) Habitats Directive (92/43/EEC) in the UK and supercede The Conservation Regulations 1994. In our list of protected species, you may see designations that refer to schedules in the 1994 regulations, but these remain unchanged under the 2010 regulations.

Some protected species may not be legally disturbed unless you are in possession of an appropriate license. If you are in any doubt as to whether or not a license is required, you should contact Natural England.

The following tables detail the protected species that were recorded in the search area.

Group	Common Name	Scientific Name	Records	Dates	Designations
amphibian	Common Frog	<i>Rana temporaria</i>	4	2009	WCA5/9.5a,WCA5/9.5b
	Great Crested Newt	<i>Triturus cristatus</i>	27	2007	HabRegs2,WCA5/9.4b,WCA5/9.5a,WC A5/9.5b,WCA5/9.4c
	Smooth Newt	<i>Lissotriton vulgaris</i>	17	2007-2008	WCA5/9.5a,WCA5/9.5b
flowering plant	Bluebell	<i>Hyacinthoides non-scripta</i>	3	1995-2009	WCA8
terrestrial mammal	Common Pipistrelle	<i>Pipistrellus pipistrellus</i>	1	2008	HabRegs2,WCA5/9.4b,WCA5/9.5a,WC A5/9.5b,WCA5/9.4c
	European Water Vole	<i>Arvicola amphibius</i>	1	2007	WCA5/9.1k/l,WCA5/9.1t,WCA5/9.2,WC A5/9.4.a,WCA5/9.4b,WCA5/9.5a,WCA5 /9.5b,WCA5/9.4c
	Pipistrelle Bat species	<i>Pipistrellus</i>	9	1989-2007	HabRegs2,WCA5/9.4b,WCA5/9.5a,WC A5/9.5b,WCA5/9.4c

Desig. Code	Desig. Name	Designation Description
WCA5/9.5a	Wildlife and Countryside Act 1981 (Schedule 5 Section 9.5a)	Section 9.5 Animals which are protected from being sold, offered for sale or being held or transported for sale either live or dead, whole or part.
WCA5/9.5b	Wildlife and Countryside Act 1981 (Schedule 5 Section 9.5b)	Section 9.5 Animals which are protected from being published or advertised as being for sale.
HabRegs2	The Conservation (Natural Habitats, &c.) Regulations 2010 (Schedule 2)	Schedule 2- European protected species of animals.
WCA5/9.4b	Wildlife and Countryside Act 1981 (Schedule 5 Section 9.4b)	Section 9.4 Animals which are protected from intentional disturbance while occupying a structure or place used for shelter or protection.
WCA5/9.4c	Wildlife and Countryside Act 1981 (Schedule 5)	Animals which are protected from their access to any structure or place which they use for shelter or protection being obstructed.

WCA8	Wildlife and Countryside Act 1981 (Schedule 8)	Plants which are protected from intentional picking, uprooting or destruction (Section 13 1a); selling, offering for sale, possessing or transporting for the purpose of sale (live or dead, part or derivative) (Section 13 2a); advertising (any of these) for buying or selling (Section 13 2b).
WCA5/9.1k/l	Wildlife and Countryside Act 1981 (Schedule 5 Section 9.1 (killing/injuring))	Section 9.1. Animals which are protected from intentional killing or injuring.
WCA5/9.1t	Wildlife and Countryside Act 1981 (Schedule 5 Section 9.1 (taking))	Section 9.1 Animals which are protected from taking.
WCA5/9.2	Wildlife and Countryside Act 1981 (Schedule 5 Section 9.2)	Section 9.2 Animals which are protected from being possessed or controlled (live or dead).
WCA5/9.4.a	Wildlife and Countryside Act 1981 (Schedule 5 Section 9.4, subdivision a)	Section 9.4 subdivision a - Animals which are protected from intentional damage or destruction to any structure or place used for shelter or protection.

### **North Merseyside BAP Species**

The North Merseyside Biodiversity Action Plan (NM BAP) was published in September 2001 and last reviewed in 2008. Like other Local Biodiversity Action Plans (LBAPs) its purpose is to focus local conservation on national priority species and habitats. However, LBAPs also embrace the idea of 'local distinctiveness' and species which are not considered UK conservation priorities can be catered for by LBAPs if they are of particular local significance. Such is the case with the NM BAP which currently names 74 species of which 57 are not conservation priority species but are included because their conservation is considered to be a priority in North Merseyside.

The following tables detail the North Merseyside BAP species that were recorded in the search area.

Group	Common Name	Scientific Name	Records	Dates	Designations
amphibian	Great Crested Newt	<i>Triturus cristatus</i>	27	2007	LBAP
bird	Corn Bunting	<i>Emberiza calandra</i>	1	1999	LBAP
	Grey Partridge	<i>Perdix perdix</i>	6	1998-2002	LBAP
	House Martin	<i>Delichon urbicum</i>	4	1998-1999	LBAP
	House Sparrow	<i>Passer domesticus</i>	7	1998-2001	LBAP
	Lapwing	<i>Vanellus vanellus</i>	3	1998-2002	LBAP
	Skylark	<i>Alauda arvensis</i>	8	1998-2002	LBAP
	Song Thrush	<i>Turdus philomelos</i>	4	1998-1999	LBAP
	Starling	<i>Sturnus vulgaris</i>	4	1998-1999	LBAP
	Swift	<i>Apus apus</i>	4	1998-1999	LBAP
flowering plant	Bluebell	<i>Hyacinthoides non-scripta</i>	3	1995-2009	LBAP
insect - dragonfly (Odonata)	Blue-tailed Damselfly	<i>Ischnura elegans</i>	3	2007	LBAP
	Broad-bodied Chaser	<i>Libellula depressa</i>	4	2006-2011	LBAP
	Common Darter	<i>Sympetrum striolatum</i>	3	2007-2009	LBAP
	Emerald Damselfly	<i>Lestes sponsa</i>	2	1994	LBAP
	Emperor Dragonfly	<i>Anax imperator</i>	5	2006-2007	LBAP
	Southern Hawker	<i>Aeshna cyanea</i>	2	2005	LBAP
terrestrial mammal	Bats	<i>Chiroptera</i>	4	1989-2011	LBAP
	Brown Hare	<i>Lepus europaeus</i>	4	1998	LBAP
	Common Pipistrelle	<i>Pipistrellus pipistrellus</i>	1	2008	LBAP
	European Water Vole	<i>Arvicola amphibius</i>	1	2007	LBAP
	Pipistrelle Bat species	<i>Pipistrellus</i>	9	1989-2007	LBAP

Desig. Code	Desig. Name	Designation Description
LBAP	North Merseyside BAP	Species that are incorporated within the North Merseyside Biodiversity Action Plan. These species may or may not also be UK BAP species. Some species have their own action plans within the NM BAP, others are members of group species action plans.

**NM BAP species: Great Crested Newt (*Triturus cristatus*)**

Great Crested Newt is thought to have been in decline since the 1940s. Over a period of five years in the 1980s 2% of all UK colonies were lost, and although Britain remains a stronghold for this species, it is now considered to be dependant on conservation and is afforded international protection.

There is no current North Merseyside population estimate, though recent surveys suggest that in the general North West area around 25% of ponds have Great Crested Newts. A study of the parts of the Sefton Coast showed that a number of populations were present.

This species is highly dependant on the quality of ponds and also the habitat in the surrounding area (where they forage and hibernate away from the water). Habitat loss is the greatest cause of decline with many ponds being drained or drying up as a result of natural succession. Removal of scrub and woodland in addition to over-grazing and intensive management of surrounding grassland is also detrimental. Other factors which may affect population levels include predation by fish and waterfowl, habitat fragmentation and pollution.

**NM BAP species: Corn Bunting (*Emberiza calandra*)**

Nationally this species has significantly declined with a loss of 90% of the UK population between 1970 and 2005 and large contractions in the species range.

Locally Corn Bunting is thought to have undergone severe declines with only an estimated 200 pairs remaining in 1997-99. Corn Buntings are sparsely distributed across much of North Merseyside's arable farmland.

Declines are thought to be caused by changes in agricultural practices. Sowing cereals later in the year, increasing use of herbicide and the removal of fallow fields have all greatly reduced winter seed sources. Increasing use of pesticides has reduced the availability of invertebrate food sources. Earlier crop harvesting may also result in the destruction of some nests, especially where there are limited uncropped areas.

**NM BAP species: Grey Partridge (*Perdix perdix*)**

The UK population of Grey Partridge declined by 88% between 1970 and 2005 and though still widespread shows distinct variation according to agricultural practices. In North Merseyside there were an estimated 300 pairs in 1997-99 and they are present in all suitable habitat.

Loss of suitable habitat is the main cause of decline in this species, with changes in agricultural practices being particularly detrimental. The amalgamation of small fields into a larger ones and the removal of hedgerows, ditches and other field margins have destroyed potential nesting sites. Changes in sowing, harvesting and crop type have removed essential winter food sources.

**NM BAP species: Urban Birds (*Delichon urbicum*; *Passer domesticus*; *Sturnus vulgaris*; *Apus apus*)**

The four species covered by the NM BAP Urban Birds Species Action Plan (House Martin, Swift, House Sparrow and Starling) are considered to be in significant decline across the UK. In North Merseyside House Sparrows and Starlings currently breed in all urban areas, while House Martins are

restricted to areas nearer sources of mud for nest-building. Swifts occurred in only 55 tetrads during 1997-2000.

Urban bird numbers are thought to relate strongly to the availability of prey species, and nesting opportunities.

Declines are most likely caused by the reduction in the diversity and abundance of invertebrate prey species resulting from increased 'tidiness' in our parks and gardens, the use of pesticides and other changes in farm practices. The exclusion of urban birds from breeding in or around modern buildings reduces nesting opportunities for urban birds.

**NM BAP species: Lapwing (*Vanellus vanellus*)**

Between 1987 and 1998 Lapwing declined by 48% in England and Wales with Wales and the SW of England showing greatest loss. Two thirds of the population is now resident in the N and NW of England.

Locally this species continues to breed in all suitable habitats and the 2002-03 surveys indicated a population of around 1,500 pairs with arable farmland and pockets of grassland being particularly favoured.

Local threats are thought to include development in nesting areas, increasing recreation and disturbance, scrub encroachments on coastal grassland and changes in farm practice towards silage production, livestock and agricultural intensification.

**NM BAP species: Skylark (*Alauda arvensis*)**

Although Skylark is widespread throughout Europe and large numbers are thought to breed in the UK, it is in significant decline with a fall in the population of 75% between 1972 and 1996 on lowland farms and an overall fall in the UK population of 53% between 1970 and 2005.

Locally Skylark breeds in all remaining suitable habitat and in 1997-2000 there were 750 breeding pairs but declines are thought to reflect the national trend.

This species relies heavily on traditional arable farming and so declines have largely been due to changes in farming practices in recent decades. Conversion to silage production, changes in sowing times and general agricultural intensification have all been particularly detrimental by reducing nesting habitat and sources of food.

Other causes of decline include overgrazing, disturbance during the breeding season and loss of grassland to development and tree planting.

