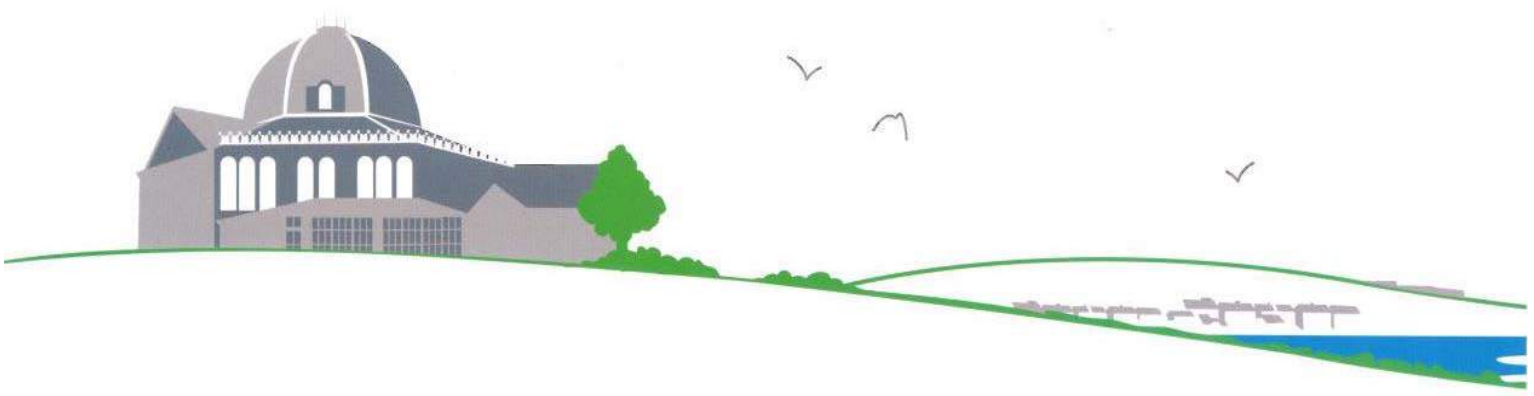
Penny Anderson Associates Ltd
CONSULTANT ECOLOGISTS

MR M MELLOR

STAR BANK, OAKAMOOR

EXTENDED PHASE 1 HABITAT SURVEY AND BUILDING INSPECTION FOR BATS



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This project has been undertaken in accordance with PAA policies and procedures on quality assurance.

Signed:_____

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1. INTRODUCTION

Background

1.1 Penny Anderson Associated Ltd (PAA) was commissioned by Mr Mark Mellor to conduct an Extended Phase 1 Habitat survey, and a building inspection to assess the potential for bat roosts, at a site on Star Bank, Oakamoor, Staffordshire Moorlands. The application site consists of five buildings, two stone barns, and three open steel frame buildings (two of which form part of the same structure). The report was requested to support a planning application proposing the conversion of the stone buildings to housing and the demolition of the steel frame buildings.

1.2 This report presents the findings of the Extended Phase 1 Habitat survey and building inspection for bat roosting potential, and provides recommendations where necessary.

National Planning Policy

1.3 The National Planning Policy Framework (NPPF), published in 2012, provides guidance for local authorities on the content of the Local Plans and is a material consideration in determining planning applications. The NPPF has replaced much existing planning policy guidance, including Planning Policy Statement 9: Biological and Geological Conservation. Briefly, with an overall focus on sustainable development, the NPPF states that developments should aim to engender positive outcomes for biodiversity, with a particular focus on the maintenance and creation of ecological networks. Furthermore, the NPPF also states that any planning proposals for which significant negative impacts on biodiversity cannot be avoided, mitigated or compensated should be refused. The NPPF states that the planning system should contribute to and enhance the natural environment through a range of actions, including:

- Protecting and enhancing valued landscapes, geological interests and soils;
- Recognising the wider benefits of ecosystem services; and
- Minimising impacts on biodiversity and providing net gains in biodiversity where possible, contributing to the Government's commitment to halt the overall decline in biodiversity, including by establishing coherent ecological networks that are more resilient to current and future pressures.

Legislative Context

1.4 A range of international and national legislation has been established in the UK to protect important nature conservation sites and priority species. At the international level, European Union (EU) Directives require individual member states to implement their conservation provisions nationally for the benefit of Europe as a whole. These Directives have been transposed into UK law by the Conservation of Habitats and Species Regulations 2010 (further amended in 2011 and 2012); further details can be obtained from the Joint Nature Conservation Committee (JNCC) web site at www.jncc.defra.gov.uk.

1.5 Other international conventions include: the Bern Convention on the Conservation of European Wildlife and Natural Habitats (1979), which requires the maintenance of populations of wild flora and fauna, giving particular protection to endangered and vulnerable species; and the Bonn Convention on the Conservation of Migratory Species of Wild Animals (1979), which requires the protection of migratory species throughout their entire range. The above conventions are implemented in England and Wales via the Wildlife and Countryside Act (WCA) (1981) (as amended) and Countryside and Rights of Way (CRoW) Act 2000. This legislation also protects important habitats and sites such as Sites of Special Scientific Interest (SSSI).

1.6 At the national level, the UK Post-2010 Biodiversity Framework published in 2012 is the Government's response to the Convention on Biological Diversity (2010). It describes the UK's biological resources, commits a detailed plan for the protection of these resources within the UK's devolved framework across England, Wales, Scotland and Northern Ireland. The document identifies future priorities for nature conservation and adopts a more strategic approach, including ecosystem services and sustainability alongside biodiversity. Despite administrative changes following devolution, there is still an underlying objective of protecting and enhancing a range of priority species and habitats, often still based on the objectives and classifications of the original UK Biodiversity Action Plan. Biodiversity 2020 is England's national biodiversity strategy. Building on the Natural Environment White Paper published in 2011, this provides a means of delivering the international and EU commitments to biodiversity. Under Biodiversity 2020, Priority Species and Habitats referred to are those of 'Principal Importance' for the conservation of biodiversity in England as listed on Section 41 (England) of the Natural Environment and Rural Communities (NERC) Act 2006 (hereafter referred to as 'Section 41' species/habitats).

Legislative Context – Protected Species

Bats

1.7 All wild species of bat are protected under the Wildlife and Countryside Act (WCA) 1981, which has also been amended by later legislation, including the Countryside and Rights of Way (CRoW) Act 2000 and this legislation is applicable to England and Wales.

1.8 Bat species are also listed under Annexes IIa and IVa of the EC Directive on the Conservation of Natural Habitats and of Wild Fauna and Flora, also known as the 'Habitats Directive'. Inclusion on Annex IVa means they are consequently identified as European Protected Species (EPS) and protected under the Conservation of Habitats and Species Regulations 2010.

1.9 Under this legislation it is an offence to kill or injure a bat, disturb a bat whilst it is roosting, and obstruct, damage or destroy a breeding site or resting place, whether the animal is in occupation or not,. There are additional offences relating to possession, control and sale of a live or dead bat or part of such an animal.

1.10 In addition, seven native British bat species including the soprano pipistrelle (*Pipistrellus pygmaeus*) and the brown long-eared bat (*Plecotus auritus*), that are frequently found in buildings, are listed as a 'Priority Species' under the 2011 biodiversity strategy for England, Biodiversity 2020: A strategy for England's wildlife and ecosystem services, under the 2012 UK Post-2010 UK Biodiversity Framework. These Priority Species are also referred to as 'species of principal importance' for the conservation of biodiversity in England and Wales within Section 74 of the CRoW Act 2000, and Sections 41 (England) and 42 (Wales) of the Natural Environment and Rural Communities (NERC) Act 2006.

1.11 Section 11 of the National Planning Policy Framework (NPPF) states that the planning system should contribute to and enhance the natural and local environment by minimising impacts on biodiversity and providing net gains in biodiversity where possible. The NPPF also includes the requirement to contribute to the Government's commitment to halt the overall decline in biodiversity and to promote the reservation, restoration and re-creation of priority habitats, ecological networks and the protection and recovery of priority species populations, linked to national and local targets. Reference is made to Circular 06/2005 Biodiversity and Geological Conservation - Statutory Obligations and Their Impact within the Planning System in respect of statutory obligations for biodiversity and geodiversity conservation.

1.12 Local authorities in England are required to ensure that where significant harm resulting from development cannot be avoided (through locating on alternative sites with less harmful impacts), adequately mitigated or, as a last resort, compensated for, planning permission is refused. The commitment to preserving, restoring or enhancing biodiversity is further emphasised for England and Wales in Section 40 of the NERC Act 2006.

Great Crested Newts (GCN)

1.13 Great crested (or warty) newts (*Triturus cristatus*) (GCN) are protected under the WCA 1981, which has been also amended by various legislation including the CRoW Act 2000 and the Conservation of Habitats and Species Regulations 2010, and this legislation is applicable to England and Wales. Great crested newts are listed on Schedule 5 of the WCA and are, therefore, subject to some the provisions of Section 9 which, with the amendments, make it an offence to:

- Intentionally or recklessly disturb a GCN while it is occupying a structure or place which it uses for shelter or protection (S9:4b).

- Intentionally or recklessly obstruct access to any structure or place used for shelter or protection by a GCN (S9:4c).

Breeding Birds

1.14 All wild species of breeding birds and their nests are protected under Part 1 of the Wildlife and Countryside Act (WCA) 1981, as amended by later legislation including the Countryside and Rights of Way (CRoW) Act 2000. This protects wild birds from being killed or injured and protects their active nests, eggs and dependant young from damage or destruction.

1.15 Part 1 (Section 1:5) of the WCA (amended by the CRoW Act 2000) refers to specific birds listed on Schedule 1 and affords additional protection from disturbance to these species while they are nesting, including their nests, eggs and young. Schedule 1 species include barn owl, regularly found nesting and roosting in farm buildings.

1.16 A more detailed summary of the legislation in relation to bats and their roosts, GCN and breeding birds is presented in Appendix I.

2. METHODS

Desk Study

2.1 A data request was made to Staffordshire Ecological Record (SER), to provide information on protected species and sites within 1.5km of the site boundary. In addition, on-line resources such as Multi-Agency Geographic Information for the Countryside website '*www.magic.gov.uk*', Nature on the Map "*www.natureonthemap.naturalengland.org.uk*" and the National Biodiversity Network (NBN) Gateway were utilised to obtain details of designated conservation sites and protected/notable species.

Field Survey

Extended Phase 1 Habitat Survey

2.2 An Extended Phase 1 Habitat survey (Ecological Appraisal) of the application site was undertaken on 27 September 2016. The survey method followed the standard JNCC (Joint Nature Conservancy Council 2010) technique for classifying and mapping British habitats. The survey aimed to provide a record of habitats that are present within the site and to further investigate those that are likely to be ecologically important. The survey included a general assessment for the presence or potential presence of protected species, noting any areas of suitable habitat and the location and type of any field signs recorded. In particular, this component of the field survey focused on the following species: bats, badger (*Meles meles*), GCN, reptiles and breeding birds.

Inspection for Bat Roosting Potential

2.3 The building inspections were completed by Hazel Robson (MCIEEM[1]), Natural England survey licence holder in respect of bats and their roosts (Bat Licence Level 2 Registration Number: 2015-10504-CLS-CLS). Survey methods followed guidance published by the Bat Conservation Trust (Collins, 2016).

2.4 The building inspection survey was undertaken during daylight hours on 27 September 2016 with the aid of close-focusing binoculars (Avian 8x42: 6.5°), endoscope (RIGID Micro-explorer), ladders and powerful torches (Clulite 1M candle-power) as required.

2.5 The external inspections involved walking slowly around each of the buildings and visually inspecting features such as gaps around door frames, gaps under felt/lead flashing, gaps at the wall plates and eaves, any fascia boards, barge boards and soffits, and areas of missing mortar, for any evidence of bat use. These features were also assessed for their potential to provide crevices for roosting bats or access points to other parts of the building, which may also be used for roosting e.g. hay lofts.

2.6 The internal inspection involved systematically searching and examining all parts of the buildings with potential to support roosting bats and searching for their signs. Such signs of bats that were looked for included the presence of bat droppings, staining on crevices by fur oils or urine, prey residues (e.g. moth and butterfly wings) as well as the bats themselves. Potential

[1] *Member of the Chartered Institute of Ecology and Environmental Management*

access points noted included features such as missing brick-work, tiles or mortar, gaps within the brick-work, and any cavities or dark sheltered areas within the building.

2.7 The structure and orientation of the buildings were also noted, including roof structure and materials, wall construction and likely presence of cavity or rubble-filled walls and internal exposed beams, which may act as night roosting or feeding roost sites for some species.

2.8 The buildings were assigned a roost potential category, based on their suitability for supporting bat roosts (see Table 1). These criteria have been adapted from the Bat Surveys Good Practice Guidelines (Collins 2016), as well as through professional experience.

2.9 At the same time any signs of nesting birds were also recorded. An inspection of the exterior and interior of all buildings on the site was undertaken to identify any active birds' nests. The buildings were carefully searched and any nests were inspected where possible to identify the presence of any eggs or chicks. The species of bird was determined where possible.

Table 1 Building Assessment Criteria for Bat Roosts

Roost Potential Category	Category Description	Indicator
Confirmed Roost	Building with evidence of current use by bats i.e. confirmed roost.	• Sighting/hearing of bats (including emergence). • Presence of fresh droppings/staining.
	Building with evidence of recent use by bats.	• Small numbers of old droppings/old staining, smoothing and lack of cobwebs. • Roosts identified by personal communication from reliable source (e.g. property owner).
High	Building has high potential to support bat roost(s).	• Buildings of early or pre 20th century origin with numerous access points for bats e.g. gaps under eaves, loose lead flashing and/or roof tiles. • Agricultural buildings of traditional, stone or timber construction and/or with exposed large wooden beams (>200mm thick) and mortise joints, cracks and holes. • Large and complicated roof voids, with unobstructed flying spaces. • Roof warmed by the sun, especially south facing roofs, free of strong draughts. • Undisturbed roof spaces. • Weatherboarding and/or hanging tiles with gaps. • Buildings in proximity to each other providing a variety of roosting opportunities. • Within 200m of good foraging habitat, particularly trees, parkland, woodland or waterbodies. • Well connected to wider landscape through presence of continuous linear features such as hedgerows, watercourses, farm-tracks etc.
Moderate	Building has moderate potential to support bat roost(s)	• Buildings with some of the above features but are considered to be less suitable on account of their age, location and disturbance levels.
Low	Building has low potential to	• Modern well maintained buildings with few or no access points for bats.