**NM BAP species: Song Thrush (*Turdus philomelos*)**

Although still widespread, Song Thrush declined sharply by around 73% in farmland (mid 1970s) and 49% in woodland (1968-1993), while overall UK numbers fell by 50% between 1970 and 2005. The North of the UK is thought to have been hit hardest.

In North Merseyside, though thinly distributed, Song Thrush still breed in most areas with an estimated 500 pairs during 1997-2000. Highest breeding concentrations were found to occur in suburban areas where abundant garden and parkland habitats were present.



Song Thrush are reliant on a variety of habitats to meet their needs at different times of the year and loss of these habitats is causes a reduction in numbers.

Local factors in the decline of the species include changes in farm practices that remove nesting habitat (hedgerows and dense scrub), limit the abundance of winter food (changes in sowing, cropping and use of herbicides/molluscicides) or cause the loss of feeding habitat (use of pesticides/herbicides and monocropping).

**NM BAP species: Bluebell** (*Hyacinthoides non-scripta*)

British Bluebells make up about 20% of the global population of *Hyacinthoides non-scripta* and are often found in humid woodland habitat, along hedgerows and on occasion along the coast. Locally there are a number of good colonies.

Local threats to the species include possible over-shading in un-managed woodlands, localised trampling by the public in popular areas and hybridisation with the Spanish Bluebell. On a national scale declines are caused by the loss of woodland habitat, grazing by introduced Muntjac, collection of plants and hybridisation with Spanish Bluebell.

**NM BAP species: Dragonflies** (*Ischnura elegans*; *Libellula depressa*; *Sympetrum striolatum*; *Lestes sponsa*; *Anax imperator*; *Aeshna cyanea*)

Twentyone species of dragonfly and damselfly are included in the NM BAP Dragonflies Species Action Plan. These include vagrant species and some which are thought to be undergoing range expansions in the UK. Eighteen of these species are known to breed in our local area, with significant breeding sites in St Helens and Sefton.

Local causes of decline in this include the destruction or damage of essential wetland habitat through development, waste-tipping and agricultural run-off. Removal of nearby feeding habitats such as woodlands, hedgerows and tall vegetation is also detrimental.

**NM BAP species: Brown Hare** (*Lepus europaeus*)

Whilst still well distributed in North Merseyside it is thought that the local population of Brown Hare declined in-line with National trends which have shown severe declines in the western pastoral parts of the country to around 20% of the numbers present in Victorian times.

Reasons for local declines are thought to include loss and fragmentation of suitable habitat to development, illegal hunting and changes in farming practices and land use that cause increased disturbance (changes in cropping/sowing times, livestock trampling and recreation).

**NM BAP species: Bats** (*Pipistrellus pipistrellus*)

The NM BAP Bats Species Action Plan covers all species found in North Merseyside since all are considered to be locally threatened.

Bat Species are found throughout North Merseyside, with Pipistrelles (Common/Soprano) most often encountered and Brown Long-eared and Noctules less common. Daubenton's are also frequently encountered in suitable wetland habitat. Whiskered, Brandt's and Natterers are considered rare locally.

Bat species will roost in many locations that are warm, dark, sheltered and little undisturbed. Such places can include derelict buildings, barns, roof spaces and tree hollows.

Factors causing declines in these species include the loss of prey insects due to the increased use of pesticides and general park/garden 'tidiness', loss and fragmentation of habitat mosaics, loss of winter roosts in old trees and buildings and intentional exclusion from buildings by people.

#### **NM BAP species: Water Vole (*Arvicola amphibius*)**

This species is found throughout Britain but localised to areas of suitable habitat near water. Previously common this species has undergone severe range and population reductions, with a national survey showing a decline of around 89% since 1939, estimated to increased to a loss of 94% by 2000. Merseyside appears to be a stronghold for the species with 75% of sites surveyed having Water Voles present in 1989-90. Though they may still be in decline locally, it is thought to be at a lower level than nationally.

Local declines in the species are caused by inappropriate management of bank-side habitats and waterside developments as well as predation by invasive species such as mink. The use of rodenticides and loss of habitat connectivity may also be factors in population declines.

#### **NERC Act Section 41 Species**

Known also as 'Species of Principle Importance in England' and the 'England Biodiversity List' this list was developed to meet the requirements of Section 40 of the Natural Environment and Rural Communities Act (2006). The list is derived, almost wholly, from the 2007 revised list of UK BAP priority species. (So called 'research only' moth species have been excluded from the report.) The section 41 list is used to guide decision-makers such as public bodies, including local and regional authorities, in implementing their duty under section 40 of the Natural Environment and Rural Communities Act 2006 'to have regard' to the conservation of biodiversity in England, when carrying out their normal functions. In particular:

- Regional Planning Bodies and Local Planning Authorities must use it to identify the species that should be afforded priority when applying the requirements of National Planning Policy Framework (NPPF) to maintain, restore and enhance species and habitats.
- Local Planning Authorities must use it to identify the species that require specific consideration in dealing with planning and development control, recognising that under NPPF the aim of planning decisions should be to minimise impacts on biodiversity and geodiversity.
- All Public Bodies must use it to identify species that should be given priority when implementing the NERC Section 40 duty.

The following tables detail the NERC Section 41 species that were recorded in the search area.

Group	Common Name	Scientific Name	Records	Dates	Designations
amphibian	Great Crested Newt	<i>Triturus cristatus</i>	27	2007	Sect.41
bird	Bullfinch	<i>Pyrrhula pyrrhula</i>	2	1998	Sect.41.suppl
	Corn Bunting	<i>Emberiza calandra</i>	1	1999	Sect.41.suppl
	Duncock	<i>Prunella modularis</i>	4	1998-1999	Sect.41.suppl
	Grasshopper Warbler	<i>Locustella naevia</i>	2	1997-1999	Sect.41
	Grey Partridge	<i>Perdix perdix</i>	6	1998-2002	Sect.41
	House Sparrow	<i>Passer domesticus</i>	7	1998-2001	Sect.41
	Lapwing	<i>Vanellus vanellus</i>	3	1998-2002	Sect.41
	Lesser Spotted Woodpecker	<i>Dendrocopos minor</i>	1	1999	Sect.41.suppl
	Linnet	<i>Linaria cannabina</i>	4	1998-2002	Sect.41.suppl
	Reed Bunting	<i>Emberiza schoeniclus</i>	2	1998-1999	Sect.41

	Skylark	<i>Alauda arvensis</i>	8	1998-2002	Sect.41, Sect.41.suppl
	Song Thrush	<i>Turdus philomelos</i>	4	1998-1999	Sect.41.suppl
	Starling	<i>Sturnus vulgaris</i>	4	1998-1999	Sect.41.suppl
	Tree Sparrow	<i>Passer montanus</i>	1	1998	Sect.41
	Willow Tit	<i>Poecile montana</i>	1	1998	Sect.41.suppl
	Yellowhammer	<i>Emberiza citrinella</i>	3	1998-1999	Sect.41
flowering plant	Cornflower	<i>Centaurea cyanus</i>	1	1995	Sect.41
insect - butterfly	Wall	<i>Lasiommata megera</i>	2	1992	Sect.41
terrestrial mammal	Brown Hare	<i>Lepus europaeus</i>	4	1998	Sect.41
	European Water Vole	<i>Arvicola amphibius</i>	1	2007	Sect.41
	West European Hedgehog	<i>Erinaceus europaeus</i>	1	1973	Sect.41

Desig. Code	Desig. Name	Designation Description
Sect.41	Natural Environment and Rural Communities Act 2006 - Species of Principal Importance in England (sec	Species "of principal importance for the purpose of conserving biodiversity" covered under section 41 (England) of the NERC Act (2006) and therefore need to be taken into consideration by a public body when performing any of its functions with a view to conserving biodiversity.
Sect.41.suppl	Supplementary list to deal with S41 bird sub-sp problems	Bird species corresponding to British sub-species listed in section 41 (England) of the NERC Act (2006).

### **IUCN Red-listed Species**

The IUCN Red List of Threatened Species (sometimes called 'Red Data Book' species) indicates the conservation status of plants and animals that have been globally evaluated using the IUCN Red List Categories and Criteria. The system is designed to determine the relative risk of extinction, and the main purpose of the IUCN Red List is to catalogue and highlight those plants and animals that are facing a higher risk of global extinction (i.e. those listed as Critically Endangered, Endangered and Vulnerable). The IUCN Red List also includes information on plants and animals that are categorized as 'Extinct' or 'Extinct in the Wild'; on taxa that cannot be evaluated because of insufficient information ('Data Deficient'); and on plants and animals that are either close to meeting the threatened thresholds or that would be threatened were it not for an ongoing taxon-specific conservation programme ('Near Threatened').

The following tables detail the IUCN Red-listed species that were recorded in the search area.

Group	Common Name	Scientific Name	Records	Dates	Designations
flowering plant	Corn Marigold	<i>Glebionis segetum</i>	1	1995	RLGB.VU
	Field Woundwort	<i>Stachys arvensis</i>	1	1995	RLGB.Lr(NT)
	Water-soldier	<i>Stratiotes aloides</i>	1	1984	RLGB.Lr(NT)
fungus	Brown Birch Bolete	<i>Leccinum scabrum</i>	9	1998-2012	RLGB.DD
	Slate Bolete	<i>Leccinum duriusculum</i>	8	2006-2013	RLGB.Lr(NT)
insect - butterfly	Wall	<i>Lasiommata megera</i>	2	1992	RLGB.Lr(NT)

Desig. Code	Desig. Name	Designation Description
RLGB.VU	IUCN (2001) - Vulnerable	A taxon is Vulnerable when it is not Critically Endangered or Endangered but is facing a high risk of extinction in the wild in the medium term future.
RLGB.Lr(NT)	IUCN (2001) - Lower risk - near threatened	Taxa which do not qualify for Lower Risk (conservation dependent), but which are close to qualifying for Vulnerable. In Britain, this category includes species which occur in 15 or fewer hectads but do not qualify as Critically Endangered, Endangered or Vulnerable.

RLGB.DD	IUCN (2001) - Data Deficient	A taxon is Data Deficient when there is inadequate information to make a direct, or indirect, assessment of its risk of extinction based on its distribution and/or population status. A taxon in this category may be well studied, and its biology well known, but appropriate data on abundance and/or distribution are lacking. Data Deficient is therefore not a category of threat or Lower Risk. Listing of taxa in this category indicates that more information is required and acknowledges the possibility that future research will show that a threatened category is appropriate.
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### **Nationally Notable Species**

These are plants and animals which do not fall within red-list categories but which are none-the-less uncommon in Great Britain.

The following tables detail the Nationally Notable species that were recorded in the search area.

Group	Common Name	Scientific Name	Records	Dates	Designations
flowering plant	Water-soldier	<i>Stratiotes aloides</i>	1	1984	NR-excludes
	Welsh Poppy	<i>Meconopsis cambrica</i>	1	1995	NS-excludes

Desig. Code	Desig. Name	Designation Description
NS-excludes	Nationally Scarce. Excludes Red Listed taxa	Nationally Scarce - Occurring in 16-100 hectads in Great Britain. Excludes rare species qualifying under the main IUCN criteria.
NR-excludes	Nationally Rare. Excludes Red Listed taxa	Nationally Rare - Occurring in 15 or fewer hectads in Great Britain. Excludes rare species qualifying under the main IUCN criteria.