Roost Potential Category	Category Description	Indicator
	support bat roost(s)	• Small cluttered roof space. • Buildings comprised predominantly of prefabricated steel and sheet materials. • Roof sections with a dense cover of cobwebs and no sections of clean ridge board. • High levels of regular disturbance • Buildings with exposed roosting features which are open to the elements. • Location with few or no mature trees, parkland, woodland or water features and isolated due to a lack of commuting routes.
Negligible	Building has little or no potential to supports bat roost(s)	• Buildings with no features that could be utilised by bats for roosting.

3. RESULTS

Desk Study

3.1 The results of the desk study are provided in Appendix II, with a summary of the findings below.

Designated Sites

Statutory Designated Sites

3.2 Bath Pasture SSSI is located 65m to the south-west of the site. The site is within the SSSI Impact Risk Zone.

Non-Statutory Designated Sites

3.3 No non-statutory designated sites are located within the 2km search area of the site.

Protected Species

Bats

3.4 Twenty-eight bat records were provided, these were primarily of common pipistrelle bats but also included *Myotis* and *Nyctalus/Eptesicus* species. Twelve of the records were dated prior to year 2000 and the majority of records provided four-figure grid reference only, and therefore did not aid identification of potential roosts in the vicinity with any accuracy.

Badger

3.5 A total of 27 badger records were provided, accurate gird references were not provided in order to keep the records confidential.

Birds

3.6 Six records of barn owl were provided, including three records in 2010. The records pertained to Oakamoor and Cotton.

3.7 Other species of note included peregrine, kingfisher, golden plover and hobby[2].

Amphibians

3.8 Nine records of great crested newts were returned within the search area, all to the east. The closest record was 950m from the site.

[2] *Common names only are used in this text, please see Appendix II for scientific names of species*.

3.9 A total of 58 records of common toad were reported 1.4km to the south-east, although 40 of these are at the same location (Eidlow Farmhouse). The closest record was 700m to the south-east of the site.

Reptiles

3.10 Two records of slow worm were provided, the closest was 1300m to the south-west of the site.

3.11 Twenty-eight records of *Natrix natrix* were provided 1.4km to the south-east, though 11 are in the same place (Eidlow Farmhouse again). The closest record was 350m to south-east, although record is from 1987. The nearest contemporary record (last 15 years) was 750m to the south, from 2004.

3.12 Two records of adder were returned, although both from over 35 years ago. The closest at 900m to the south-west of the site.

Other Species

3.13 28 records of bluebell were returned, scattered within the 2km search boundary, the largest concentration was to the West at 1.1km away. The closest record was 400m to the east (Ramshorn Common).

Field Survey

Habitats

3.14 Four main habitats were recorded on the site: stone built and steel framed buildings, hardstanding with ruderal species, species-poor semi-improved grassland, and tall ruderal. Adjacent to the site was further species poor semi-improved grassland, a species-poor hedge and a pond. These habitats are described in more detail below with the Phase 1 map (Figure 1) and botanical species lists (Appendix III).

3.15 The site is located immediately adjacent to a large tract of broad-leaved woodland, Ramshorn Common, to its east. The remaining surrounding land consisted of improved grassland and semi-improved grassland at the time of survey.

Buildings

3.16 Two small stones barns, with a small courtyard between them, were located on the eastern boundary of the site. The remaining buildings were open, steel-framed buildings. B6 had collapsed, a large amount of straw bails were laid on the ground with the steel corrugated tins from the roof laid on top of them.

3.17 The location of each building is presented in Figure 1 and they are described in more detail in relation to bat potential in the following section (paragraph 3.25).

Hardstanding with Ruderal Species

3.18 The courtyard between the buildings consisted of concrete hardstanding which, due to lack of use, had become colonised primarily by mosses but also other ruderal species such as

willowherbs, creeping buttercup, common nettle and grasses such as red fescue and Yorkshire fog[3].

Species Poor Semi-Improved Grassland

3.19 Small patches of unmanaged semi-improved grassland were located in amongst the buildings and at the edges of the site. The sward had abundant cock's-foot with frequent red fescue and Yorkshire fog. In addition creeping buttercup and broad-leaved dock were frequent and selfheal was occasional.

3.20 Some species indicative of less improved soils were present in the grassland adjacent to the hedge and included ribwort plantain, common hogweed and common knapweed.

Tall Ruderal

3.21 The tall ruderal vegetation was recorded in various locations around the site, in particular at the edges of the grassland patches and adjacent to the hedgerow, buildings and walls, including rosebay willowherb, common nettle, bramble and broad-leaved dock.

Species-Poor Hedge

3.22 A short section of native species-poor hedge is located at the entrance of the site adjacent to a patch of grassland and a pond. This was dominated by hawthorn and blackthorn.

Pond

3.23 A small bulrush-dominated pond is located within approximately 30m of the buildings to be converted/demolished. It was approximately 25m^2. This pond was dry at the time of survey but did appear to have held water earlier in the year. Ephemeral ponds can provide optimal habitats for amphibians. In addition, the grassland surrounding the pond provides optimal terrestrial habitat.

Protected Species

Bats

3.24 There were five buildings within the site, for ease of reference numbered B1 to B5. A summary of the key points in relation to bats is provided below and a more detailed description of the assessment is provided in Appendix IV.

3.25 B1 and B2 were considered to have potential for use by roosting bats. Both had thick stone walls (approx 18") with deep crevices and cavities within the wall structure, accessible to bats via gaps in the mortar and also between the timbers of the wooden door lintels as shown in plates 3 and 4. These provided potential roost features suitable for crevice dwelling bat species such as pipistrelles.

3.26 B1 had a roof of corrugated asbestos which left the ridge beam wholly exposed, with no sheltered space in which bats could hide, and the roof was unlined. There were also no obvious

[3] *Common names only are used in this text, please see Appendix III for scientific names of species.*

gaps at the joints in the timbers of the two king posts supporting the roof. Although the internal space was of a size and structure typically suitable for species such as brown long-eared bats, the building lacked the actual roost features that could be used.

3.27 The roof of B2 was in a very poor state of repair, with large holes in both pitches where tiles had fallen (see plate 6), although one pitch was still partially lined with bitumen felt. There were gaps that could be used by crevice dwelling bats between the uneven surfaces of the remaining tiles and also between the tiles and lining felt. The internal space of this barn was open to the elements and did not provide conditions suitable for use by species such as brown long-eared bats.

3.28 B3, B5 and B5 were large partially open-sided barns with breezeblock walls and corrugated asbestos roofs supported by a steel framework. They lacked any suitable holes or crevices that could be used by bats.

3.29 No bat droppings, feeding remains or other evidence of bat presence were found in any of the buildings.

3.30 The habitats within and adjacent to the site provide suitable foraging and commuting habitat for bats, with little disturbance from artificial lighting. In particular the site is located adjacent to a large tract of broad-leaved woodland which would provide foraging and commuting resources, and possibly roosting sites.

Birds

3.31 Several birds nests were identified within the buildings, barn swallow (*Hirundo rustica*) nests were found in B1 and were still active at the time of survey within B3. In addition, blackbird (*Turdus merula*) and wren (*Troglodytes troglodytes*) nests were found within the stone barn walls.

3.32 No evidence of barn owl (*Typha alba*) was identified.

Great Crested Newt (GCN)

3.33 The presence/absence of GCN within the pond adjacent to the site could not be confirmed during the site visit.

3.34 On reviewing the OS mapping and aerial photographs, there do not appear to be any additional ponds within 250m of the site; however, one pond located approximately 340m to the east of the site, and a woodland pond approximately 340m to the south-west of the site were noted. The nearest desk study record of GCN is 950m to the east of the site.

3.35 Due to the isolated location of the pond, the risk of GCN being present is considered low, however, this cannot to ruled out. Other amphibians, such as common frog (*Rana temporaria*) and smooth newt (*Lissotriton vulgaris*) may be present.

4. DISCUSSION AND RECOMMENDATIONS

Evaluation of Habitats and their Function for Wildlife

4.1 The habitats recorded surrounding the buildings were common, widespread habitats typical of a rural farm location. These habitats are of negligible conservation value and their loss would not cause a change in the conservation value of wildlife species.

4.2 The buildings themselves provide nesting opportunities for birds and potentially for roosting bats. Development of these buildings could result in the loss of nesting sites and bat roosts and could therefore affect the conservation status of bats local to the site. This is discussed in more detail below.

Protected Species

Bats

4.3 Of the five buildings on site, only the two stone barns (B1 and B2) were considered to provide suitable roosting habitat for bats. Deep crevices and cavities in the stone walls of both buildings and gaps between the roof tiles of B2 provided potential roost features suitable for use by crevice dwelling bat species. Although the internal spaces of these types of barns would be generally suitable for species such as brown long-eared bats, the asbestos roof structure of B1 resulted in a lack of the actual roost features that could be used and the dilapidated condition of B2 provided insufficient shelter from wind and rain, therefore it was considered unlikely that this species would be present.

4.4 A summary of the roost potential and associated requirement for further investigation are provided in the table below.

Table 2 Bat Roost Potential and Associated Requirement for Further Investigation

Building	Description	Assessed Roost Status	Further Survey Required
B1	Single-storey stone barn with asbestos roof	High potential	Yes
B2	Two-storey stone barn with clay tile roof.	High potential	Yes
B3	Steel-framed warehouse type barn with breezeblock walls and asbestos roof.	Negligible potential	No
B4	Steel-framed open-sided barn with breezeblock walls and asbestos roof.	Negligible potential	No
B5	Steel-framed open-sided barn with breezeblock walls and asbestos roof.	Negligible potential	No

4.5 If roosting bats are present, the conversion of the barns for residential use could result in disturbance or harm to bats and destruction of roosts, which would be an offence under current wildlife legislation. Further survey will be required to confirm presence/likely absence of roosting bats so that full impacts can be assessed and, if necessary, an appropriate mitigation strategy devised.

4.6 Surveys should be carried out by suitably experienced ecologists and undertaken in line with good practice guidelines published by the Bat Conservation Trust. For buildings with High

Potential currently this would entail a series of three dusk emergence or dawn re-entry surveys during the bat active season, which is May to September inclusive, with at least two of the visits completed before the end of August (Collins 2016). A team of three surveyors would be required to provide adequate coverage of the two barns.

Birds

4.7 The buildings showed evidence of use by nesting birds, namely barn swallow, blackbird and wren. As barn swallows return to the same nesting site each year, it is likely that they will return in future years, in addition, it is likely that other bird species will continue to use the buildings to nest.

4.8 It is recommended that building works/demolition is not undertaken during the period March to October to minimise the risk of destroying active bird's nests. If this is not possible, it is recommended that an ecologist inspects the buildings for nests prior to works/demolition. If active nests are found, the works/demolition to the building must be delayed until the nest is complete. In some cases the nest may be able to be worked around if it is cordoned off appropriately. As an additional measure, it may be possible to minimise the risk of nesting birds prior to the onset of the nesting season (no later than early February), by closing off access points to the buildings and/or removing the potential of nests being built in typical locations, such as ledges and gaps in walls. If this measure is undertaken, caution must be taken to ensure that any potential bat roost entry points are not obstructed. It should be noted that this measure is only likely to reduce the risk of nests, and it is unlikely to completely exclude bird nesting.

4.9 If possible it is recommended to incorporate artificial nesting sites within the newly built/converted structures to compensate for the loss of nesting sites within the buildings. These could take the form of Schwegler nest boxes.

Great Crested Newt

4.10 The bulrush-dominated pond near the site is considered to be isolated from other ponds in the vicinity and, as such, the likelihood of GCN being present is reduced.

4.11 It is not considered necessary to conduct a full GCN survey of the pond in the first instance; as an alternative, it is recommended that an eDNA test is conducted of the pond in April 2017 to establish presence/absence. This would be dependant upon the pond refilling with water by this time. eDNA tests can be conducted from April to June (inclusive), however, conducting the test earlier in the season allows more time for additional surveys or to produce a mitigation strategy if needed.

Conclusion/Summary

4.12 The following ecological constraints to the proposed development works have been identified. These constraints will require further survey and may affect the timings of works.

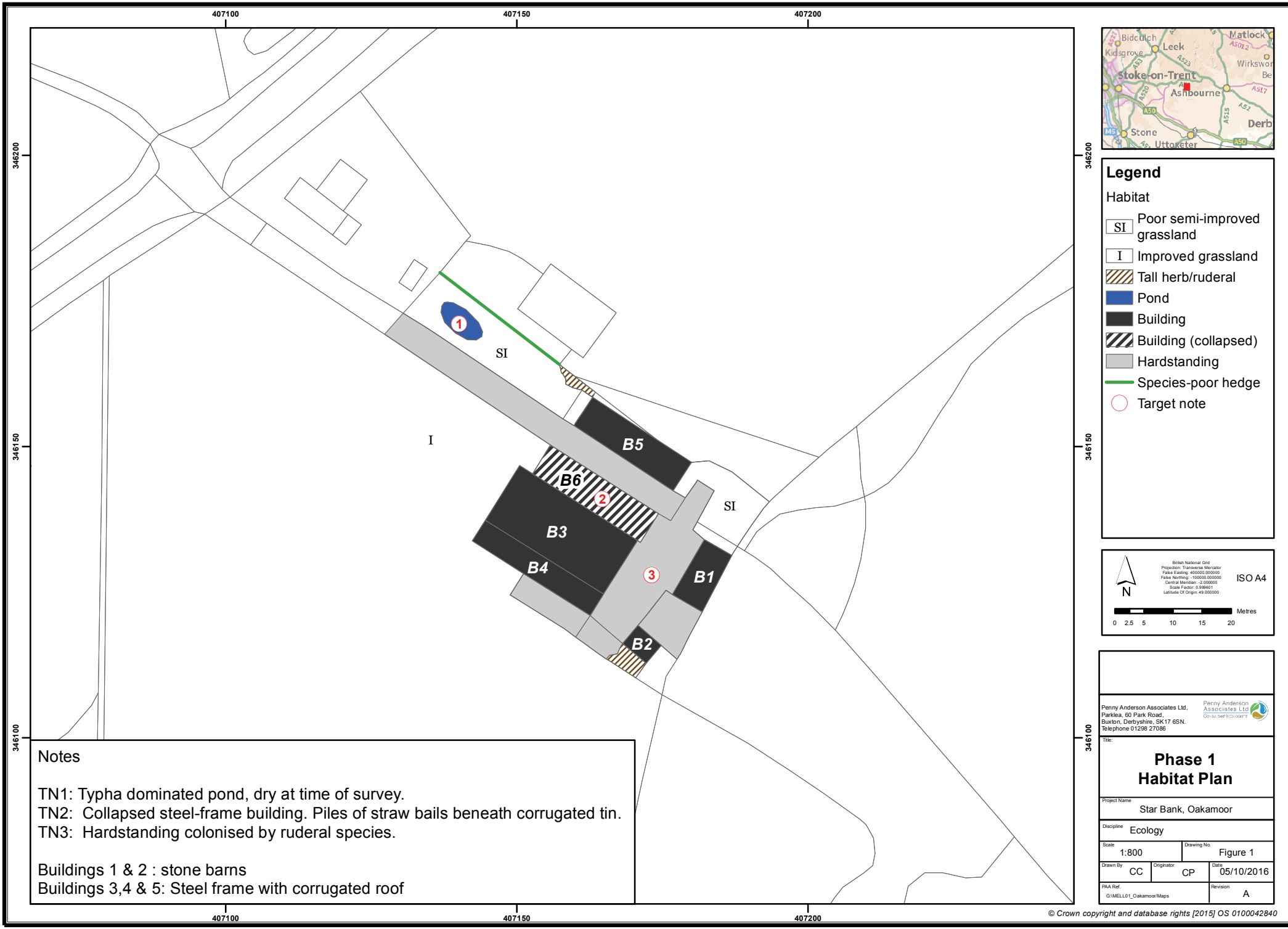
- Potential bat roosts in stone barns (B1 and B2);
- Breeding bird potential in majority of buildings; and
- Potential harm to GCN if found to breed in nearby pond.

5. REFERENCES

Collins, J (ed), 2016. *Bat Surveys for Professional Ecologists: Good Practice Guidelines* (3rd ed). Bat Conservation Trust, London

Joint Nature Conservation Committee, 2010. *Handbook for Phase 1 Habitat Survey – a technique for environmental audit.* Joint Nature Conservation Committee (revised edition 2010).

FIGURE



Notes

TN1: Typha dominated pond, dry at time of survey.
TN2: Collapsed steel-frame building. Piles of straw bails beneath corrugated tin.
TN3: Hardstanding colonised by ruderal species.

Buildings 1 & 2 : stone barns
Buildings 3,4 & 5: Steel frame with corrugated roof

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Title:

Phase 1 Habitat Plan

Project Name	Star Bank, Oakamoor
Discipline	Ecology
Scale	1:800
Drawing No.	Figure 1
Drawn By	CC
Originator	CP
Date	05/10/2016
PAA Ref.	G:\MELL01_Oakamoor\Maps
Revision	A

PLATES

Plate 1 Overview of buildings from site entrance

Plate 2 Building 1 from south

Plate 3 Building 1, showing multiple entry points to wall cavity

Plate 4 Building 2 from south, showing gaps in stonework

Plate 5 Corrugated roof of Building 1, with damaged roof of Building 2 visible at right of picture

Plate 6 Damaged roof of Building 2 providing only very limited shelter

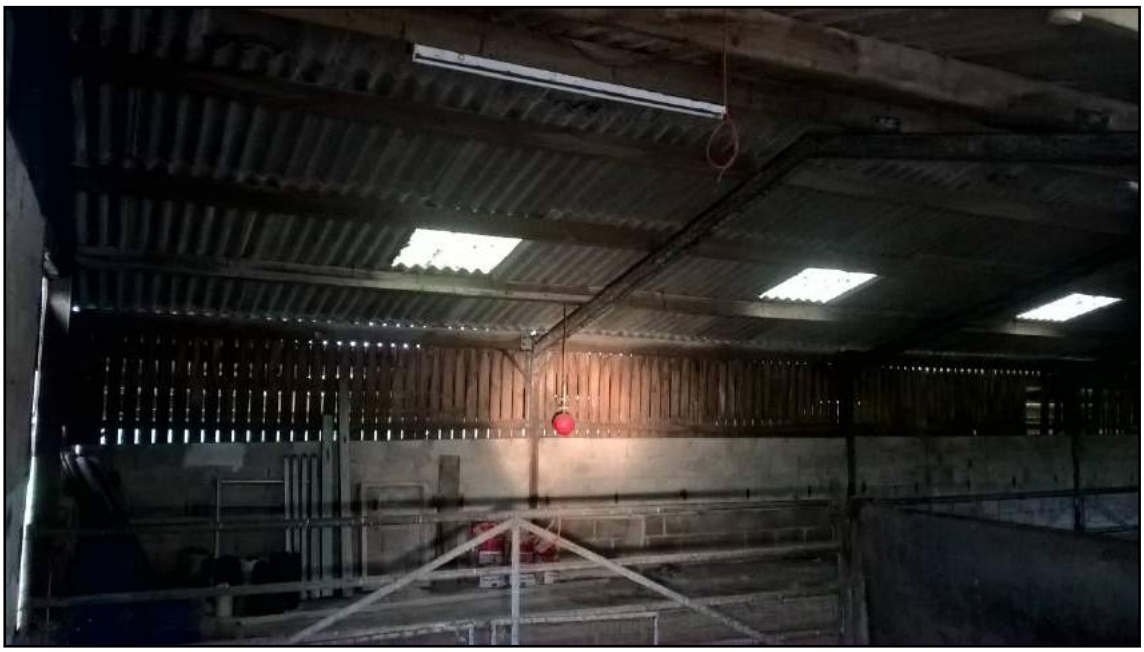


Plate 7 Interior of Building 3 showing open structure and corrugated roof

Plate 8 Exterior of Building 4

Plate 9 Overview of Building 5

Plate 10 Courtyard between buildings

APPENDICES

APPENDIX I

Legislative Context

Appendix I Legislative Context

Introduction

The text given below provides a brief summary of the legislation in relation to the species or species group in England and Wales. The original Acts, Regulations and any amendments should be referred to for the precise wording.

Bats

All wild species of bat are protected under the Wildlife and Countryside Act (WCA) 1981, which has also been amended by later legislation, including the Countryside and Rights of Way (CRoW) Act 2000 and the Conservation of Habitats and Species Regulations 2010, and this legislation is applicable to England and Wales. Bats are listed on Schedule 5 of the WCA and are, therefore, subject to some the provisions of Section 9 which, with the amendments, make it an offence to:

- Intentionally or recklessly disturb a bat while it is occupying a structure or place which it uses for shelter or protection (S9:4b).

- Intentionally or recklessly obstruct access to any structure or place used for shelter or protection by a bat (S9:4c).

There are additional offences in relation to buying and selling (S9:5) any live or dead animal of this species or anything derived from them.

Bat species are also listed under Annexes IIa and IVa of the EC Directive on the Conservation of Natural Habitats and of Wild Fauna and Flora, also known as the 'Habitats Directive'. Inclusion on Annex IVa means they are consequently identified as European Protected Species (EPS) and protected under the Conservation of Habitats and Species Regulations 2010.

The Conservation of Habitats and Species Regulations 2010 state that a person commits an offence if they:

(a) deliberately capture, injure or kill any wild animal of an EPS,

(b) deliberately disturb wild animals of any such species, in such a way as;

  (i) to impair their ability to survive, to breed or reproduce, or to rear their young, or

  (ii) in the case of animals of a hibernating or migratory species, to hibernate or migrate, or

  (iii) to affect significantly the local distribution or abundance of the species to which they belong;

(c) deliberately take or destroy the eggs of such an animal, or

(d) damage or destroy a breeding site or resting place of such an animal.

Under these Regulations it is an offence to damage or destroy a breeding site or resting place whether the animal is in occupation or not, and protection extends to all life stages of the animal in question. There are additional offences relating to possession, control and sale of a live or dead bat or part of such an animal.

In addition, under UK's Biodiversity Action Plan (BAP), seven native British bat species, including the soprano pipistrelle (*Pipistrellus pygmaeus*) and the brown long-eared bat (*Plecotus auritus*), that are frequently found in buildings, are listed as a 'Priority Species'. UKBAP Priority Species are also referred to as 'species of principal

importance' for the conservation of biodiversity in England and Wales within Section 74 of the CRoW Act 2000, and Sections 41 (England) and 42 (Wales) of the Natural Environment and Rural Communities (NERC) Act 2006. Section 11 of NPPF states that the planning system should contribute to and enhance the natural and local environment by minimising impacts on biodiversity and providing net gains in biodiversity where possible. The NPPF also includes the requirement to contribute to the Government's commitment to halt the overall decline in biodiversity and to promote the reservation, restoration and re-creation of priority habitats, ecological networks and the protection and recovery of priority species populations, linked to national and local targets. Reference is made to Circular 06/2005 *Biodiversity and Geological Conservation - Statutory Obligations and Their Impact within the Planning System* in respect of statutory obligations for biodiversity and geodiversity conservation.

Local authorities in England are required to ensure that where significant harm resulting from development cannot be avoided (through locating on alternative sites with less harmful impacts), adequately mitigated, or, as a last resort, compensated for, planning permission is refused. The commitment to preserving, restoring or enhancing biodiversity is further emphasised for England and Wales in Section 40 of the NERC Act 2006.

Great Crested Newts

Great crested (or warty) newts (*Triturus cristatus*) (GCN) are protected under the WCA 1981, which has been also amended by various legislation including the CRoW Act 2000 and the Conservation of Habitats and Species Regulations 2010, and this legislation is applicable to England and Wales. Great crested newts are listed on Schedule 5 of the WCA and are, therefore, subject to some the provisions of Section 9 which, with the amendments, make it an offence to:

- Intentionally or recklessly disturb a GCN while it is occupying a structure or place which it uses for shelter or protection (S9:4b).

- Intentionally or recklessly obstruct access to any structure or place used for shelter or protection by a GCN (S9:4c).

There are additional offences in relation to buying and selling (S9:5) any live or dead animal of this species or anything derived from them.

Great crested newts are also listed under Annexes IIa and IVa of EC Directive on the Conservation of Natural Habitats and of Wild Fauna and Flora, also known as the 'Habitats Directive'. Inclusion on Annex IVa means they are consequently identified as EPS and protected under the Conservation of Habitats and Species Regulations 2010. The Conservation of Habitats and Species Regulations 2010 state that a person commits an offence if they:

(a) deliberately capture, injure or kill any wild animal of an EPS,

(b) deliberately disturb wild animals of any such species, in such a way as –

  (i) to impair their ability to survive, to breed or reproduce, or to rear their young, or

  (ii) in the case of animals of a hibernating or migratory species, to hibernate or migrate, or

  (iii) to affect significantly the local distribution or abundance of the species to which they belong;

(c) deliberately take or destroy the eggs of such an animal, or

(d) damage or destroy a breeding site or resting place of such an animal.

Under these Regulations it is an offence to damage or destroy a breeding site or resting place, whether the animal is in occupation or not, and protection extends to all life stages of the animal in question. There are additional offences relating to possession, control and sale of a live or dead GCN or part of such an animal.

In addition, GCN are listed as a 'Priority Species' under UKBAP. UKBAP Priority Species are also referred to as 'species of principal importance' for the conservation of biodiversity in England and Wales within Section 74 of the CRoW Act 2000, and Sections 41 (England) and 42 (Wales) of the NERC Act 2006. Section 11 of the NPPF states that the planning system should contribute to and enhance the natural and local environment by minimising impacts on biodiversity and providing net gains in biodiversity where possible. The NPPF also includes the requirement to contribute to the Government's commitment to halt the overall decline in biodiversity and to promote the reservation, restoration and re-creation of priority habitats, ecological networks and the protection and recovery of priority species populations, linked to national and local targets. Reference is made to Circular 06/2005 *Biodiversity and Geological Conservation - Statutory Obligations and Their Impact within the Planning System* in respect of statutory obligations for biodiversity and geodiversity conservation. Local authorities in England are required to ensure that where significant harm resulting from development cannot be avoided (through locating on alternative sites with less harmful impacts), adequately mitigated, or, as a last resort, compensated for, planning permission is refused. The commitment to preserving, restoring or enhancing biodiversity is further emphasised for England and Wales in Section 40 of the NERC Act 2006.

Birds

All wild species of breeding birds and their nests are protected under Part 1 of the WCA 1981, as amended by later legislation including the CRoW Act 2000. This legislation applies in England and Wales.