### **WCA schedule 9 species (including non-native invasive plants)**

Schedule 9 of the Wildlife & Countryside Act (amended 2010) lists species of plants and animals for which it is a specific offence to plant or otherwise cause to grow in the wild (plants) or release or allow to escape into the wild (animals). Many of these are invasive non-native plants and animals, but there are also a number of native animals on the list (e.g. Barn Owl) which cannot be released into the wild in England without a license from Natural England.

The following tables detail the WCA Schedule 9 species recorded in the search area.

Group	Common Name	Scientific Name	Records	Dates	Designations
flowering plant	Canadian Waterweed	<i>Elodea canadensis</i>	3	1984-2007	MBB-WCA-S9
	Japanese Knotweed	<i>Fallopia japonica</i>	4	1984-2008	MBB-WCA-S9
	Montbretia	<i>Crocasmia pottsii</i> x <i>aurea</i> = <i>C. x crocosmiiflora</i>	2	2005	MBB-WCA-S9
	New Zealand Pigmyweed	<i>Crassula helmsii</i>	1	1997	MBB-WCA-S9
	Rhododendron	<i>Rhododendron ponticum</i>	3	1984-2013	MBB-WCA-S9
terrestrial mammal	Eastern Grey Squirrel	<i>Sciurus carolinensis</i>	5	1966-2013	MBB-WCA-S9

Desig. Code	Desig. Name	Designation Description
MBB-WCA-S9	Wildlife and Countryside Act 1981 (Variation of Schedule 9) (England and Wales) Order 2010	Species on Schedule 9 (part 2) as revised 2010. Under section 14 of the Act it is illegal to release into the wild any animal or allow to grow in the wild any plant which is not ordinarily resident in GB or which is a known threat and is listed on Schedule 9 of the Act.



## BAP priority habitats

In 2007 the Local Biodiversity Manager (responsible for the North Merseyside Biodiversity Action Plan) undertook a review of the extent of UK BAP priority habitats in North Merseyside and produced GIS layers to show their extents. In most cases these inventories were derived from two main sources: the latest Phase 1 habitat surveys which were conducted for the four North Merseyside local authorities between 1996 and 2007; and an NVC survey of the Sefton Coast carried out between 2003 and 2004. A separate NVC survey of the Ribble estuary carried out in 2002 (which also included saltmarsh at the Alt) was also useful as were one or two other sources. Because of the diverse nature of habitat classifications, it was not always possible to produce inventories with a one-to-one correspondence with UK BAP priority habitats. The table below shows the BAP habitat inventories for North Merseyside and their correspondence with UK BAP priority habitats.

North Merseyside habitat inventory	Correspondence with UK BAP priority habitats
Lowland Acid Grassland	Lowland Dry Acid Grassland
Lowland Heathland	Lowland Heathland
Lowland Raised Bog	Lowland Raised Bog
Neutral Grassland	Incorporates the UK BAP habitat Lowland Meadows but also, in North Merseyside, includes a lot of amenity grassland, road verges etc.
Calcareous Grassland	Calcareous Grassland
Ponds	Ponds
Lakes	Eutrophic lakes
Reedbeds	Reedbeds
Hedgerows	Hedgerows
Saltmarsh	Coast Saltmarsh
Sand Dune	Coastal Sand Dune
All Woodland	It was not possible, from the available data, to produce separate inventories for different woodland types in North Merseyside, so this inventory incorporates elements of several UK BAP priority habitats such as Lowland Mixed Deciduous Woodland, Wet Woodland and Wood Pasture & Parkland.

Note that the 'Ponds' BAP inventory was derived locally using water bodies less than two hectares in extent from Ordnance Survey data. The 'Lakes' BAP inventory is a nationally supplied inventory, but the lakes are only represented in this as points. Therefore any water body over two hectares in extent will only be represented on our habitat maps by a point and will not show the extent of the lake. However, ponds will be indicated by polygons showing their extent. Occasionally a large pond – though still less than two hectares in extent – will be represented in both the 'Lake' and 'Pond' inventories.

Habitat	Amount	Units
Hedgerows	0.6	kilometres
All Woodland	21.23	hectares
Neutral Grassland	3.05	hectares
Ponds	0.17	hectares
Ponds	4	count

The table above indicates the extent of each of the BAP habitat inventories (see previous table) occurring within your search area (see appendix 3 for maps).

## Detailed habitat mapping

Merseyside BioBank collates and maintains detailed habitat mapping – normally Phase 1 or NVC – for the North Merseyside area. This includes both historic data and the most up-to-date habitat survey data available. Here we report on the detailed habitat mapping we hold for your search area.

Ref: Liverpool-2006-07		
Source: Liverpool Space for Nature project - phase 1 habitat survey 2006-2007		
Survey date: 2006 - 2007		
Notes: This is the 'default' baseline mapping used by the Council. It is the most recent complete coverage for the borough.		
Woodland and scrub		
A1.1.2	Broadleaved woodland - plantation	3.24 ha
A1.3.2	Mixed woodland - plantation	0.03 ha
A2.1	Scrub - dense/continuous	0.84 ha
Grassland and marsh		
B6	Poor semi-improved grassland	0.48 ha
Open water		
G1	Standing water	0.08 ha
Miscellaneous		
J1.2	Cultivated/disturbed land - amenity grassland	15.7 ha

Habitat maps themselves are produced at the end of the report. You can cross-reference the figures in the tables below to the maps by means of the reference which appears on each map. A map with the reference 'Composite' is a special map made on-the-fly at the time of this report production by merging data from all available sources and using the most up-to-date mapping available at any given point in your search area.

## Designated Areas

There are a number of types of 'designated areas' in North Merseyside. These types are shown in the table below together with the total number of North Merseyside sites for each.

Type of area	No. of sites
Site of Special Scientific Interest	6
Special Protection Area (Natura 2000)	3
Marine Special Protection Area	1
Special Area of Conservation (Natura 2000)	1
RAMSAR (wetland of international importance)	3
National Nature Reserve	3
Local Nature Reserve	57
Knowsley Local Wildlife Site	23
Sefton Local Wildlife Site	55
St Helens Local Wildlife Site	121
Liverpool Local Wildlife Site (current)	28
Liverpool Local Wildlife Site (proposed)	30
Merseyside Ancient Woodland Inventory	11
RSPB/LWT Windfarm Alert Map	1
Red Squirrel Protection Area	1

The following table indicates the results of the intersection between the search area and designated areas detailed above (see appendix 3 for maps).

Name	Type
Loopline	Liverpool Local Wildlife Site (current)
Nursery, S. Liverpool Sewage Works Site	Liverpool Local Wildlife Site (current)
South Liverpool Nursery	Liverpool Local Wildlife Site (proposed)
Loop Line	Liverpool Local Wildlife Site (proposed)
Lee Park Golf Course	Liverpool Local Wildlife Site (potential)

Citations<sup>1</sup> for Local Wildlife Sites are supplied separately.

<sup>1</sup> In Knowsley, some Local Wildlife Site citations do not include lists of species and habitats for which they are designated and where this is the case a separate list is supplied for the site. No Local Wildlife citations are available for Liverpool Local Wildlife Sites (current or potential). No citations for LNRs are available. Citations for national and internationally designated sites (SSSI, SPA etc) are publicly available.

## **Interpretation and caveats**

### ***Merseyside BioBank records included***

All relevant non-confidential records managed by Merseyside BioBank which intersect the search area are included in this report, except where excluded by one or more of the conditions described in the rest of this section.

### ***NBN Gateway records included***

All relevant records available to Merseyside BioBank from the NBN Gateway are included in this report, except where excluded by one or more of the conditions described in the rest of this section. NBN Gateway records are accessed live *via* web-services at the time of report generation.

Merseyside BioBank often has access to NBN records at higher resolution than the standard 'public' access. These records have been downloaded and used with the permission of the data providers, but are subject to normal NBN Gateway terms and conditions. You must not use them beyond the specific purposes for which this report was provided to you and you must adhere, at all times, to the NBN Gateway terms and conditions.

### ***Record location and dates***

If a record can only be located to a relatively low precision (e.g. 1 km or 2 km square), then it is possible that the unrecorded precise location of the animal or plant might have been outside of the search area. Sometimes the location name column can be useful in deciding whether or not this was likely to have been the case. In records from our own database, we have replaced all digits with the '#' character in the location field to people's privacy where addresses have been used as location names.

Records which are only available to us at less than 2 km square (tetrad) precision are excluded from the report. We report dates at the highest precision available to us. Records for which no date is available are excluded from the report.

### ***Absence of records and 'negative records'***

The absence of biological records for an area, or the presence of 'negative records', is not proof that taxa are not present.

### ***Duplicate records***

Although we do our very best to avoid reporting the same record more than once ('duplicate records') this is sometimes unavoidable for records that have entered the biological records network *via* more than one route. In particular, there may be some record duplication between records from Merseyside BioBank's database and records from the NBN Gateway datasets (though, of course, we do not report on NBN Gateway records which originate from Merseyside BioBank).

### ***Validity of records***

Whilst Merseyside BioBank continually strives to verify the records that we manage, we accept no responsibility for any errors subsequently discovered. Merseyside BioBank accepts no responsibility for errors in data derived from the NBN Gateway.

### ***Bird records***

Only bird records with a recorded status of proven, probable and possible breeding have been included in this data search. Bird records with other statuses are not included. The most recent bird records for North Merseyside included, e.g. those generated for the ongoing breeding and wintering atlas projects, since these data have yet to undergo verification by the County Bird Recorder. It is possible for you to





***The Local Biodiversity  
Records Centre  
for North Merseyside***

Merseyside BioBank,  
Estate Barn, Court Hey Park  
Roby Road, Liverpool  
L16 3NA  
Tel: 0151 737 4150  
[Info@MerseysideBiobank.org.uk](mailto:Info@MerseysideBiobank.org.uk)

contact the County Bird Recorder independently for his interpretation of the most recent data with respect to your search area. The contact details are:

Steve White  
[stevewhite102@btinternet.com](mailto:stevewhite102@btinternet.com)

Please note that if this is a commercial data request you will be invoiced by **Sefton Borough Council**, which is the hosting authority for Merseyside BioBank LRC.

## **Appendix 1: Terms and conditions of use**

**Merseyside BioBank receives data from a variety of sources, from large organisations to amateur naturalists. With Merseyside BioBank operating as custodians, these individuals and groups, who provide their records free of charge, retain copyright on their data.**

**All data passed to a third party (users) by Merseyside BioBank are subject to these access terms and conditions. Non-adherence to these terms and conditions will be viewed as a breach of contract, which may result in legal redress being sought.**

1. Users agree that data released by Merseyside BioBank, in any format and on any media, will only be used for the purpose for which it was originally requested and for any time period originally agreed upon (See note 3 below).
2. Users agree that data released by Merseyside BioBank will not be added to any permanent database system (electronic or paper based) unless by written agreement with Merseyside BioBank.
3. Users understand that following the end of the agreed time period, or 12 months from the enquiry date, the received data must be deleted from any electronic system (See note 2 above). Use of the data beyond this period must be preceded by a further request to Merseyside BioBank.
4. Users agree that data retrieved from Merseyside BioBank will not be passed on to or communicated with third parties except as aggregated data within reports, or as anonymised data in the form of maps etc., which constitute a part of the agreed reason for the original enquiry.
5. Merseyside BioBank disclaims any responsibility for the accuracy of the information within its reports and accepts no liability for any result of using these data.
6. Any biological record is specific to the date of the recording and does not necessarily imply the continuance of the species at that site.
7. The lack of species and/or habitat information for a geographically defined area does not necessarily imply a low biodiversity value for that area. It may simply be unrecorded.
8. While the information from Merseyside BioBank in itself will remain free, Merseyside BioBank reserves the right to charge a reasonable fee to cover administration and a proportion of overheads as detailed in our charging policy.
9. A copy of any report, or other product, produced using the data from Merseyside BioBank would be gratefully received if provided without cost.
10. Merseyside BioBank must be acknowledged within any report, or other product produced, using data provided by Merseyside BioBank.