Part 1 (Section 1:1) of the WCA states that:

> *'If any person intentionally,*
>
> *(a) kills, injures or takes any wild bird;*
>
> *(b) takes, damages or destroys the nest of any wild bird while that nest is in use or being built; or*
>
> *(c) takes or destroys an egg of any wild bird,*
>
> *he shall be guilty of an offence.'*

Part 1 (Section 1:5) of the WCA (amended by the CRoW Act 2000) refers to specific birds listed on Schedule 1 of the WCA, and states that:

> *'If any person intentionally or recklessly,*
>
> *(a) disturbs any wild bird included in Schedule 1 while it is building a nest or is in, on or near a nest containing eggs or young; or*
>
> *(b) disturbs dependent young of such a bird,*
>
> *he shall be guilty of an offence and liable to a special penalty.*

Schedule 1 includes birds such as barn owl (*Tyto alba*), black redstart (*Phoenicurus ochruros*), woodlark (*Lullula arborea*) and Cetti's warbler (*Cettia cetti*). Please refer to the WCA for a complete list of Schedule 1 species.

Great Crested Newts

Great crested (or warty) newts (*Triturus cristatus*) (GCN) are protected under the WCA 1981, which has been also amended by various legislation including the CRoW Act 2000 and the Conservation of Habitats and Species Regulations 2010, and this legislation is applicable to England and Wales. Great crested newts are listed on Schedule 5 of the WCA and are, therefore, subject to some the provisions of Section 9 which, with the amendments, make it an offence to:

- Intentionally or recklessly disturb a GCN while it is occupying a structure or place which it uses for shelter or protection (S9:4b).

- Intentionally or recklessly obstruct access to any structure or place used for shelter or protection by a GCN (S9:4c).

There are additional offences in relation to buying and selling (S9:5) any live or dead animal of this species or anything derived from them.

Great crested newts are also listed under Annexes IIa and IVa of EC Directive on the Conservation of Natural Habitats and of Wild Fauna and Flora, also known as the 'Habitats Directive'. Inclusion on Annex IVa means they are consequently identified as EPS and protected under the Conservation of Habitats and Species Regulations 2010. The Conservation of Habitats and Species Regulations 2010 state that a person commits an offence if they:

(a) deliberately capture, injure or kill any wild animal of an EPS,

(b) deliberately disturb wild animals of any such species, in such a way as –

  (i) to impair their ability to survive, to breed or reproduce, or to rear their young, or

  (ii) in the case of animals of a hibernating or migratory species, to hibernate or migrate, or

  (iii) to affect significantly the local distribution or abundance of the species to which they belong;

(c) deliberately take or destroy the eggs of such an animal, or

(d) damage or destroy a breeding site or resting place of such an animal.

Under these Regulations it is an offence to damage or destroy a breeding site or resting place, whether the animal is in occupation or not, and protection extends to all life stages of the animal in question. There are additional offences relating to possession, control and sale of a live or dead GCN or part of such an animal.

In addition, GCN are listed as a 'Priority Species' under UKBAP. UKBAP Priority Species are also referred to as 'species of principal importance' for the conservation of biodiversity in England and Wales within Section 74 of the CRoW Act 2000, and Sections 41 (England) and 42 (Wales) of the NERC Act 2006. Section 11 of the NPPF states that the planning system should contribute to and enhance the natural and local environment by minimising impacts on biodiversity and providing net gains in biodiversity where possible. The NPPF also includes the requirement to contribute to the Government's commitment to halt the overall decline in biodiversity and to promote the reservation, restoration and re-creation of priority habitats, ecological networks and the protection and recovery of priority species populations, linked to national and local targets. Reference is made to Circular 06/2005 *Biodiversity and Geological Conservation - Statutory Obligations and Their Impact within the Planning System* in respect of statutory obligations for biodiversity and geodiversity conservation. Local authorities in England are required to ensure that where significant harm resulting from development cannot be avoided (through locating on alternative sites with less harmful impacts), adequately mitigated, or, as a last resort, compensated for, planning permission is refused. The commitment to preserving, restoring or enhancing biodiversity is further emphasised for England and Wales in Section 40 of the NERC Act 2006.

APPENDIX II

Desk Study Data

Staffordshire Ecological Record
Email: info@staffs-ecology.org.uk
Website: www.staffs-ecology.org.uk

Please reply to:

G.C.Slawson B.Sc. (Hons)
Ecological Records Co-ordinator

The Wolseley Centre
Wolseley Bridge
Stafford
ST17 0WT

Tel: 01889 880100
Fax: 01889 880101

Mr K. Mellish
Penny Anderson Associates
Park Lea
60 Park Road
Buxton, Derbyshire. SK17 6SN

26th September 2016

SER Reference: **SER/16/473**
Client Reference: **MELL01**

Dear Kyle,

Re Data Search: Star Bank, Stoke on Trent (SK071461) 2km radius

With regard to the above location, I am including the following information for this area:

1) Map showing the location of 100m precise protected species records in the area in question.
2) An annotated list of protected species within the search area, covering European and UK protected species, Species of Principal Importance, species occurring on the UK Biodiversity Action Plan (BAP) (short list), Staffordshire BAP and species listed on the Red Data Lists.

As agreed the cost of producing this information is £60 plus VAT and an invoice will be sent separately.

Yours sincerely,

G.Craig Slawson B.Sc.(Hons.)
Ecological Records Co-ordinator

Partners:

East Staffordshire Borough Council
Environment Agency
Lichfield District Council
The National Forest Company
National Trust
Newcastle-under-Lyme Borough Council
South Staffordshire Council
Stafford Borough Council
Staffordshire County Council
Staffordshire Moorlands District Council
Staffordshire Wildlife Trust
Stoke-on-Trent City Council

Disclaimer

Introduction

The following outlines the limitations and restrictions covering the uses of data supplied by Staffordshire Ecological Record, together with the limitations of the original data.

If you wish to comment on the service provided by SER please complete our online Customer Satisfaction Questionnaire at *www.surveymonkey.com/s/ZGMRXKG*

Important Considerations

- **Data supplied by SER must only be used for the purpose for which it was originally requested – reuse of data is strictly prohibited without the express permission of SER**
- **Information supplied by SER is always based on historical data of varying age and is only based upon the records supplied to SER. This should not be seen as an alternative to on site work. Absence of records should not be seen as definitive proof of the absence of the species or habitat in the search area.**
- **Mobile species can move and their presence within the search area could be resident (present all year), seasonal (only present for part of the year) or incidental (species just passing through) and certain species are only protected at specific parts of their life-cycle (*i.e.* the breeding season). All records for any protected species are listed, even those outside the time at which they are protected!**
- **Some datasets supplied by SER incur additional restrictions/information and these are listed in the Appendix.**

General comments

Staffordshire Ecological Record strives to supply information which is **accurate**, **up-to-date** and **relevant** and where possible will indicate the limitations of any given dataset. However, SER cannot be responsible for any errors in supplied information or the consequences of their usage unless the client has checked with SER and SER has failed to act on any known errors.

1. Although SER can analyse and interpret data if required, it must remain impartial and cannot comment on the merits of any change in land use.
2. Information supplied free-of-charge for educational or private purposes must not be used for commercial purposes.
3. All reports produced by SER are deemed the copyright of Staffordshire Ecological Record, and SER must be cited or acknowledged on any publication using said information, however, individual records remain the intellectual property of the original recorder and may require additional acknowledgement if requested by SER.

Supply of data

1. SER data is usually supplied as a combination of PDF (for maps and citations) and Excel spreadsheet to allow clients to include the data within reports, however, the client should not alter the meanings of any digital data supplied.

2. Excel data is usually supplied as a species file and a sites file in Excel2007® format (*.xlsx) – these both include multiple worksheets, one for each category supplied, please ensure you check all worksheets for content.

Species based information

The locations of protected and Biodiversity Action Plan priority species are supplied subject to the following limitations:

1. Unless otherwise stated, the information relating to species records is as accurate as possible, but is reliant on the quality of the original data supplied to SER. SER cannot be responsible for any errors in the data, nor the consequences of their use – this is particularly relevant to *iRecord* data.

2. Unless otherwise stated, personal information is not normally supplied in reports, however, if present, it is deemed confidential under the Data Protection Act and should not be passed to a third party.

3. Unless otherwise stated, records of badger (*Meles meles*) and all bat species are deemed confidential and badger records can only be published at reduced resolution (1km precision) even where precise information is supplied by SER for analysis purposes. Under certain circumstances, other species records may be deemed sensitive and need to be handled in a similar fashion.

4. Species data now includes a ***Composite Species List*** covering all species found during the search, however because it is based on 1km sq data, it is likely that records from just outside any search area will also be included in this list (these data would not be included in the full record searches which are based on precise grid references), hence figures may be slightly higher than the individual record searches.

5. The "***Distance from Site***" information is only supplied as an estimate, it should not be considered definitive, and for 1km precision records is either based on the centre of the 1km square or omitted entirely.

Site based information

The boundaries of Local Wildlife Sites (=Sites of Biological Importance {SBIs}), Biodiversity Alert Sites (BASs) or Local Geodiversity Sites (=Regionally Important Geological/Geomorphological Sites {RIGS}) are supplied subject to the following limitations:

1. Site boundaries are as precise as the original survey maps and base mapping allow.

2. The presence of a marked boundary on supplied maps does not infer any right of public access. Gaining permission to visit is the client's responsibility.

3. Site status is conferred by a Grading Committee and is correct at the time of notification. Changes may have occurred since the survey which affect the site's quality, however, the grading remains in effect until reviewed by the Grading Committee.

4. The boundaries of Sites of Special Scientific Interest (SSSIs), other statutory sites and Ancient Woodlands may be included on maps, but are not the property of SER. These are reproduced under licence to Natural England to add value to the report.

5. Maps produced by SER now use Ordnance Survey OpenData (usually StreetView) as a background image. These can now be further reproduced providing OS OpenData licence is adhered to, please refer to the OS website ***www.ordnancesurvey.co.uk/opendata/licence*** for further details.

SER Data Sources

Data held by SER has been supplied by a large number of recorders, both amateur and professional. The following list includes the main data suppliers whose data may be included within any data search. This list is by no means exhaustive.

- Bat Conservation Trust
- British Trust for Ornithology (via WMBC)
- Butterfly Conservation (West Midlands Branch)
- Cannock Chase District Council
- East Staffordshire Borough Council
- GeoConservation Staffordshire
- Lichfield District Council
- Natural England
- Newcastle-under-Lyme Borough Council
- North Staffordshire Field Club
- South Staffordshire Council
- South-east Staffordshire Bat Group
- Stafford Borough Council
- **Staffordshire Badger Group**
- Staffordshire Bat Group
- Staffordshire County Council
- Staffordshire Flora Project
- Staffordshire Fungus Group
- **Staffordshire Invertebrate Group**
- Staffordshire Mammal Group
- Staffordshire Moorland District Council
- Staffordshire Moth Group
- **Staffordshire Wildlife Trust**
- Stoke-on-Trent City Council
- Tamworth Borough Council
- West Midland Bird Club (Staffordshire Branch)

It should not be necessary to approach any of the above organisations for data relating to Staffordshire, however, if you require advice on any particular taxon/group, then the specialist group should be approached, not SER.

Staffordshire Ecological Record acts as County Recorder for the organisations in **bold**.

Limitations of Specific Datasets

These may or may not be relevant to the data search you are receiving, but refer to the **Source** column in the supplied species information

1. **BCT/NE Bat Roost Reports:** Data from this source are received by SER without any site name apart from the postcode, therefore SER is unable to verify these locations are correct. Refer to separate disclaimer for these data.

2. **Staffordshire Badger Group:** Data from the Badger Group should always be considered confidential, and under no circumstances should the full details of any sighting be reproduced in reports or passed to any third party. This restriction originates from the Dataset's copyright owner

and as such is not negotiable and excluded from being released under the Freedom of Information Act (2000) or the Environmental Information Regulations (2004).

3. **iRecord:** iRecord is an online recording system maintained by the national Biological Records Centre (http://www.brc.ac.uk/irecord). This collected sightings entered by a variety of recorders including expertise from local amateur experts to the general public. It is managed by a network of verifiers whose responsibility is to check the identifications. Any iRecord sightings included in the accompanying spreadsheet have the 'RecordStatus' field as follows:

    a. 'Validation' have been checked by a nationally approved expert
    b. 'original' or 'unconfirmed' have not been checked and therefore should not be relied on if it involved an important decision, they should only be considered indicative!

    We have noticed a number of iRecord sighting have totally erroneous grid references, unfortunately many records are not supplied with a site name, for these records, the grid reference cannot be checked nor confirmed – definitely erroneous records have been excluded from the attached spreadsheet (or if possible corrected), but iRecord data must always be treated with caution, if you need specific confirmation, please contact the SER office.

Bat Conservation Trust

National Bat Monitoring Programme

Conserving bats with sound science

Metadata

Notes on interpreting data from NBMP surveys

General note: NBMP data are collected for the purposes of UK surveillance of bats according to a stratified random or other sampling design. The results do not, therefore, necessarily reflect the true distribution of the species in 1km squares, nor are they a complete record of species occurrence in each area, and properly designed surveys to assess species presence should still be carried out. However, they do contribute additional information to the recording effort for each region.

NB If planning to visit any Colony Count or Hibernation Survey sites listed in the dataset, it is very important to liaise with the named recorder (contact the NBMP team at nbmp@bats.org.uk if help is needed with contacting the recorder). This is to reduce disturbance at the site and check for landowner permissions and health and safety issues.

Survey methodologies

Colony Counts: Subject species are **common pipistrelle**, **soprano pipistrelle**, **pipistrelle sp** (i.e. not identified to species level), **serotine**, **Natterer's bat** and **lesser horseshoe**. A few incidental records of other species are also included. Volunteers carry out counts of bats emerging at dusk from known bat roosts, normally on two evenings in June, although some counts carried out in other months are also included. Counts commence at sunset or shortly before (depending on the species being counted); reasons for stopping the count are given in the dataset.

Field Survey: Subject species are **common pipistrelle, soprano pipistrelle, noctule** and **serotine**. Any other species encountered are not recorded. Volunteers are asked to carry out two surveys in July. The survey begins 20 minutes after sunset. Volunteers walk a roughly triangular transect within a 1km square normally selected from a list of randomly generated 1km grid refs. In each survey square the same route is followed each year (with slight variations if parts of the route become dangerous or inaccessible). Twelve spots, approximately evenly spaced, are marked out along the survey route. At each spot the bat detector is tuned around 50 kHz and common and soprano pipistrelle passes are counted for two minutes. While walking between each spot the bat detector is tuned around 25 kHz and noctule and serotine passes are recorded. NB the number of passes indicates levels of bat activity and not numbers of individual bats.

Waterway Survey: Subject species is **Daubenton's bat**, but a few incidental records of other species are also included. Volunteers are asked to carry out two surveys in August. The survey begins 40 minutes after sunset. Volunteers walk along a stretch of waterway of roughly 1km in length. Sites are normally selected from a list of waterways previously surveyed as part of the Environment Agency's River Habitats Survey. At each survey site the same route is followed each year (with slight variations if parts of the route become dangerous or inaccessible). Ten spots, approximately evenly spaced, are marked out along the survey route. At each spot Daubenton's bat passes are counted for four minutes with the bat detector tuned to 35 kHz. NB the number of passes indicates the levels of bat activity and not numbers of individual bats.

Hibernation Survey: Licensed volunteers visit known or potential bat hibernation sites, preferably once in January and once in February, although some counts from other months are also included. All bats seen are identified where possible and numbers are counted. The survey is biased towards hibernation sites which are accessible to humans, such as caves, mines and tunnels, so bat species which tend not to use such sites are under-recorded. The results are

also biased in favour of bats that hang in full view and against those that tend to conceal themselves in nooks and crannies. The ratio of bats seen to bats not seen is unknown. If no bats are recorded at a site it should not be assumed that bats are not present.

Sunset / Sunrise Survey: This survey takes place in July and August and is aimed at en P.T.O. new volunteers and enabling both new and experienced volunteers to locate new roosts in their local area. The survey comprises two parts, either or both of which may be carried out. The Sunset Survey involves going out into a garden or other open space at dusk, looking out for bats flying past and making a note of the general direction from which they appear to be arriving. The Sunrise Survey involves going out one hour before sunset and looking for bats "swarming" as they arrive back at their roosts. Observations made while doing the Sunset Survey on a preceding evening can be used to guide the volunteer in looking for possible roost sites. As many of the participants are beginners, the species identifications are not necessarily accurate. The main value of the data is recording the presence of bats and/or bat roosts in the survey area.

Interpretation of data

Established statistical techniques for interpreting data have been applied when producing national species population trends based on NBMP data. If you wish to refer to the methods used then please see the NBMP Annual Reports at http://www.bats.org.uk/pages/results_and_reports.html or contact us on 0845 1300 228 for a copy of the latest report.

Staffordshire Ecological Record
The Wolseley Centre, Wolseley Bridge,
Stafford. ST17 0WT
Tel: 01889 880100 Fax: 01889 880101
Email: info@staffs-ecology.org.uk

A legend to the map showing Nature Conservation Sites and Species

Introduction

These colours are used on the site alert mapping within the SWT GIS, but SER cannot guarantee the same colours are used in any other mapping system, particularly those based on ArcView.

Statutory Designations from Natural England's web-site

- National Nature Reserves
- Sites of Special Scientific Interest
- Local Nature Reserves
- NNR (boundary not available owing to OS restrictions)
- SSSI (boundary not available owing to OS restrictions)
- LNR (boundary not available owing to OS restrictions)

Non-statutory Designations from the Staffordshire Grading System (1995 onwards)

- Site of Biological Importance (ex Grade 1 SBI) equivalent to "Local Wildlife Site"
- Biodiversity Alert Site (ex Grade 2 SBI)
- Proposed/potential Site of Biological Importance

Geological Sites

- Regionally Important Geological/geomorphological Site (= Local Geological Site)

Staffordshire Wildlife Trust Sites

- SWT Nature Reserves

Other Nature Reserves

- Royal Society for the Protection of Birds

Ancient Woodland Inventory

- Ancient & Semi-natural Woodland
- Ancient Replanted Woodland

Species Information

- Mammals excluding those listed below
- Otter (Lutra lutra)
- Badger (Meles meles) - not normally supplied
- Water Vole (Arvicola terrestris)
- All bat species
- All bird species
- Any other protected species (precise to 100m)
- All Protected Species Records (precise to 1km)
- Amphibians and reptiles excluding those below
- Great Crested Newt (Triturus cristatus)
- Native Crayfish (Austropotamobius pallipes)
- Flowering plants except those below
- Bluebell (Hyacinthoides non-scripta)
- Butterflies and Moths
- BAP Species Records (precise to 100m)
- BAP Species Records (precise to 1km)

Notes:

The Local Nature Reserve and other nature reserve boundaries can overlay the current grading when both layers are actively visible

Where there are multiple species records for the same grid reference the dot for one species may obscure the dots for other species - all species records will be displayed in the accompanying spreadsheet

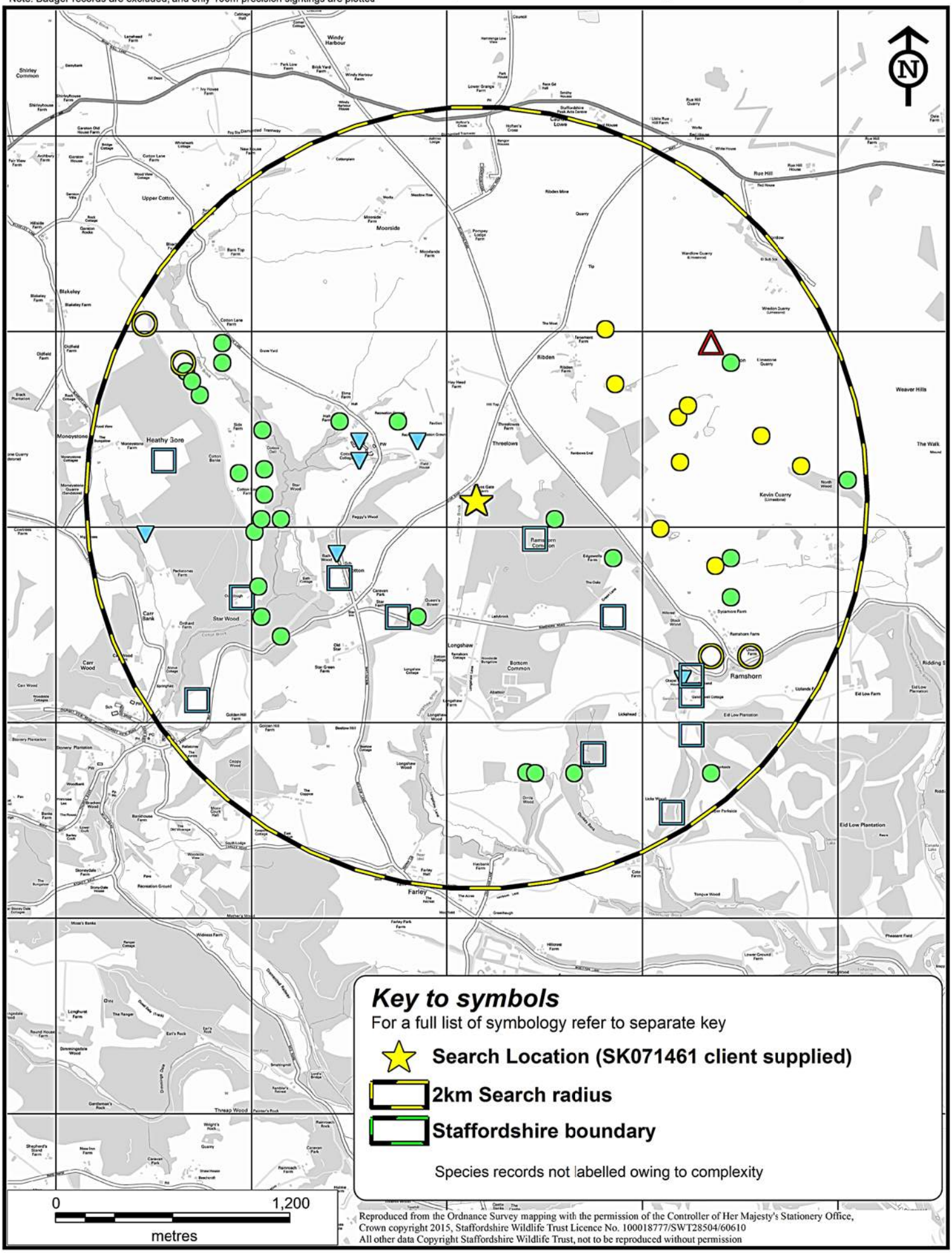
Not all the above categories may be present on the accompanying map

Version 2.0 July 2011

Staffordshire Ecological Record
The Wolseley Centre, Wolseley Bridge, Stafford. ST17 0WT Tel: 01889 880100 Fax: 01880 880101
Email: info@staffs-ecology.org.uk
SER/16/473

Protected Species within 2km of Star Bank, Stoke on Trent (SK071461)

Note: Badger records are excluded, and only 100m precision sightings are plotted



Key to symbols

For a full list of symbology refer to separate key

- Search Location (SK071461 client supplied)
- 2km Search radius
- Staffordshire boundary

Species records not labelled owing to complexity

List of records for European and UK Protected species: 2km of Star Bank, Stoke on Trent (SK071461) produced 26/9/2016

Scientific Name	Common Name	Informal Group	Location	Location Detail	Grid Ref.	Date	Source	Sample Method	Abundance	Record Type	Dist. from Site (m)	European Protection	UK Protection	Principle Concern	Rare	Invasive	StaffsINNS	Record Validity	Confidential	Easting	Northing	Precision
Triturus cristatus	Great Crested Newt	amphibian	Farley Parish	nr. Ribden Farm, Waterbody 2	SK078104 7020	May 2013	Consultants (WaA)	Field Observation	1 Count of Adult	Breeding (possible)	1092	Yes	Yes	Yes	No	No	No	Original	False	407811	347021	5
Triturus cristatus	Great Crested Newt	amphibian	Ramshorn Parish	nr. Ribden Farm, Waterbody 4	SK078604 6740	May 2013	Consultants (WaA)	Field Observation	12 Count of Adult	Breeding (confirmed)	922	Yes	Yes	Yes	No	No	No	Original	False	407861	346741	5
Triturus cristatus	Great Crested Newt	amphibian	Ramshorn Parish	Adj Wredon Quarry, Waterbody 10a	SK080904 6000	May 2013	Consultants (WaA)	Field Observation	1 Count of Adult	Breeding (possible)	950	Yes	Yes	Yes	No	No	No	Original	False	408091	346001	5
Triturus cristatus	Great Crested Newt	amphibian	Ramshorn Parish	Adj Wredon Quarry, Waterbody 7	SK081804 6570	May 2013	Consultants (WaA)	Field Observation	2 Count of Adult	Breeding (confirmed)	1110	Yes	Yes	Yes	No	No	No	Original	False	408181	346571	5
Triturus cristatus	Great Crested Newt	amphibian	Ramshorn Parish	Adj Wredon Quarry, Waterbody 8a	SK081904 6340	May 2013	Consultants (WaA)	Field Observation	1 Count of Egg/Ovum	Breeding (confirmed)	1055	Yes	Yes	Yes	No	No	No	Original	False	408191	346341	5
Triturus cristatus	Great Crested Newt	amphibian	Ramshorn Parish	Adj Wredon Quarry, Waterbody 6	SK082304 6630	May 2013	Consultants (WaA)	Field Observation	4 Count of Adult	Breeding (confirmed)	1180	Yes	Yes	Yes	No	No	No	Original	False	408231	346631	5
Triturus cristatus	Great Crested Newt	amphibian	Ramshorn Parish	Adj Wredon Quarry, Waterbody 11	SK083704 5810	May 2013	Consultants (WaA)	Field Observation	3 Count of Adult	Breeding (confirmed)	1263	Yes	Yes	Yes	No	No	No	Original	False	408371	345811	5
Triturus cristatus	Great Crested Newt	amphibian	Ramshorn Parish	Wredon Quarry, Waterbody 20	SK086044 6475	May 2013	Consultants (WaA)	Field Observation	2 Count of Adult	Breeding (possible)	1487	Yes	Yes	Yes	No	No	No	Original	False	408605	346476	5
Triturus cristatus	Great Crested Newt	amphibian	Ramshorn Parish	Wredon Quarry, Waterbody 19	SK088104 6320	May 2013	Consultants (WaA)	Field Observation	14 Count of Adult	Breeding (possible)	1665	Yes	Yes	Yes	No	No	No	Original	False	408811	346321	5
Alcedo atthis	Common Kingfisher	bird	Oakamoor Parish	Oakamoor	SK0544	06/12/2012	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2329	Yes	Yes	No	Yes	No	No	Original	False	405500	344500	2
Alcedo atthis	Common Kingfisher	bird	Oakamoor Parish	Oakamoor	SK0544	15/11/2012	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2329	Yes	Yes	No	Yes	No	No	Original	False	405500	344500	2
Alcedo atthis	Common Kingfisher	bird	Oakamoor Parish	Oakamoor	SK0544	24/02/2016	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2329	Yes	Yes	No	Yes	No	No	Original	False	405500	344500	2
Alcedo atthis	Common Kingfisher	bird	Cotton Dell SWT Nature Reserve	Cotton Dell	SK0545	31/10/2008	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1769	Yes	Yes	No	Yes	No	No	Original	False	405500	345500	2
Anas querquedula	Garganey	bird	Oakamoor Parish	Oakamoor	SK0544	26/03/2016	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	2329	No	Yes	No	Yes	No	No	Original	False	405500	344500	2
Anser anser	Greylag Goose	bird	Wootton Parish	Weaver Hills	SK0946	02/09/2003	West Midland Bird Club (5b9)	Field Observation	32 Count	Not specified	2369	No	Yes	No	Yes	No	No	Original	False	409500	346500	2
Bucephala clangula	Common Goldeneye	bird	Churnet Valley (overview)		SK0545	14/02/1998	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	1769	No	Yes	No	Yes	No	No	Original	False	405500	345500	2
Charadrius dubius	Little Plover	bird	Croxden Quarry		SK0748	03/05/2008	BTO Atlas 2008	Field Observation	2 Count of Breeding possible	Not specified	2375	No	Yes	No	No	No	No	Original	False	407500	348500	2
Falco columbarius	Merlin	bird	Wootton Parish	Weaver Hills	SK0946	09/09/2001	West Midland Bird Club (5bq)	Field Observation	1 Count of Adult Female	Not specified	2369	Yes	Yes	No	Yes	No	No	Original	False	409500	346500	2
Falco columbarius	Merlin	bird	Wootton Parish	Weaver Hills	SK0946	15/10/2003	West Midland Bird Club (5b9)	Field Observation	1 Count	Not specified	2369	Yes	Yes	No	Yes	No	No	Original	False	409500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Oakamoor Parish	Oakamoor	SK0544	11/05/2008	BTO Atlas 2008	Field Observation	1 Count	Not specified	2329	Yes	Yes	No	No	No	No	Original	False	405500	344500	2
Falco peregrinus	Peregrine Falcon	bird	Cotton Dell SWT Nature Reserve	Cotton Dell	SK0545	02/09/2007	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1769	Yes	Yes	No	No	No	No	Original	False	405500	345500	2
Falco peregrinus	Peregrine Falcon	bird	Cotton Dell SWT Nature Reserve	Cotton Dell	SK0545	10/05/2013	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1769	Yes	Yes	No	No	No	No	Original	False	405500	345500	2
Falco peregrinus	Peregrine Falcon	bird	Waterhouses Parish	Caldon Quarry	SK0748	05/04/2005	West Midland Bird Club (5bq)	Field Observation	3 Count	Not specified	2375	Yes	Yes	No	No	No	No	Original	False	407500	348500	2