## Appendix 2: Full species records

The following records for protected, BAP, red-listed, notable and invasive species were found to intersect the search area. (Appendix 3 includes a map to show the location of 1 km and tetrad grid references.) The source of each record is shown in the final column (BioBank = Merseyside BioBank; NBN = NBN Gateway).

GridRef	Location Name	Common Name	Scientific Name	Group	Abundance or Status	Date	Comment	Source
SJ427880	Garden of 12 South Station Rd L25 3QG	Common Frog	<i>Rana temporaria</i>	amphibian	3 Count of Juvenile	04/07/2009		1
SJ427880	Garden of 12 South Station Rd L25 3QG	Common Frog	<i>Rana temporaria</i>	amphibian	1 Count of Adult	04/07/2009		1
SJ427880	Garden of 12 South Station Rd L25 3QG	Common Frog	<i>Rana temporaria</i>	amphibian	24 Count of tadpoles	12/05/2009		1
SJ427880	Garden of 12 South Station Rd L25 3QG	Common Frog	<i>Rana temporaria</i>	amphibian	2 Count of Adult	12/05/2009		1
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	12 Count of Female; 9 Count of Male	09/05/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	10 Count of Female; 15 Count of Male	10/05/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	7 Count of Female; 7 Count of Male	15/06/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	11 Count of Male; 6 Count of Female	16/04/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	11 Count of Female; 8 Count of Male	16/05/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	14 Count of Male; 7 Count of Female	16/06/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	14 Count of Male; 7 Count of Female	16/06/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	11 Count of Male; 9 Count of Female	17/04/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	11 Count of Female; 8 Count of Male	17/05/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	15 Count of Male; 6 Count of Female	22/03/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	12 Count of Male; 6 Count of Female	23/03/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	5 Count of Female; 6 Count of Male	27/04/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	10 Count of Male; 9	28/04/2007		2

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	nr 1st hole.				Count of Female			
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	1 Count	March 2007 - June 2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	6 Count of Male; 8 Count of Female	09/05/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	3 Count of Male; 4 Count of Female	09/05/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	2 Count of Male; 5 Count of Female	15/06/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	4 Count of Female; 4 Count of Male	16/04/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	3 Count of Female; 6 Count of Male	16/05/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	7 Count of Female; 8 Count of Male	16/05/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	9 Count of Female; 9 Count of Male	16/06/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	6 Count of Male; 7 Count of Female	17/04/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	4 Count of Female; 5 Count of Male	22/03/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	5 Count of Female; 6 Count of Male	23/03/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	5 Count of Female; 5 Count of Male	27/04/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	12 Count of Female; 5 Count of Male	28/04/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, near 12th hole.	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	1 Count	March 2007 - June 2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	12 Count of Male; 14 Count of Female	10/05/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	6 Count of Male; 8 Count of Female	16/06/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	10 Count of Female; 14 Count of Male	17/04/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	11 Count of Male; 9 Count of Female	17/05/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	12 Count of Female; 7 Count of Male	23/03/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole.	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	11 Count of Female; 8 Count of Male	28/04/2007		2
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	1 Count	March 2007 - June 2007		2



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SJ437893	Pond on site	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	15 Count of Male	05/06/2008-09/06/2008		3
SJ437893	Pond on site	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	16 Count of Female	05/06/2008-09/06/2008		3
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	19 Count of Male; 6 Count of Female	09/05/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	10 Count of Female; 13 Count of Male	16/05/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	7 Count of Female; 8 Count of Male	16/06/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	10 Count of Male; 7 Count of Female	17/04/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	1 Count	22/03/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	5 Count of Male; 8 Count of Female	23/03/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, nr 12th hole	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	7 Count of Male; 9 Count of Female	28/04/2007		2
SJ4414787667	Lee Valley Golf Club, Netherley, near 12th hole.	Smooth Newt	<i>Lissotriton vulgaris</i>	amphibian	1 Count	March 2007 - June 2007		2
SJ48J	Belle Vale tetrad	Bullfinch	<i>Pyrrhula pyrrhula</i>	bird	1 Count of Possible breeding	1998		4
SJ48N	Netherley East tetrad	Bullfinch	<i>Pyrrhula pyrrhula</i>	bird	1 Count of Possible breeding	1998		4
SJ48P		Corn Bunting	<i>Emberiza calandra</i>	bird	1 Count of Confirmed breeding	1999		4
SJ48I	Woolton Woods	Dunnock	<i>Prunella modularis</i>	bird	1 Count of Confirmed breeding	1999		4
SJ48J	Belle Vale tetrad	Dunnock	<i>Prunella modularis</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48N	Netherley East tetrad	Dunnock	<i>Prunella modularis</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48P	Netherley NE	Dunnock	<i>Prunella modularis</i>	bird	1 Count of Confirmed breeding	1999		4
SJ48N		Grasshopper Warbler	<i>Locustella naevia</i>	bird	1 Count of Confirmed breeding	1997 - 1999		4
SJ48P	Lee Park Golf Course	Grasshopper Warbler	<i>Locustella naevia</i>	bird	1 Count of Possible breeding	1999		4
SJ4487	North End Farm	Grey Partridge	<i>Perdix perdix</i>	bird	1 Count of Confirmed breeding	2000		4
SJ4487		Grey Partridge	<i>Perdix perdix</i>	bird	1 Count of Probable breeding	2002	Whole 1km square surveyed. Counts not comprehensive.	4
SJ48J	Belle Vale tetrad	Grey Partridge	<i>Perdix perdix</i>	bird	1 Count of Confirmed breeding	1998		4

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SJ48N		Grey Partridge	<i>Perdix perdix</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48N	Netherley East tetrad	Grey Partridge	<i>Perdix perdix</i>	bird	2 Count of Confirmed breeding	1998		4
SJ48P		Grey Partridge	<i>Perdix perdix</i>	bird	1 Count of Confirmed breeding	1999		4
SJ48I	Woolton Woods	House Martin	<i>Delichon urbicum</i>	bird	1 Count of Possible breeding	1999		4
SJ48J	Belle Vale tetrad	House Martin	<i>Delichon urbicum</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48N	Netherley East tetrad	House Martin	<i>Delichon urbicum</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48P	Netherley NE	House Martin	<i>Delichon urbicum</i>	bird	1 Count of Confirmed breeding	1999		4
SJ425880		House Sparrow	<i>Passer domesticus</i>	bird	1 Proven Count of Confirmed breeding	19/05/2001		4
SJ430880		House Sparrow	<i>Passer domesticus</i>	bird	2 Proven Count of Confirmed breeding	19/05/2001		4
SJ433882		House Sparrow	<i>Passer domesticus</i>	bird	1 Proven Count of Confirmed breeding	19/05/2001		4
SJ48I	Woolton Woods	House Sparrow	<i>Passer domesticus</i>	bird	1 Count of Confirmed breeding	1999		4
SJ48J	Belle Vale tetrad	House Sparrow	<i>Passer domesticus</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48N	Netherley East tetrad	House Sparrow	<i>Passer domesticus</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48P	Netherley NE	House Sparrow	<i>Passer domesticus</i>	bird	1 Count of Probable breeding	1999		4
SJ4487	North End Farm	Lapwing	<i>Vanellus vanellus</i>	bird	1 Count of Confirmed breeding	2000		4
SJ4487		Lapwing	<i>Vanellus vanellus</i>	bird	1 Count of Confirmed breeding	2002	Whole 1km square	4
SJ48J	Belle Vale tetrad	Lapwing	<i>Vanellus vanellus</i>	bird	1 Count of Possible breeding	1998		4
SJ48P		Lesser Spotted Woodpecker	<i>Dendrocopos minor</i>	bird	1 Count of Possible breeding	1999		4
SJ4487		Linnet	<i>Linaria cannabina</i>	bird	1 Count of Possible breeding	2002	Survey too early to confirm breeding or numbers	4
SJ48J	Belle Vale tetrad	Linnet	<i>Linaria cannabina</i>	bird	1 Count of Possible breeding	1998		4
SJ48N	Netherley East tetrad	Linnet	<i>Linaria cannabina</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48P	Netherley NE	Linnet	<i>Linaria cannabina</i>	bird	1 Count of Confirmed breeding	1999		4

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SJ48N		Reed Bunting	<i>Emberiza schoeniclus</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48P	Netherley NE	Reed Bunting	<i>Emberiza schoeniclus</i>	bird	8 Count of Confirmed breeding	1999		4
SJ4389		Skylark	<i>Alauda arvensis</i>	bird	3 Count of Confirmed breeding	2002	Whole 1km square surveyed. Counts not comprehensive.	4
SJ4487	North End Farm	Skylark	<i>Alauda arvensis</i>	bird	1 Count of Confirmed breeding	2000		4
SJ4487		Skylark	<i>Alauda arvensis</i>	bird	3 Count of Confirmed breeding	2002	Whole 1km square surveyed. Counts not comprehensive.	4
SJ48J	Belle Vale tetrad	Skylark	<i>Alauda arvensis</i>	bird	3 Count of Confirmed breeding	1998		4
SJ48N		Skylark	<i>Alauda arvensis</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48N	Netherley East tetrad	Skylark	<i>Alauda arvensis</i>	bird	7 Count of Confirmed breeding	1998		4
SJ48P	Netherley NE	Skylark	<i>Alauda arvensis</i>	bird	1 Count of Confirmed breeding	1999		4
SJ48P		Skylark	<i>Alauda arvensis</i>	bird	5 Count of Confirmed breeding	1999		4
SJ48I	Woolton Woods	Song Thrush	<i>Turdus philomelos</i>	bird	10 Count of Confirmed breeding	1999		4
SJ48J	Belle Vale tetrad	Song Thrush	<i>Turdus philomelos</i>	bird	4 Count of Confirmed breeding	1998		4
SJ48N		Song Thrush	<i>Turdus philomelos</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48P	Netherley NE	Song Thrush	<i>Turdus philomelos</i>	bird	2 Count of Confirmed breeding	1999		4
SJ48I	Woolton Woods	Starling	<i>Sturnus vulgaris</i>	bird	1 Count of Confirmed breeding	1999		4
SJ48J	Belle Vale tetrad	Starling	<i>Sturnus vulgaris</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48N	Netherley East tetrad	Starling	<i>Sturnus vulgaris</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48P	Netherley NE	Starling	<i>Sturnus vulgaris</i>	bird	1 Count of Probable breeding	1999		4
SJ48I	Woolton Woods	Swift	<i>Apus apus</i>	bird	1 Count of Possible breeding	1999		4
SJ48J	Belle Vale tetrad	Swift	<i>Apus apus</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48N	Netherley East tetrad	Swift	<i>Apus apus</i>	bird	1 Count of Possible breeding	1998		4
SJ48P	Netherley NE	Swift	<i>Apus apus</i>	bird	1 Count of Confirmed breeding	1999		4