Scientific Name	Common Name	Informal Group	Location	Location Detail	Grid Ref.	Date	Source	Sample Method	Abundance	Record Type	Dist. from Site (m)	European Protection	UK Protection	Principle Concern	Rare	Invasive	StaffsINNS	Record Validity	Confidential	Easting	Northing	Precision
Falco peregrinus	Peregrine Falcon	bird	Waterhouses Parish	Cauldon Quarry	SK0748	05/12/2006	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	2375	Yes	Yes	No	No	No	No	Original	False	407500	348500	2
Falco peregrinus	Peregrine Falcon	bird	Waterhouses Parish	Cauldon Quarry	SK0748	10/06/2007	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2375	Yes	Yes	No	No	No	No	Original	False	407500	348500	2
Falco peregrinus	Peregrine Falcon	bird	Waterhouses Parish	Caldon Quarry	SK0748	2005	West Midland Bird Club (5bq)	Field Observation		Not specified	2375	Yes	Yes	No	No	No	No	Original	False	407500	348500	2
Falco peregrinus	Peregrine Falcon	bird	Cauldon Low Quarry	Cauldon Lowe	SK0748	29/03/2013	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2375	Yes	Yes	No	No	No	No	Original	False	407500	348500	2
Falco peregrinus	Peregrine Falcon	bird	Waterhouses Parish	Cauldon Quarry	SK0748	April 2003	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	2375	Yes	Yes	No	No	No	No	Original	False	407500	348500	2
Falco peregrinus	Peregrine Falcon	bird	Waterhouses Parish	Cauldon Quarry	SK0748	June 2005	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	2375	Yes	Yes	No	No	No	No	Original	False	407500	348500	2
Falco peregrinus	Peregrine Falcon	bird	Waterhouses Parish	Cauldon Quarry	SK0748	June 2006	West Midland Bird Club (3tz)	Field Observation	4 Count	Not specified	2375	Yes	Yes	No	No	No	No	Original	False	407500	348500	2
Falco peregrinus	Peregrine Falcon	bird	Waterhouses Parish	Cauldon Quarry	SK0748	June 2008	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	2375	Yes	Yes	No	No	No	No	Original	False	407500	348500	2
Falco peregrinus	Peregrine Falcon	bird	Cauldon Low Quarry	Cauldon Quarry	SK0748	June 2010	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	2375	Yes	Yes	No	No	No	No	Original	False	407500	348500	2
Falco peregrinus	Peregrine Falcon	bird	Waterhouses Parish	Caldon Quarry	SK0748	May 2006	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	2375	Yes	Yes	No	No	No	No	Original	False	407500	348500	2
Falco peregrinus	Peregrine Falcon	bird	Waterhouses Parish	Cauldon Quarry	SK0748	May 2007	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	2375	Yes	Yes	No	No	No	No	Original	False	407500	348500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Parish	Kevin Quarry	SK0846	05/04/2005	West Midland Bird Club (5bq)	Field Observation	1 Count of Adult Male	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Parish	Kevin Quarry	SK0846	10/10/2007	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Parish	Kevin Quarry	SK0846	19/03/2004	West Midland Bird Club (5bq)	Field Observation	1 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Parish	Kevin Quarry	SK0846	2004	West Midland Bird Club (5bq)	Field Observation	4 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Parish	Kevin Quarry	SK0846	29/07/2007	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Parish	Kevin Quarry	SK0846	31/03/2004	West Midland Bird Club (5bq)	Field Observation	2 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Parish	Kevin Quarry	SK0846	April 2003	West Midland Bird Club (3tz)	Field Observation	3 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Moor, Threelows Hollow, Sullymoor	Wredon Quarry	SK0846	February 2007	West Midland Bird Club (3tz)	Field Observation	4 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Parish	Kevin Quarry	SK0846	July 2006	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Moor, Threelows Hollow, Sullymoor	Wredon Quarry	SK0846	June 2005	West Midland Bird Club (3tz)	Field Observation	4 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2

Scientific Name	Common Name	Informal Group	Location	Location Detail	Grid Ref.	Date	Source	Sample Method	Abundance	Record Type	Dist. from Site (m)	European Protection	UK Protection	Principle Concern	Rare	Invasive	StaffsINNS	Record Validity	Confidential	Easting	Northing	Precision
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Moor, Threelows Hollow, Sullymoor	Wredon Quarry	SK0846	June 2006	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Moor, Threelows Hollow, Sullymoor	Wredon Quarry	SK0846	June 2008	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Moor, Threelows Hollow, Sullymoor	Wredon Quarry	SK0846	June 2009	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Moor, Threelows Hollow, Sullymoor	Wredon Quarry	SK0846	June 2010	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Moor, Threelows Hollow, Sullymoor	Wredon Quarry	SK0846	May 2006	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Ramshorn Moor, Threelows Hollow, Sullymoor	Wredon Quarry	SK0846	May 2007	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	1391	Yes	Yes	No	No	No	No	Original	False	408500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Waterhouses Parish	Cauldon Low	SK0847	01/05/2011	West Midland Bird Club (3tz)	Field Observation	1 Count	Breeding (probable)	1906	Yes	Yes	No	No	No	No	Original	False	408500	347500	2
Falco peregrinus	Peregrine Falcon	bird	Farley Parish	Wardlow Quarry	SK0847	05/04/2005	West Midland Bird Club (5bq)	Field Observation	1 Count of Adult Female	Not specified	1906	Yes	Yes	No	No	No	No	Original	False	408500	347500	2
Falco peregrinus	Peregrine Falcon	bird	Farley Parish	Wardlow Quarry	SK0847	10/10/2007	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1906	Yes	Yes	No	No	No	No	Original	False	408500	347500	2
Falco peregrinus	Peregrine Falcon	bird	Farley Parish	Wardlow Quarry	SK0847	18/05/2014	West Midland Bird Club (3tz)	Field Observation	2 Count	Breeding (confirmed)	1906	Yes	Yes	No	No	No	No	Original	False	408500	347500	2
Falco peregrinus	Peregrine Falcon	bird	Farley Parish	Wardlow Quarry	SK0847	2005	West Midland Bird Club (5bq)	Field Observation	5 Count	Not specified	1906	Yes	Yes	No	No	No	No	Original	False	408500	347500	2
Falco peregrinus	Peregrine Falcon	bird	Farley Parish	Wardlow Quarry	SK0847	27/04/2007	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	1906	Yes	Yes	No	No	No	No	Original	False	408500	347500	2
Falco peregrinus	Peregrine Falcon	bird	Farley Parish	Wardlow Quarry	SK0847	27/10/2005	West Midland Bird Club (5bq)	Field Observation	1 Count of Adult Male	Not specified	1906	Yes	Yes	No	No	No	No	Original	False	408500	347500	2
Falco peregrinus	Peregrine Falcon	bird	Farley Parish	Wardlow Quarry	SK0847	31/03/2004	West Midland Bird Club (5bq)	Field Observation	2 Count	Not specified	1906	Yes	Yes	No	No	No	No	Original	False	408500	347500	2
Falco peregrinus	Peregrine Falcon	bird	Farley Parish	Wardlow Quarry	SK0847	May 2013	West Midland Bird Club (3tz)	Field Observation	2 Count	Breeding (confirmed)	1906	Yes	Yes	No	No	No	No	Original	False	408500	347500	2
Falco peregrinus	Peregrine Falcon	bird	Wootton Parish	Weaver Hills	SK0946	01/09/2006	BirdTrack 2006	Field Observation	2 Count	Not specified	2369	Yes	Yes	No	No	No	No	Original	False	409500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Wootton Parish	Weaver Hills	SK0946	01/10/2006	BirdTrack 2006	Field Observation	2 Count	Not specified	2369	Yes	Yes	No	No	No	No	Original	False	409500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Wootton Parish	Weaver Hills	SK0946	02/01/2010	BirdTrack 2010	Field Observation	1 Count	Not specified	2369	Yes	Yes	No	No	No	No	Original	False	409500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Wootton Parish	Weaver Hills	SK0946	04/04/2009	BirdTrack 2009	Field Observation	2 Count	Not specified	2369	Yes	Yes	No	No	No	No	Original	False	409500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Wootton Parish	Weaver Hills	SK0946	11/09/2010	BirdTrack 2010	Field Observation	2 Count	Not specified	2369	Yes	Yes	No	No	No	No	Original	False	409500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Wootton Parish	Weaver Hills	SK0946	20/07/2003	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	2369	Yes	Yes	No	No	No	No	Original	False	409500	346500	2
Falco peregrinus	Peregrine Falcon	bird	Wootton Parish	Weaver Hills	SK0946	26/09/2008	BirdTrack 2008	Field Observation	2 Count	Not specified	2369	Yes	Yes	No	No	No	No	Original	False	409500	346500	2

Scientific Name	Common Name	Informal Group	Location	Location Detail	Grid Ref.	Date	Source	Sample Method	Abundance	Record Type	Dist. from Site (m)	European Protection	UK Protection	Principle Concern	Rare	Invasive	StaffsINNS	Record Validity	Confidential	Easting	Northing	Precision
Falco subbuteo	Eurasian Hobby	bird	Oakamoor Parish	Oakamoor	SK0544	09/05/2016	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2329	No	Yes	No	No	No	No	Original	False	405500	344500	2
Falco subbuteo	Eurasian Hobby	bird	Oakamoor Parish	N edge Carr Bank Woods, Oakamoor	SK0544	14/06/2015	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2329	No	Yes	No	No	No	No	Original	False	405500	344500	2
Falco subbuteo	Eurasian Hobby	bird	Oakamoor Parish	Oakamoor	SK0544	18/05/2014	BirdTrack 2014	Field Observation	1 Count	Not specified	2329	No	Yes	No	No	No	No	Original	False	405500	344500	2
Falco subbuteo	Eurasian Hobby	bird	Churnet Valley (overview)	Churnet Valley	SK0545	01/05/2013	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1769	No	Yes	No	No	No	No	Original	False	405500	345500	2
Falco subbuteo	Eurasian Hobby	bird	Cotton Dell SWT Nature Reserve	Cotton Dell Nature Reserve	SK0546	29/05/2016	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1682	No	Yes	No	No	No	No	Original	False	405500	346500	2
Falco subbuteo	Eurasian Hobby	bird	Farley Parish	Farley	SK0644	30/04/2005	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1772	No	Yes	No	No	No	No	Original	False	406500	344500	2
Falco subbuteo	Eurasian Hobby	bird	Farley Parish	Wardlow Quarry	SK0847	25/07/2015	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1906	No	Yes	No	No	No	No	Original	False	408500	347500	2
Falco subbuteo	Eurasian Hobby	bird	Wootton Parish	Weaver Hills	SK0946	28/07/2003	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2369	No	Yes	No	No	No	No	Original	False	409500	346500	2
Loxia curvirostra	Common Crossbill	bird	Oakamoor Parish	Oakamoor	SK0544	08/03/2014	BirdTrack 2014	Field Observation	2 Count	Not specified	2329	No	Yes	No	No	No	No	Original	False	405500	344500	2
Loxia curvirostra	Common Crossbill	bird	Churnet Valley (overview)		SK0545	04/06/2011	West Midland Bird Club (3tz)	Field Observation	4 Count	Not specified	1769	No	Yes	No	No	No	No	Original	False	405500	345500	2
Loxia curvirostra	Common Crossbill	bird	Churnet Valley (overview)		SK0545	December 2005	West Midland Bird Club (3tz)	Field Observation	2 Count	Not specified	1769	No	Yes	No	No	No	No	Original	False	405500	345500	2
Milvus milvus	Red Kite	bird	Oakamoor Parish	Oakamoor	SK0544	09/05/2016	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2329	Yes	Yes	No	Yes	No	No	Original	False	405500	344500	2
Milvus milvus	Red Kite	bird	Oakamoor Parish	Oakamoor	SK0544	11/04/2014	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2329	Yes	Yes	No	Yes	No	No	Original	False	405500	344500	2
Milvus milvus	Red Kite	bird	Oakamoor Parish	Oakamoor	SK0544	12/04/2014	BirdTrack 2014	Field Observation	2 Count	Breeding (probable)	2329	Yes	Yes	No	Yes	No	No	Original	True	405500	344500	2
Milvus milvus	Red Kite	bird	Oakamoor Parish	Oakamoor	SK0544	12/04/2014	BirdTrack 2014	Field Observation	2 Count of In Flight	Breeding (probable) - N	2329	Yes	Yes	No	Yes	No	No	Original	False	405500	344500	2
Milvus milvus	Red Kite	bird	Oakamoor Parish	Oakamoor	SK0544	14/04/2014	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2329	Yes	Yes	No	Yes	No	No	Original	False	405500	344500	2
Milvus milvus	Red Kite	bird	Oakamoor Parish	Oakamoor	SK0544	14/04/2014	West Midland Bird Club (3tz)	Field Observation	1 Count	Breeding (probable)	2329	Yes	Yes	No	Yes	No	No	Original	False	405500	344500	2
Milvus milvus	Red Kite	bird	Oakamoor Parish	Oakamoor	SK0544	21/05/2014	West Midland Bird Club (3tz)	Field Observation	2 Count	Breeding (probable)	2329	Yes	Yes	No	Yes	No	No	Original	False	405500	344500	2
Milvus milvus	Red Kite	bird	Oakamoor Parish	Oakamoor	SK0544	22/03/2015	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2329	Yes	Yes	No	Yes	No	No	Original	False	405500	344500	2
Milvus milvus	Red Kite	bird	Oakamoor Parish	Oakamoor	SK0544	26/04/2014	BirdTrack 2014	Field Observation	1 Count of In Flight	Not specified	2329	Yes	Yes	No	Yes	No	No	Original	False	405500	344500	2
Milvus milvus	Red Kite	bird	Cotton Dell SWT Nature Reserve	Cotton Dell	SK0545	02/01/2015	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1769	Yes	Yes	No	Yes	No	No	Original	False	405500	345500	2
Milvus milvus	Red Kite	bird	Churnet Valley (overview)	Churnet Valley	SK0545	03/07/2012	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1769	Yes	Yes	No	Yes	No	No	Original	False	405500	345500	2

Scientific Name	Common Name	Informal Group	Location	Location Detail	Grid Ref.	Date	Source	Sample Method	Abundance	Record Type	Dist. from Site (m)	European Protection	UK Protection	Principle Concern	Rare	Invasive	StaffsINNS	Record Validity	Confidential	Easting	Northing	Precision
Milvus milvus	Red Kite	bird	Cotton Dell SWT Nature Reserve	Cotton Dell	SK0545	08/04/2014	West Midland Bird Club (3tz)	Field Observation	2 Count	Breeding (possible)	1769	Yes	Yes	No	Yes	No	No	Original	False	405500	345500	2
Milvus milvus	Red Kite	bird	Cotton Dell SWT Nature Reserve	Cotton Dell	SK0545	12/03/2014	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1769	Yes	Yes	No	Yes	No	No	Original	False	405500	345500	2
Milvus milvus	Red Kite	bird	Cotton Parish	Cotton (north)	SK0647	05/08/2007	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1497	Yes	Yes	No	Yes	No	No	Original	False	406500	347500	2
Milvus milvus	Red Kite	bird	Farley Parish	Weaver Hills, Wooten Estate, Cauldon Low	SK0847	13/03/2016	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	1906	Yes	Yes	No	Yes	No	No	Original	False	408500	347500	2
Milvus milvus	Red Kite	bird	Ramshorn Parish	Ramshorn	SK085453	05/06/2013	County Recorders (DLF)	In flight	1 Count of Adult	Not specified	1608	Yes	Yes	No	Yes	No	No	Original	False	408550	345350	3
Milvus milvus	Red Kite	bird	Wootton Parish	between Kevin Quarry & Shawcroft Farm	SK0945	03/03/2002	SER General Records 2002	Field Observation	1 Count of In Flight	field record	2431	Yes	Yes	No	Yes	No	No	Original	False	409500	345500	2
Milvus milvus	Red Kite	bird	Wootton Parish	Weaver Hills	SK0946	01/01/2010	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2369	Yes	Yes	No	Yes	No	No	Original	False	409500	346500	2
Milvus milvus	Red Kite	bird	Wootton Parish	Weaver Hills	SK0946	19/03/2016	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2369	Yes	Yes	No	Yes	No	No	Original	False	409500	346500	2
Milvus milvus	Red Kite	bird	Wootton Parish	Weaver Hills	SK0946	19/07/2003	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2369	Yes	Yes	No	Yes	No	No	Original	False	409500	346500	2
Milvus milvus	Red Kite	bird	Wootton Parish	Weaver Hills	SK0946	22/03/2016	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2369	Yes	Yes	No	Yes	No	No	Original	False	409500	346500	2
Pandion haliaetus	Osprey	bird	Oakamoor Parish	Oakamoor	SK0544	03/04/2015	BirdTrack 2015	Field Observation		Not specified	2329	Yes	Yes	No	Yes	No	No	Original	False	405500	344500	2
Pandion haliaetus	Osprey	bird	Oakamoor Parish	Oakamoor	SK0544	10/05/2011	BirdTrack 2011	Field Observation	1 Count	Not specified	2329	Yes	Yes	No	Yes	No	No	Original	False	405500	344500	2
Pandion haliaetus	Osprey	bird	Cotton Parish	Windy Harbour	SK0648	25/10/2009	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2436	Yes	Yes	No	Yes	No	No	Original	False	406500	348500	2
Plectrophenax nivalis	Snow Bunting	bird	Wootton Parish	Weaver Hills	SK0946	12/11/2004	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2369	No	Yes	No	Yes	No	No	Original	False	409500	346500	2
Pluvialis apricaria	European Golden Plover	bird	Cotton Parish	Windy Harbour	SK0648	26/02/2008	BTO Atlas 2008	Field Observation	235 Count	Not specified	2436	Yes	No	No	Yes	No	No	Original	False	406500	348500	2
Pluvialis apricaria	European Golden Plover	bird	Wootton Parish	Weaver Hills	SK0946	04/10/2009	BirdTrack 2009	Field Observation	17 Count	Not specified	2369	Yes	No	No	Yes	No	No	Original	False	409500	346500	2
Turdus iliacus	Redwing	bird	Oakamoor Parish	Oakamoor	SK0544	13/01/2013	West Midland Bird Club (3tz)	Field Observation	70 Count	Not specified	2329	No	Yes	No	Yes	No	No	Original	False	405500	344500	2
Turdus iliacus	Redwing	bird	Oakamoor Parish	Oakamoor	SK0544	31/12/2008	BTO Atlas 2008	Field Observation	27 Count	Not specified	2329	No	Yes	No	Yes	No	No	Original	False	405500	344500	2
Turdus iliacus	Redwing	bird	Cotton Parish	Windy Harbour	SK0648	27/01/2008	BTO Atlas 2008	Field Observation	397 Count	Not specified	2436	No	Yes	No	Yes	No	No	Original	False	406500	348500	2
Turdus iliacus	Redwing	bird	Ramshorn Common		SK0745	09/02/2008	BTO Atlas 2008	Field Observation	70 Count	Not specified	737	No	Yes	No	Yes	No	No	Original	False	407500	345500	2
Turdus iliacus	Redwing	bird	Ramshorn Parish	Ramshorn	SK0845	14/03/2009	BirdTrack 2009	Field Observation	80 Count	Not specified	1494	No	Yes	No	Yes	No	No	Original	False	408500	345500	2
Turdus iliacus	Redwing	bird	Ramshorn Parish	Kevin Quarry	SK0846	14/01/2005	West Midland Bird Club (5bq)	Field Observation	35 Count	Not specified	1391	No	Yes	No	Yes	No	No	Original	False	408500	346500	2
Turdus iliacus	Redwing	bird	Wootton Parish	Weaver Hills	SK0946	18/11/2006	BirdTrack 2006	Field Observation		Not specified	2369	No	Yes	No	Yes	No	No	Original	False	409500	346500	2
Turdus iliacus	Redwing	bird	Wootton Parish	Weaver Hills	SK0946	29/10/2006	BirdTrack 2006	Field Observation		Not specified	2369	No	Yes	No	Yes	No	No	Original	False	409500	346500	2

Scientific Name	Common Name	Informal Group	Location	Location Detail	Grid Ref.	Date	Source	Sample Method	Abundance	Record Type	Dist. from Site (m)	European Protection	UK Protection	Principle Concern	Rare	Invasive	StaffsINNS	Record Validity	Confidential	Easting	Northing	Precision
Turdus pilaris	Fieldfare	bird	Ramshorn Common		SK0745	05/04/2002	West Midland Bird Club (5bq)	Field Observation	223 Count	Not specified	737	No	Yes	No	Yes	No	No	Original	False	407500	345500	2
Turdus pilaris	Fieldfare	bird	Ramshorn Common		SK0745	28/11/2001	West Midland Bird Club (5bq)	Field Observation	150 Count	Not specified	737	No	Yes	No	Yes	No	No	Original	False	407500	345500	2
Turdus pilaris	Fieldfare	bird	Wootton Parish	Weaver Hills	SK0844	23/11/2005	BirdTrack 2005	Field Observation		Not specified	2129	No	Yes	No	Yes	No	No	Original	False	408500	344500	2
Turdus pilaris	Fieldfare	bird	Farley Parish	Wardlow Quarry	SK0847	18/12/2005	West Midland Bird Club (5bq)	Field Observation	65 Count	Not specified	1906	No	Yes	No	Yes	No	No	Original	False	408500	347500	2
Turdus pilaris	Fieldfare	bird	Wootton Parish	Weaver Hills	SK0946	08/11/2000	West Midland Bird Club (5bq)	Field Observation	77 Count	Not specified	2369	No	Yes	No	Yes	No	No	Original	False	409500	346500	2
Turdus pilaris	Fieldfare	bird	Wootton Parish	Weaver Hills	SK0946	15/04/2006	BirdTrack via WMBC	Field Observation	100 Count	Not specified	2369	No	Yes	No	Yes	No	No	Original	False	409500	346500	2
Turdus pilaris	Fieldfare	bird	Wootton Parish	Weaver Hills	SK0946	16/01/2001	West Midland Bird Club (5bq)	Field Observation	156 Count	Not specified	2369	No	Yes	No	Yes	No	No	Original	False	409500	346500	2
Turdus pilaris	Fieldfare	bird	Wootton Parish	Weaver Hills	SK0946	18/11/2006	BirdTrack 2006	Field Observation		Not specified	2369	No	Yes	No	Yes	No	No	Original	False	409500	346500	2
Turdus pilaris	Fieldfare	bird	Wootton Parish	Weaver Hills	SK0946	23/02/2002	West Midland Bird Club (5bq)	Field Observation	110 Count	Not specified	2369	No	Yes	No	Yes	No	No	Original	False	409500	346500	2
Turdus pilaris	Fieldfare	bird	Wootton Parish	Weaver Hills	SK0946	27/03/2009	West Midland Bird Club (3tz)	Field Observation	100 Count	Not specified	2369	No	Yes	No	Yes	No	No	Original	False	409500	346500	2
Turdus pilaris	Fieldfare	bird	Wootton Parish	Weaver Hills	SK0946	27/10/2005	West Midland Bird Club (5bq)	Field Observation	250 Count	Not specified	2369	No	Yes	No	Yes	No	No	Original	False	409500	346500	2
Turdus pilaris	Fieldfare	bird	Wootton Parish	Weaver Hills	SK0946	31/10/2009	BirdTrack 2009	Field Observation	200 Count	Not specified	2369	No	Yes	No	Yes	No	No	Original	False	409500	346500	2
Tyto alba	Barn Owl	bird	Oakamoor Parish	Oakamoor	SK0544	13/03/2010	West Midland Bird Club (3tz)	Field Observation	1 Count	Not specified	2329	No	Yes	Yes	Yes	No	No	Original	False	405500	344500	2
Tyto alba	Barn Owl	bird	Cotton Parish	Barn on Cotton Lane Farm, Cotton Lane	SK054470	15/06/2010	SER General Records 2010	Field Observation	1 Count of Alive	Not specified	1919	No	Yes	Yes	Yes	No	No	Original	False	405450	347050	3
Tyto alba	Barn Owl	bird	Cotton Parish	Cotton Banks	SK056468	25/09/2010	SER General Records 2010	Field Observation		Not specified	1651	No	Yes	Yes	Yes	No	No	Original	False	405650	346850	3
Tyto alba	Barn Owl	bird	Cotton Parish		SK0645	October 2001	Barn Owl Survey	Field Observation	1 Count of Dead	field record	917	No	Yes	Yes	Yes	No	No	Original	False	406500	345500	2
Tyto alba	Barn Owl	bird	Farley Parish	Ramshorn Common	SK0745	2004	SER General Records 2004	Field Observation		field record	737	No	Yes	Yes	Yes	No	No	Original	False	407500	345500	2
Tyto alba	Barn Owl	bird	Farley Parish	Ramshorn	SK083453	1980	Barn Owl Survey	Field Observation		field record	1439	No	Yes	Yes	Yes	No	No	Original	False	408350	345350	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Side Farm Meadows	Side Farm Meadows transects P to O	SK05664680	27/07/2015	SWT Nature Reserve Surveys 2015	Quadrat	occasional Count of DAFOR	Not specified	1619	No	Yes	No	No	No	No	Original	False	405665	346805	4
Hyacinthoides non-scripta	Bluebell	flowering plant	Side Farm Meadows	Side Farm Meadows transects Q to P	SK05694675	27/07/2015	SWT Nature Reserve Surveys 2015	Quadrat	abundant Count of DAFOR	Not specified	1571	No	Yes	No	No	No	No	Original	False	405695	346755	4
Hyacinthoides non-scripta	Bluebell	flowering plant	Side Farm Meadows	Side Farm Meadows transects R to Q	SK05734668	27/07/2015	SWT Nature Reserve Surveys 2015	Quadrat	occasional Count of DAFOR	Not specified	1509	No	Yes	No	No	No	No	Original	False	405735	346685	4
Hyacinthoides non-scripta	Bluebell	flowering plant	Upper Cotton Dell		SK058468	July 1993	County Survey 1986-94	Field Observation		Not specified	1473	No	Yes	No	No	No	No	Original	False	405850	346850	3