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SJ48J	Belle Vale tetrad	Tree Sparrow	<i>Passer montanus</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48N		Willow Tit	<i>Poecile montana</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48N		Yellowhammer	<i>Emberiza citrinella</i>	bird	1 Count of Confirmed breeding	1998		4
SJ48N	Netherley East tetrad	Yellowhammer	<i>Emberiza citrinella</i>	bird	6 Count of Confirmed breeding	1998		4
SJ48P		Yellowhammer	<i>Emberiza citrinella</i>	bird	4 Count of Confirmed breeding	1999		4
SJ429878	Loopline between Beechurst Rd and Belle Vale Rd L25	Bluebell	<i>Hyacinthoides non-scripta</i>	flowering plant	3 Count of Square metres	10/05/2009		1
SJ48I		Bluebell	<i>Hyacinthoides non-scripta</i>	flowering plant	1 Count of Present	1995		6
SJ48N		Bluebell	<i>Hyacinthoides non-scripta</i>	flowering plant	1 Count of Present	1995		6
SJ4376587690	Lee Valley Golf Club, Netherley, nr 1st hole	Canadian Waterweed	<i>Elodea canadensis</i>	flowering plant	1 Count	March 2007 - June 2007		2
SJ4387	Carr Lane Fields - Huyton	Canadian Waterweed	<i>Elodea canadensis</i>	flowering plant	1 Count	1984		5
SJ4389	Huyton Merseyside	Canadian Waterweed	<i>Elodea canadensis</i>	flowering plant	1 Count	02/08/1984		5
SJ435875	Nursery (South Liverpool Sewage Works)	Corn Marigold	<i>Glebionis segetum</i>	flowering plant	O DAFOR	20/09/1995		7
SJ435875	Nursery (South Liverpool Sewage Works)	Cornflower	<i>Centaurea cyanus</i>	flowering plant	O DAFOR	20/09/1995		7
SJ431875	The Nook, Gatecare	Field Woundwort	<i>Stachys arvensis</i>	flowering plant	O DAFOR	20/09/1995		7
SJ431875	The Nook, Gatecare	Japanese Knotweed	<i>Fallopia japonica</i>	flowering plant	O DAFOR	20/09/1995		7
SJ435874		Japanese Knotweed	<i>Fallopia japonica</i>	flowering plant		07/05/2008		28
SJ4387	Carr Lane Fields - Huyton	Japanese Knotweed	<i>Fallopia japonica</i>	flowering plant	1 Count	1984		5
SJ4389	Huyton Merseyside	Japanese Knotweed	<i>Fallopia japonica</i>	flowering plant	1 Count	02/08/1984		5
SJ4287		Montbretia	<i>Crocasmia pottsii x aurea = C. x crocosmiiflora</i>	flowering plant		19/03/2005		29
SJ4288		Montbretia	<i>Crocasmia pottsii x aurea = C. x crocosmiiflora</i>	flowering plant		19/03/2005		29
SJ48J	SJ48J, South Lancashire	New Zealand Pigmyweed	<i>Crassula helmsii</i>	flowering plant	1 Count of Present	01/01/1997		8
SJ4287	Reynolds Park, Woolton, South Lancashire	Rhododendron	<i>Rhododendron ponticum</i>	flowering plant	P InFlower- Count of Flowering	23/01/2013	Evergreen foliage.	9
SJ4387	Carr Lane Fields - Huyton	Rhododendron	<i>Rhododendron ponticum</i>	flowering plant	1 Count	1984		5
SJ4389	Huyton Merseyside	Rhododendron	<i>Rhododendron ponticum</i>	flowering plant	1 Count	02/08/1984		5
SJ4389	Huyton Merseyside	Water-soldier	<i>Stratiotes aloides</i>	flowering plant	1 Count	02/08/1984		5



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SJ435875	Nursery (South Liverpool Sewage Works)	Welsh Poppy	<i>Meconopsis cambrica</i>	flowering plant	O DAFOR	20/09/1995		7
SJ440890	Childwall Golf Club Liverpool 27	Brown Birch Bolete	<i>Leccinum scabrum</i>	fungus	1 Count of Present	05/07/2007	parkland with scattered trees	10
SJ440890	Liverpool, Childwall	Brown Birch Bolete	<i>Leccinum scabrum</i>	fungus		11/09/1998	<i>Leccinum scabrum</i> ; <i>Betula</i> sp.; soil	11
SJ440890	Childwall Golf Club Liverpool 27	Brown Birch Bolete	<i>Leccinum scabrum</i>	fungus	1 Count of Present	12/10/2006	woodland	10
SJ440890	Childwall Golf Club Liverpool 27	Brown Birch Bolete	<i>Leccinum scabrum</i>	fungus	1 Count of Present	18/08/2008	parkland with scattered trees	10
SJ440890	Childwall Golf Club Liverpool 27	Brown Birch Bolete	<i>Leccinum scabrum</i>	fungus	1 Count of Present	24/07/2009	parkland with scattered trees	10
SJ440890	Liverpool, Childwall	Brown Birch Bolete	<i>Leccinum scabrum</i>	fungus		24/09/1998	<i>Leccinum rigidipes</i> ; <i>Betula</i> sp.; soil	11
SJ4489	Liverpool 27: Childwall Golf Course	Brown Birch Bolete	<i>Leccinum scabrum</i>	fungus	6 Count	01/10/2012	unusually uncommon this year, probably due to increased mowing.	14
SJ4489	Liverpool 27: Childwall Golf Course	Brown Birch Bolete	<i>Leccinum scabrum</i>	fungus	1 Count of Present	09/08/2010		12
SJ4489	Liverpool 27: Childwall Golf Course, South Lancashire	Brown Birch Bolete	<i>Leccinum scabrum</i>	fungus	100 Count	19/09/2011	very common throughout	13
SJ440890	Childwall Golf Club Liverpool 27	Slate Bolete	<i>Leccinum duriusculum</i>	fungus	1 Count of Present	05/07/2007	parkland	10
SJ440890	Childwall Golf Club Liverpool 27	Slate Bolete	<i>Leccinum duriusculum</i>	fungus	1 Count of Present	07/10/2006	parkland	10
SJ440890	Childwall Golf Club Liverpool 27	Slate Bolete	<i>Leccinum duriusculum</i>	fungus	1 Count of Present	10/07/2008	parkland	10
SJ440890	Childwall Golf Club Liverpool 27	Slate Bolete	<i>Leccinum duriusculum</i>	fungus	1 Count of Present	22/07/2009	parkland	10
SJ4489	Liverpool 27: Childwall Golf Course	Slate Bolete	<i>Leccinum duriusculum</i>	fungus	1 Count of Present	09/08/2010	under Aspen	12
SJ4489	Liverpool 27: Childwall Golf Course	Slate Bolete	<i>Leccinum duriusculum</i>	fungus	1 Count	22/08/2012	under Aspen	14
SJ4489	Liverpool 27: Childwall Golf Course, South Lancashire	Slate Bolete	<i>Leccinum duriusculum</i>	fungus	30 Count	23/08/2013	Association: <i>Populus tremula</i> ; Substrate: soil; under Aspen at various sites. Fruiting later this year.	15
SJ4489	Liverpool 27: Childwall Golf Course, South Lancashire	Slate Bolete	<i>Leccinum duriusculum</i>	fungus	1 Count	27/06/2011	CHKPQ throughout 100+	13
SJ4287	Woolton Park Road	Wall	<i>Lasiommata megera</i>	insect - butterfly	10-29 Count	19/08/1992		16
SJ4387	Old Sewerage Farm Netherley	Wall	<i>Lasiommata megera</i>	insect - butterfly	2-9 Count	21/08/1992		16
SJ4289	Belle Vale	Blue-tailed Damselfly	<i>Ischnura elegans</i>	insect - dragonfly (Odonata)	present Count	28/08/2007		17
SJ4387	Lee Park Golf Club	Blue-tailed Damselfly	<i>Ischnura elegans</i>	insect - dragonfly (Odonata)	12 Count of Total	30/05/2007		17
SJ48J		Blue-tailed Damselfly	<i>Ischnura elegans</i>	insect - dragonfly (Odonata)	12 Count	30/05/2007		17
SJ435877	Lee Park Golf Course	Broad-bodied Chaser	<i>Libellula depressa</i>	insect - dragonfly (Odonata)	1 Count of Male	June 2006		17

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SJ435877		Broad-bodied Chaser	<i>Libellula depressa</i>	insect - dragonfly (Odonata)		June 2006		30
SJ4387	Lee Park Golf Course	Broad-bodied Chaser	<i>Libellula depressa</i>	insect - dragonfly (Odonata)	3 Count of Total; 3 Count of Male	29/06/2011		17
SJ4487	Netherley Park	Broad-bodied Chaser	<i>Libellula depressa</i>	insect - dragonfly (Odonata)	1 Count of Total	28/04/2011		17
SJ4387	Lee Park Golf Club	Common Darter	<i>Sympetrum striolatum</i>	insect - dragonfly (Odonata)	present Count	01/08/2007		17
SJ4389	Belle Vale	Common Darter	<i>Sympetrum striolatum</i>	insect - dragonfly (Odonata)	1 Count of Total	21/09/2009		17
SJ48J		Common Darter	<i>Sympetrum striolatum</i>	insect - dragonfly (Odonata)	1 Count; 1 Count of Female	01/08/2007		17
SJ4288		Common Emerald Damselfly	<i>Lestes sponsa</i>	insect - dragonfly (Odonata)		August 1994		30
SJ4287	Small pond, Gateacre	Emerald Damselfly	<i>Lestes sponsa</i>	insect - dragonfly (Odonata)	1 Count of Male	1994		17
SJ435877	Lee Park Golf Course	Emperor Dragonfly	<i>Anax imperator</i>	insect - dragonfly (Odonata)	3 Count of Male	05/07/2006		17
SJ4387	Lee Park Golf Club	Emperor Dragonfly	<i>Anax imperator</i>	insect - dragonfly (Odonata)	present Count	01/08/2007		17
SJ4387	Lee Park Golf Club	Emperor Dragonfly	<i>Anax imperator</i>	insect - dragonfly (Odonata)	present Count	11/07/2007		17
SJ48J		Emperor Dragonfly	<i>Anax imperator</i>	insect - dragonfly (Odonata)	1 Count; 1 Count of ovipositing; 1 Count of Female	01/08/2007		17
SJ48J		Emperor Dragonfly	<i>Anax imperator</i>	insect - dragonfly (Odonata)	1 Count; 1 Count of Male	11/07/2007		17
SJ432875	Loopline, Gateacre	Southern Hawker	<i>Aeshna cyanea</i>	insect - dragonfly (Odonata)	1 Count of Male	26/07/2005		17
SJ432875	Loopline, Gateacre	Southern Hawker	<i>Aeshna cyanea</i>	insect - dragonfly (Odonata)	1 Count of Male	30/06/2005		17
SJ4287	Woolton, Reynolds Park	Bats	<i>Chiroptera</i>	terrestrial mammal		01/09/1989		18
SJ4288	Merseyside	Bats	<i>Chiroptera</i>	terrestrial mammal	1 Count	02/08/2011	Sunrise Survey	19
SJ4288	Gateacre, Beechnut Drive	Bats	<i>Chiroptera</i>	terrestrial mammal		15/01/1990		18
SJ48J		Bats	<i>Chiroptera</i>	terrestrial mammal		1990		31
SJ48I		Brown Hare	<i>Lepus europaeus</i>	terrestrial mammal	1 Count of Present	1998		6
SJ48J		Brown Hare	<i>Lepus europaeus</i>	terrestrial mammal	1 Count of Present	1998		6

## The Local Biodiversity Records Centre for North Merseyside

SJ48N		Brown Hare	<i>Lepus europaeus</i>	terrestrial mammal	1 Count of Present	1998		6
SJ48P		Brown Hare	<i>Lepus europaeus</i>	terrestrial mammal	1 Count of Present	1998		6
SJ437893	Wheathill Riding Centre	Common Pipistrelle	<i>Pipistrellus pipistrellus</i>	terrestrial mammal	3 Count; P Count of Roost	01/07/2008	1 roosting on site and 2 visited	3
SJ4287	Reynolds Park (Woolton Park), Woolton, Liverpool, Merseyside	Eastern Grey Squirrel	<i>Sciurus carolinensis</i>	terrestrial mammal	1 Count of Present	1966		21
SJ4287		Eastern Grey Squirrel	<i>Sciurus carolinensis</i>	terrestrial mammal		1966		32
SJ4287	Reynolds Park, Woolton, South Lancashire	Eastern Grey Squirrel	<i>Sciurus carolinensis</i>	terrestrial mammal	1 Count of Adult	23/01/2013		22
SJ439882	Calderstones Park, Liverpool, Merseyside	Eastern Grey Squirrel	<i>Sciurus carolinensis</i>	terrestrial mammal	1 Count	14/04/2004		21
SJ4488	Netherley, South Lancashire	Eastern Grey Squirrel	<i>Sciurus carolinensis</i>	terrestrial mammal	1 Count of Present	16/03/2010		20
SJ4321689058	Huyton Bk	European Water Vole	<i>Arvicola amphibius</i>	terrestrial mammal	1 Count of Present	13/09/2007	Cascade South Area Water Vole Survey 2007 for EA, Feeding remains	23
SJ425880	Beechurst Road, Gatacre, Liverpool	Pipistrelle Bat species	<i>Pipistrellus</i>	terrestrial mammal	1 Count	15/01/1990-17/01/1990	Bat apparently in good health, weighed 5.9g and flew for 20 minutes.	25
SJ426881	Merseyside, Liverpool, Gateacre, Off Grange Lane, Beechurst RD.	Pipistrelle Bat species	<i>Pipistrellus</i>	terrestrial mammal	1 Count of Roosting	15/01/1990	Bat discovered during demolition of garage. Evidence of roost between garage and next door extension, bat appeared injured	24
SJ4287	Merseyside, Liverpool, Gateacre, Cherry Vale	Pipistrelle Bat species	<i>Pipistrellus</i>	terrestrial mammal	60 Count of Roosting	1989 - 1992	No bats present at time of visit, but they have roosted behind soffit for some years. they emerge at the apex and owner has previously counted 60 emerging.	24
SJ4287	Merseyside, Liverpool, Woolton, Reynolds Park	Pipistrelle Bat species	<i>Pipistrellus</i>	terrestrial mammal	<1 Count of in flight	September 1989	Bats seen flying along footpath at top of woolton hill road	24
SJ4288	Merseyside, Liverpool, Gateacre, Beechnut Drive	Pipistrelle Bat species	<i>Pipistrellus</i>	terrestrial mammal	1 Count	15/01/1990	Injured bat found by workmen	24
SJ439879	former Lea Manor High School, Childwall Valley Road	Pipistrelle Bat species	<i>Pipistrellus</i>	terrestrial mammal	1 Count of feeding; 2 Count	10/04/2007		2
SJ439879	former Lea Manor High School, Childwall Valley Road	Pipistrelle Bat species	<i>Pipistrellus</i>	terrestrial mammal	1 Count	11/04/2007		2
SJ439879	former Lea Manor High School, Childwall Valley Road	Pipistrelle Bat species	<i>Pipistrellus</i>	terrestrial mammal	1 Count	22/03/2007		2
SJ439879	former Lea Manor High School, Childwall Valley Road	Pipistrelle Bat species	<i>Pipistrellus</i>	terrestrial mammal	1 Count	23/03/2007		2
SJ4287	woolton	West European Hedgehog	<i>Erinaceus europaeus</i>	terrestrial mammal		April 1973	R.C	26

The following **NEGATIVE RECORDS** were found within the search area. Negative records show where particular species were actively searched for but no evidence of them was found. Negative records do not prove absence. Negative records may be contradicted by positive records. The source for all negative records in the Merseyside BioBank database.

GridRef	Location Name	Common Name	Scientific Name	Group	Abundance or Status	Date	Comment	Source
SJ437893	Pond on site	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	0 Count	05/07/2008-09/07/2008	no evidence found	3
SJ435894	Land at Lakeside Naylors Road	Great Crested Newt	<i>Triturus cristatus</i>	amphibian	0 Count	October 2000	No evidence of Great Crested Newts or any other amphibians however reporter notes that it is likely that Common Frog and Toad use the pond for breeding.	2
SJ435894	Land at Lakeside Naylors Road	Bats	<i>Chiroptera</i>	terrestrial mammal	0 Count of Roost	October 2000	No evidence of Bats, no roost potential.	2
SJ439880	Former Childwall Valley School	Bats	<i>Chiroptera</i>	terrestrial mammal	0 Count	22/03/2007-11/04/2007	No Bats observed during dawn and dusk survey.	2
SJ438881	Former Childwall Valley School	Bats	<i>Chiroptera</i>	terrestrial mammal	0 Count	22/03/2007-11/04/2007	No Bats observed during dawn and dusk survey.	2
SJ443879	Coachmans Cottage	Bats	<i>Chiroptera</i>	terrestrial mammal	0 Count of Roost	13/11/2009	No signs of roosting found.	27
SJ435894	Land at Lakeside Naylors Road	European Water Vole	<i>Arvicola amphibius</i>	terrestrial mammal	0 Count	October 2000	No evidence of Water Voles.	2

Data sources/providers for the records in the table(s) above are given below. For records that are sourced from Merseyside BioBank's database, the type is 'BioBank' and the name of the dataset is given. For records that are sourced from the NBN Gateway, the type is 'NBN' and the name of the data provider is given.

Source key	Dataset or data provider	Type
1	Ad hoc 2010	BioBank
2	EAS Dataset	BioBank
3	Report Harvest 2010 01-03	BioBank
4	BIRDS - LCFS Records	BioBank
5	Liverpool Musuem	BioBank
6	Lancashire Wildlife Trust Dataset	BioBank
7	Phase 1 surveys 1995	BioBank
8	Dave Earl Crassula helmsii	BioBank





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9	RODIS General Howard Harris	BioBank
10	Fungi North Merseyside 2006-2009	BioBank
11	Association of British Fungus Groups MBB Verified	BioBank
12	Tony Carter Fungi 2010	BioBank
13	Tony Carter Fungi 2011	BioBank
14	Tony Carter Fungi 2012	BioBank
15	Tony Carter Fungi 2013	BioBank
16	Butterfly Conservation Butterflies	BioBank
17	Lancashire and Cheshire Fauna Society Odonata	BioBank
18	Liverpool Museum Bats	BioBank
19	BCT NBMP Survey Data	BioBank
20	Dave Earl Mammals to May 2010	BioBank
21	Cheshire rECOrd Overlap	BioBank
22	RODIS Admin	BioBank
23	Environment Agency 2011 - Mammals	BioBank
24	Merseyside & West Lancs Bat Group	BioBank
25	Louise Wisniewski Bats	BioBank
26	Mammal Society	BioBank
27	Report Harvest 2010 07-09	BioBank
28	Environment Agency (Biodiversity staff)	NBN
29	Botanical Society of Britain and Ireland	NBN
30	Dragonfly Recording Network	NBN
31	Derbyshire Biological Records Centre	NBN
32	Biological Records Centre	NBN



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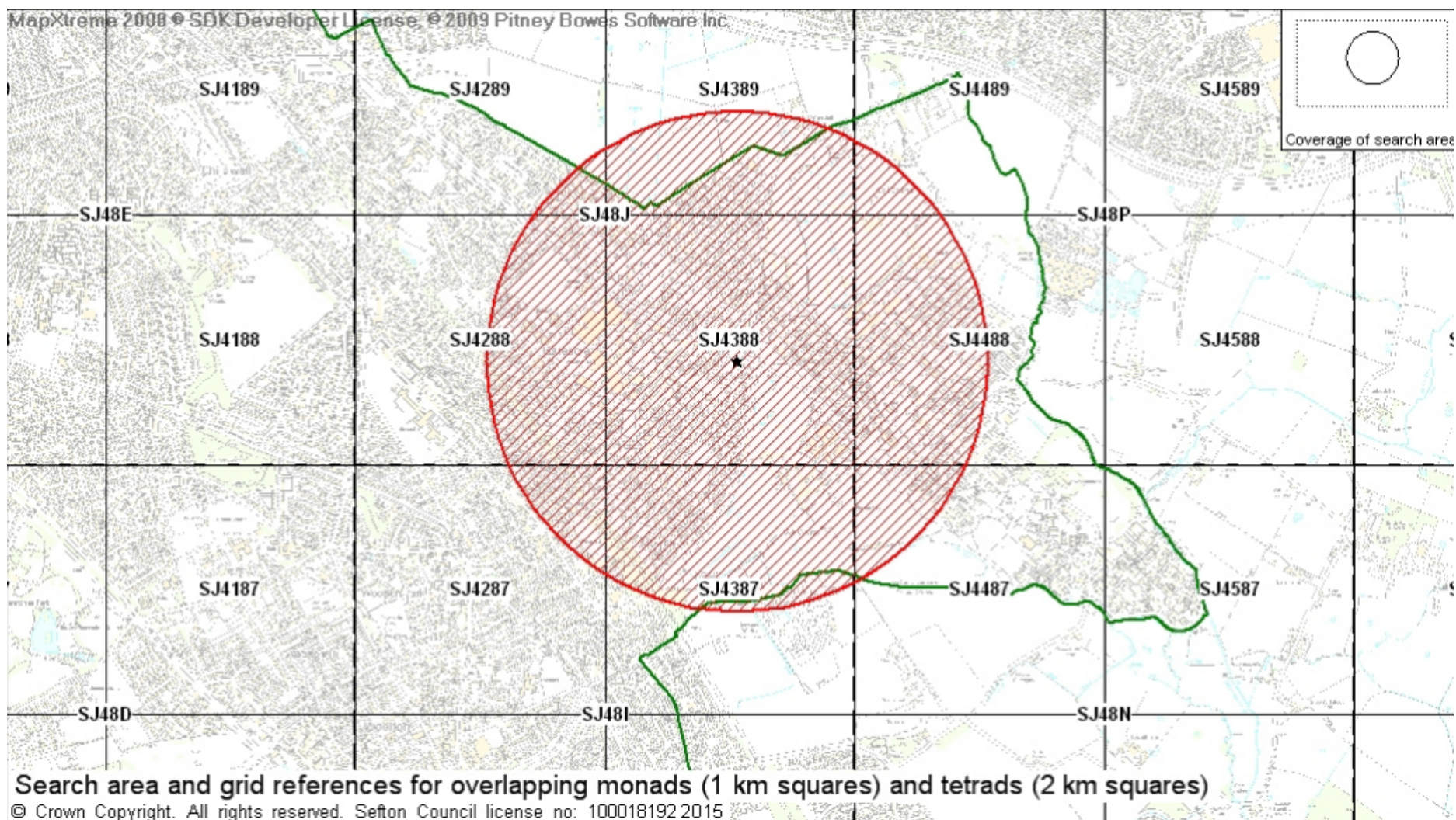
## **Appendix 3: Maps**

The following page(s) include maps to illustrate some of the results of your data request. They should be viewed in the context of the results supplied in the main body of the report.

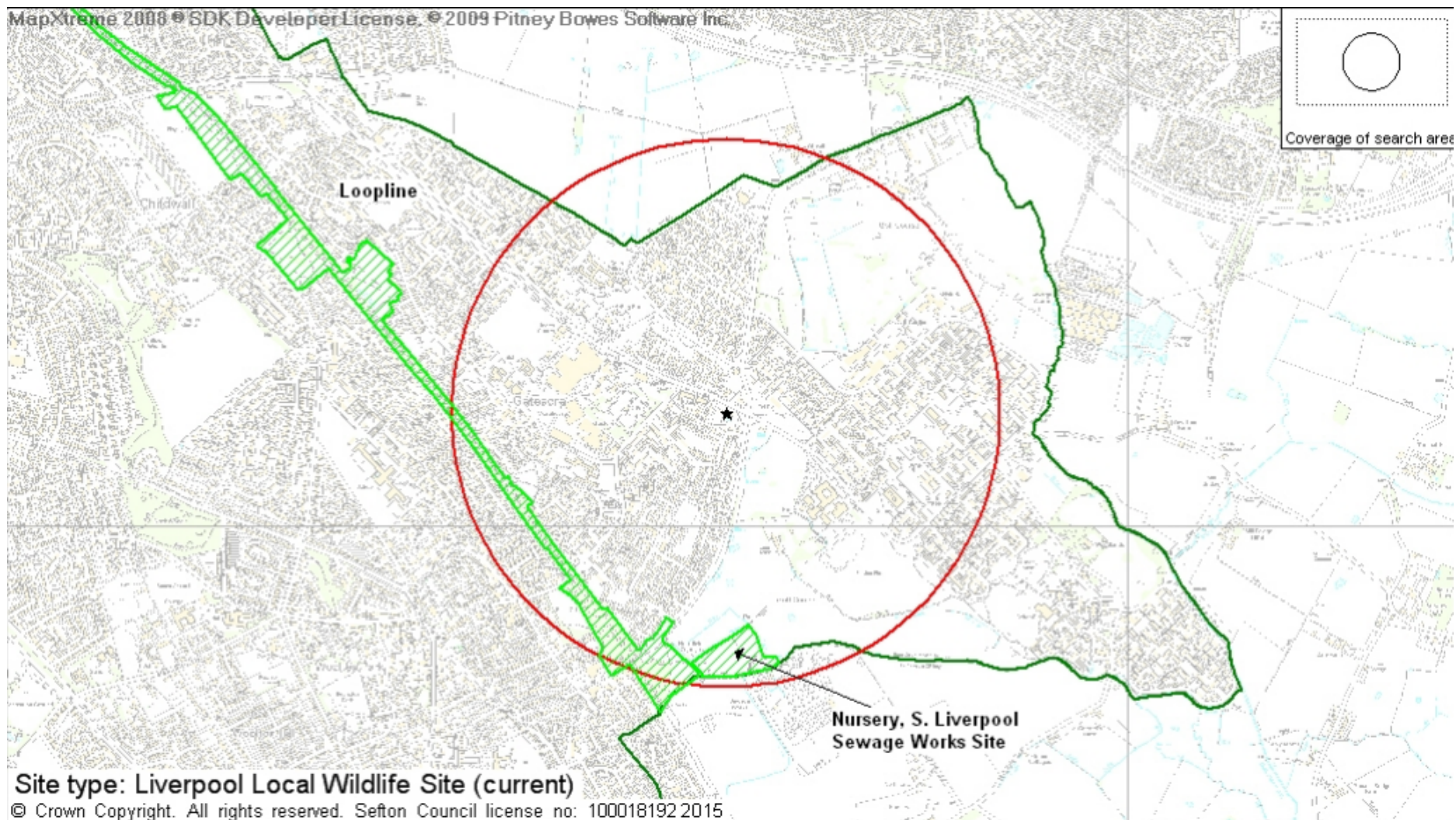
The Ordnance Survey mapping included in the maps provided by Merseyside BioBank under Sefton Council's licence from Ordnance Survey. These maps are provided to assist decision-makers in the effective and sustainable management of land, species and habitats. Ordnance Survey should be contacted directly if any of these maps are to be used in another document.

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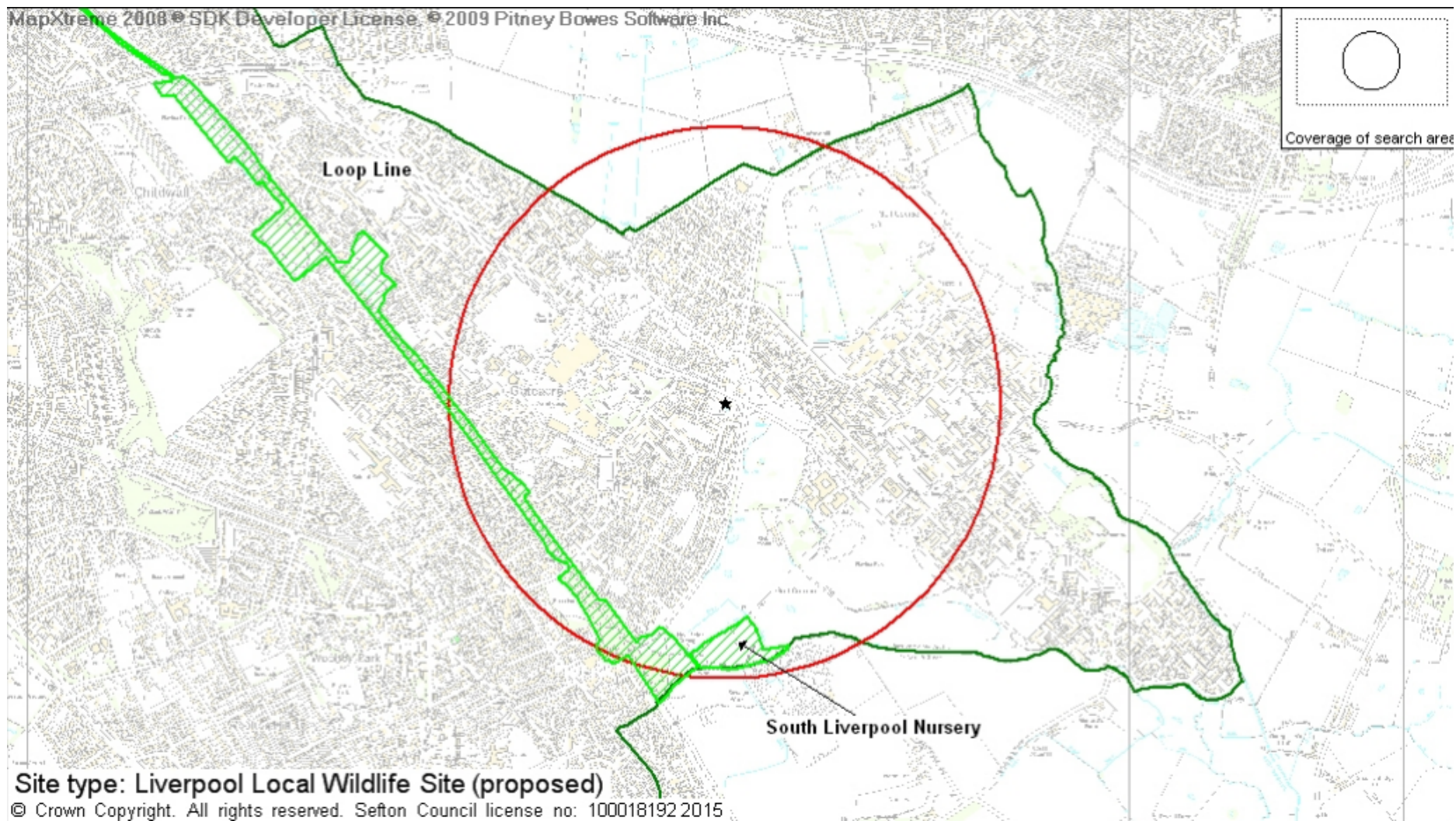






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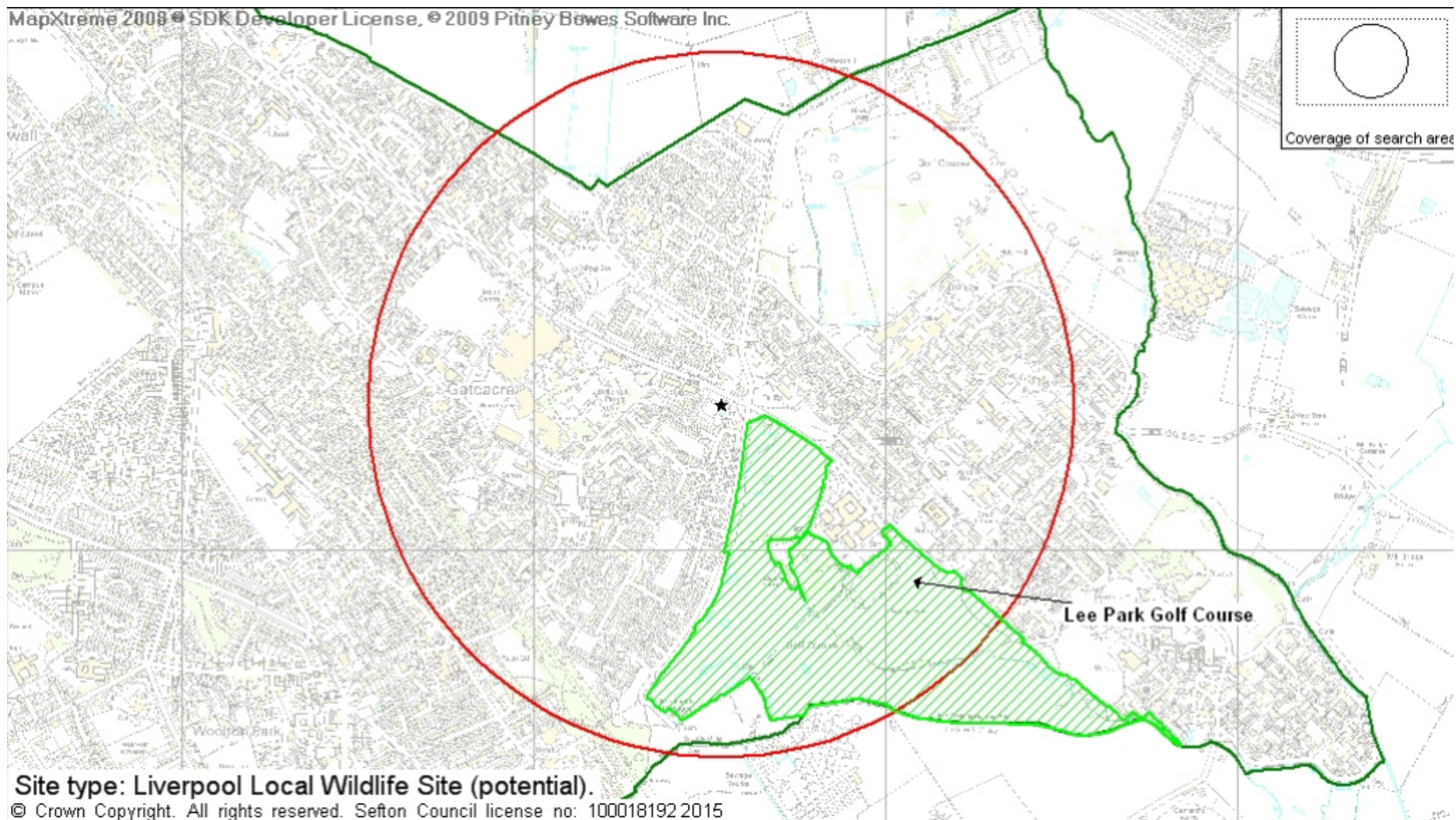
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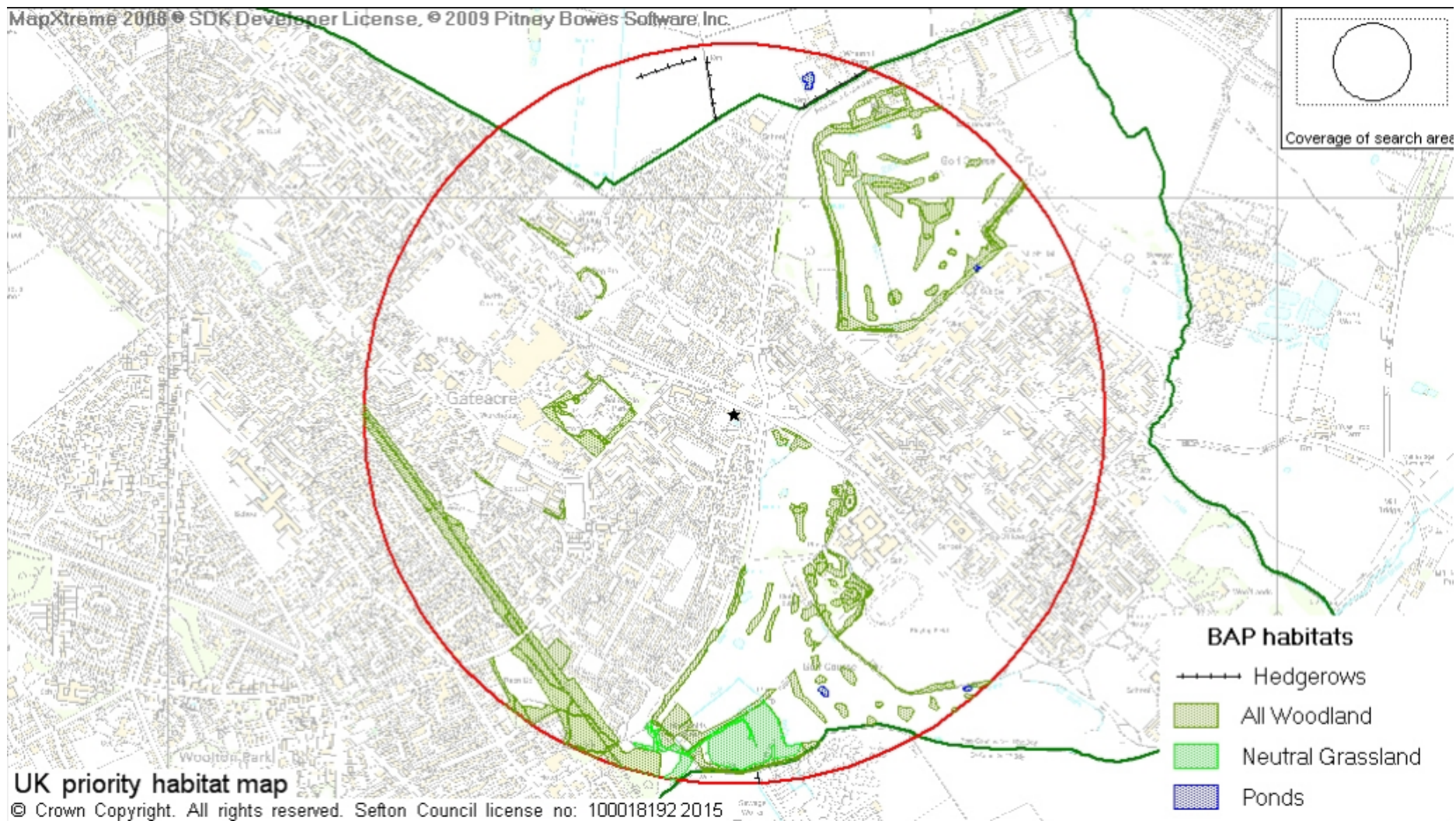


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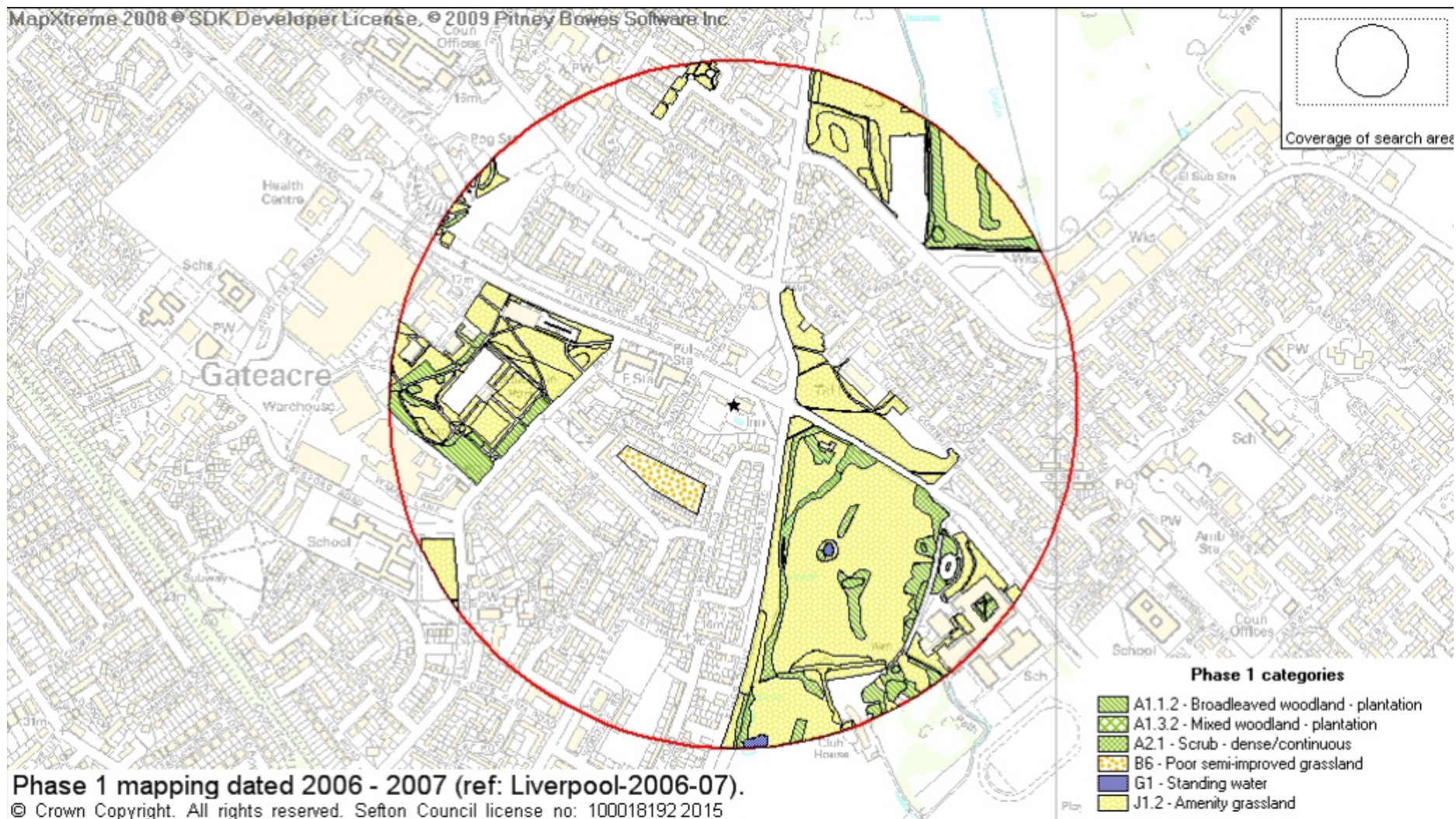
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## **Appendix Five- Species List**

## Extended Phase I Habitat Survey- The Bridge Inn, Childwall

Each grassland species recorded was given an abundance value according to the standard DAFOR scale, where:

D = Dominant  
 A = Abundant  
 F = Frequent  
 O = Occasional  
 R = Rare

Habitat	Scientific Name	Common Name	DAFOR
Dense scrub	<i>Ligustrum ovalifolium</i>	Common Privet	O
	<i>Rubus fruticosus</i> agg.	Bramble	D
	<i>Sambucus nigra</i>	Elderberry	O
Scattered trees	<i>Acer pseudoplatanus</i>	Sycamore	
	<i>Betula pendula</i>	Silver Birch	
	<i>Crateagus monogyna</i>	Hawthorn	
	<i>Populus nigra</i> 'Italica'	Lombardy Poplar	
	<i>Pyrus</i> sp.	Pear	
	<i>Quercus robur</i>	Pendunculate Oak	
	<i>Tilia</i> sp.	Lime	
Poor semi-improved grassland	<i>Lolium perenne</i>	Perennial ryegrass	D
	<i>Bellis perennis</i>	Common Daisy	R
	<i>Holcus lanatus</i>	Yorkshire Fog	O
Tall ruderal	<i>Hedera helix</i>	Ivy	D
	<i>Urtica dioica</i>	Stinging Nettle	D
Standing open water	N/A	N/A	
Fence	N/A	N/A	
Building	N/A	N/A	
Bare ground	N/A	N/A	
Hard standing	N/A	N/A	
Wall	N/A	N/A	