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Hyacinthoides non-scripta	Bluebell	flowering plant	Side Farm (grassland)		SK058469	10/09/1999	SBI 1998-2000 Resurvey Staffs Moorlands	Field Observation	occasional Count	field record	1523	No	Yes	No	No	No	No	Original	False	405850	346950	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Cotton Dell SWT Nature Reserve	Cotton Dell transects U to T	SK05934628	15/07/2015	SWT Nature Reserve Surveys 2015	Quadrat	abundant Count of DAFOR	Not specified	1219	No	Yes	No	No	No	No	Original	False	405935	346285	4
Hyacinthoides non-scripta	Bluebell	flowering plant	Cotton Dell SWT Nature Reserve	Cotton Dell transects D1 to C1	SK06014598	27/07/2015	SWT Nature Reserve Surveys 2015	Quadrat	occasional Count of DAFOR	Not specified	1143	No	Yes	No	No	No	No	Original	False	406015	345985	4
Hyacinthoides non-scripta	Bluebell	flowering plant	Cotton Dell SWT Nature Reserve	Cotton Dell transects H1 to G1	SK06034570	27/07/2015	SWT Nature Reserve Surveys 2015	Quadrat	occasional Count of DAFOR	Not specified	1197	No	Yes	No	No	No	No	Original	False	406035	345705	4
Hyacinthoides non-scripta	Bluebell	flowering plant	Star Wood		SK060455	05/07/1952	County Recorders (ESE)	Field Observation		Not specified	1250	No	Yes	No	No	No	No	Original	False	406050	345550	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Cotton Dell SWT Nature Reserve	3AI (W10)	SK060460	14/10/2002 - 18/10/2002	SWT Nature Reserve Surveys	Field Observation	occasional DAFOR	Not specified	1101	No	Yes	No	No	No	No	Original	False	406050	346050	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Cotton Dell		SK06054650	17/06/1982	County Survey 1978-84	Field Observation		Not specified	1148	No	Yes	No	No	No	No	Original	False	406055	346505	4
Hyacinthoides non-scripta	Bluebell	flowering plant	Cotton Dell SWT Nature Reserve	Cotton Dell transects Z to Y	SK06064617	15/07/2015	SWT Nature Reserve Surveys 2015	Quadrat	frequent Count of DAFOR	Not specified	1082	No	Yes	No	No	No	No	Original	False	406065	346175	4
Hyacinthoides non-scripta	Bluebell	flowering plant	Cotton Dell SWT Nature Reserve	Cotton Dell transects X to W	SK06064630	15/07/2015	SWT Nature Reserve Surveys 2015	Quadrat	frequent Count of DAFOR	Not specified	1093	No	Yes	No	No	No	No	Original	False	406065	346305	4
Hyacinthoides non-scripta	Bluebell	flowering plant	Cotton Dell SWT Nature Reserve		SK061454	03/06/2015	SWT Nature Reserve Surveys 2015	Field Observation	rare Count	Not specified	1218	No	Yes	No	No	No	No	Original	False	406150	345450	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Cotton Dell SWT Nature Reserve	3BI (W10e)	SK061460	14/10/2002 - 18/10/2002	SWT Nature Reserve Surveys	Field Observation	frequent DAFOR	Not specified	1002	No	Yes	No	No	No	No	Original	False	406150	346050	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Star Wood (north), near Cotton		SK064465	27/06/1979	County Survey 1978-84	Field Observation		Not specified	804	No	Yes	No	No	No	No	Original	False	406450	346550	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Cotton College (meadows adjacent to)		SK067465	18/05/2004	SBI 2004 Resurvey	Field Observation	locally abundant Count	field record	564	No	Yes	No	No	No	No	Original	False	406750	346550	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Longshaw (north-west of)		SK068455	27/06/1979	County Survey 1978-84	Field Observation		field record	670	No	Yes	No	No	No	No	Original	False	406850	345550	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Orrils Wood		SK07404475	24/09/1982	County Survey 1978-84	Field Observation		Not specified	1417	No	Yes	No	No	No	No	Original	False	407405	344755	4
Hyacinthoides non-scripta	Bluebell	flowering plant	Orrils Wood	broadleaved woodland	SK074447	26/04/2000	SBI 1998-2000 Resurvey Staffs Moorlands	Field Observation	locally abundant Count	field record	1431	No	Yes	No	No	No	No	Original	False	407450	344750	3
Hyacinthoides non-scripta	Bluebell	flowering plant	SK04S	Ramshorn Common	SK0745	1999	Staffordshire Flora	Field Observation		Not specified	737	No	Yes	No	No	No	No	Original	False	407500	345500	2
Hyacinthoides non-scripta	Bluebell	flowering plant	Ramshorn Common		SK075460	31/05/2007	Countdown 2010	Field Observation	occasional Count	field record	411	No	Yes	No	No	No	No	Original	False	407550	346050	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Basin Wood	scrub	SK076447	26/04/2000	SBI 1998-2000 Resurvey Staffs Moorlands	Field Observation	occasional Count	field record	1485	No	Yes	No	No	No	No	Original	False	407650	344750	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Ramshorn Common: Edgewells House (west of)		SK078458	27/06/1979	County Survey 1978-84	Field Observation		field record	759	No	Yes	No	No	No	No	Original	False	407850	345850	3

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Hyacinthoides non-scripta	Bluebell	flowering plant	Licks Wood (east)		SK083447	24/09/1982	County Survey 1978-84	Field Observation	locally dominant Count	field record	1841	No	Yes	No	No	No	No	Original	False	408350	344750	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Sycamore Farm	Hedges on either side of Green Lane	SK084456	16/07/1996	SBI 1996-97 Resurvey East Staffs	Field Observation	occasional Count	field record	1389	No	Yes	No	No	No	No	Original	False	408450	345650	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Sycamore Farm		SK084458	12/08/2004	SBI 2004 Resurvey	Field Observation	occasional Count	field record	1330	No	Yes	No	No	No	No	Original	False	408450	345850	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Wardlow Quarry (GI Site)		SK084468	21/08/1996	Grasslands Survey 1996	Field Observation	rare DAFOR	Not specified	1473	No	Yes	No	No	No	No	Original	False	408450	346850	3
Hyacinthoides non-scripta	Bluebell	flowering plant	Weaver Hills: The Walk	north wood	SK090462	15/07/1996	SBI 1996-97 Resurvey East Staffs	Field Observation	frequent Count	field record	1897	No	Yes	No	No	No	No	Original	False	409050	346250	3
Meles meles	Eurasian Badger	mammal	Present		SK0544	1991	Staffordshire Badger Group				2329	No	Yes	No	No	No	No	Validation	True			2
Meles meles	Eurasian Badger	mammal	Present		SK0545	2002	Staffordshire Mammal Group (3tw/9r6)				1769	No	Yes	No	No	No	No	Original	True			2
Meles meles	Eurasian Badger	mammal	Present		SK0545	2004	Staffordshire Mammal Group (3tw/9r6)				1769	No	Yes	No	No	No	No	Original	True			2
Meles meles	Eurasian Badger	mammal	Present		SK0545	2005	Staffordshire Mammal Group (3tw/9r6)				1769	No	Yes	No	No	No	No	Original	True			2
Meles meles	Eurasian Badger	mammal	Present		SK0545	2007	Staffordshire Mammal Group (3tw/9r6)				1769	No	Yes	No	No	No	No	Original	True			2
Meles meles	Eurasian Badger	mammal	Present		SK0545	2009	Staffordshire Mammal Group (3tw/9r6)				1769	No	Yes	No	No	No	No	Original	True			2
Meles meles	Eurasian Badger	mammal	Present		SK0545	2010	Staffordshire Mammal Group (3tw/9r6)				1769	No	Yes	No	No	No	No	Original	True			2
Meles meles	Eurasian Badger	mammal	Present		SK0545	2014	Staffordshire Mammal Group (3tw/9r6)				1968	No	Yes	No	No	No	No	Original	True			3
Meles meles	Eurasian Badger	mammal	Present		SK0546	1994	Staffordshire County Council				1682	No	Yes	No	No	No	No	Original	True			2
Meles meles	Eurasian Badger	mammal	Present		SK0546	1995	Staffordshire Badger Group				1784	No	Yes	No	No	No	No	Original	True			3
Meles meles	Eurasian Badger	mammal	Present		SK0546	1996	Staffordshire Badger Group				1399	No	Yes	No	No	No	No	Original	True			3
Meles meles	Eurasian Badger	mammal	Present		SK0546	1997	Staffordshire Badger Group				1784	No	Yes	No	No	No	No	Original	True			3
Meles meles	Eurasian Badger	mammal	Present		SK0546	1998	Staffordshire Badger Group				1399	No	Yes	No	No	No	No	Original	True			3
Meles meles	Eurasian Badger	mammal	Present		SK0546	2010	Consultants (Bow)				1915	No	Yes	No	No	No	No	Original	True			4
Meles meles	Eurasian Badger	mammal	Present		SK0546	2015	Staffordshire Mammal Group (3tw/9r6)				1698	No	Yes	No	No	No	No	Original	True			3

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Meles meles	Eurasian Badger	mammal	Present		SK0644	2003	Staffordshire Mammal Group (3tw/9r6)				1391	No	Yes	No	No	No	No	Original	True			3
Meles meles	Eurasian Badger	mammal	Present		SK0645	2004	Staffordshire Mammal Group (3tw/9r6)				847	No	Yes	No	No	No	No	Original	True			3
Meles meles	Eurasian Badger	mammal	Present		SK0645	2015	SWT Nature Reserve Surveys 2015				1339	No	Yes	No	No	No	No	Original	True			5
Meles meles	Eurasian Badger	mammal	Present		SK0646	2002	Staffordshire Mammal Group (3tw/9r6)				299	No	Yes	No	No	No	No	Original	True			3
Meles meles	Eurasian Badger	mammal	Present		SK0647	1993	Staffordshire Badger Group				1611	No	Yes	No	No	No	No	Original	True			3
Meles meles	Eurasian Badger	mammal	Present		SK0647	2006	Staffordshire Badger Group (3kn)				1611	No	Yes	No	No	No	No	Original	True			3
Meles meles	Eurasian Badger	mammal	Present		SK0745	2004	SER General Records 2004				737	No	Yes	No	No	No	No	Original	True			2
Meles meles	Eurasian Badger	mammal	Present		SK0746	1993	Staffordshire Badger Group				537	No	Yes	No	No	No	No	Original	True			3
Meles meles	Eurasian Badger	mammal	Present		SK0746	2005	SER Badger Records				508	No	Yes	No	No	No	No	Original	True			3
Meles meles	Eurasian Badger	mammal	Present		SK0746	2009	Staffordshire Mammal Group (3tw/9r6)				698	No	Yes	No	No	No	No	Original	True			3
Meles meles	Eurasian Badger	mammal	Present		SK0747	2001	Staffordshire Mammal Group (3tw/9r6)				1399	No	Yes	No	No	No	No	Original	True			3
Meles meles	Eurasian Badger	mammal	Present		SK0748	2014	Staffordshire Mammal Group (3tw/9r6)				2375	No	Yes	No	No	No	No	Original	True			2
Mustela putorius	Polecat	mammal	Oakamoor Parish	Oakamoor	SK0544	2004	Staffordshire Mammal Group (3tw/9r6)	Field Observation	1 Count of Adult	Not specified	2329	No	Yes	Yes	No	No	No	Original	False	405500	344500	2
Mustela putorius	Polecat	mammal	Ramshorn Parish	Cauldon Low	SK083469	29/10/2014	National Polecat Survey	Camera trap	1 Count	Not specified	1439	No	Yes	Yes	No	No	No	Original	False	408350	346950	3
Chiroptera	a bat	mammal - bat	Oakamoor Parish		SK0545	04/08/1998	Staffordshire Bat Group (SER Records)	Field Observation	1 Count	Not specified	1769	Yes	Yes	No	No	No	No	Original	False	405500	345500	2
Chiroptera	a bat	mammal - bat	Cotton Parish	Cotton College, Nr.Cotton	SK065464	18/08/1989	Natural England Files	Field Observation	1 Count	field record	669	Yes	Yes	No	No	No	No	Original	False	406550	346450	3
Chiroptera	a bat	mammal - bat	Wootton Park (overview)	Ramsor, Oakamoor*	SK08204523	August 1984	Staffordshire Bat Group (SER Records)	Field Observation		Not specified	1394	Yes	Yes	No	No	No	No	Original	True	408205	345235	4
Myotis	Myotis Bat species	mammal - bat	Moneystone Quarry		SK05454597	08/07/2014	Consultants (Bow)	Field Observation		Not specified	1699	Yes	Yes	No	No	No	No	Original	False	405455	345975	4
Myotis	Myotis Bat species	mammal - bat	Cotton Parish	Slang (Cotton)	SK068464	17/06/2003	Staffordshire Mammal Group (3tw/9r6)	Field Observation	1 Count of Adult	Not specified	423	Yes	Yes	No	No	No	No	Original	False	406850	346450	3

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Myotis mystacinus/brandtii	Whiskered/Brandt's Bat	mammal - bat	Oakamoor Parish	school	SK0544	09/11/1998	Staffordshire Bat Group (SER Records)	Field Observation	1 Count of Alive	caught	2329	Yes	Yes	No	No	No	No	Requires Confirmation	False	405500	344500	2
Nyctalus/Eptesicus agg.	a bat	mammal - bat	Oakamoor Parish	Oakamoor (near Cheadle) (NBMP site code: 120118)	SK0545	04/08/1998	National Bat Monitoring Programme	Field transect	1 Count	Not specified	1769	Yes	Yes	No	No	No	No	Requires Confirmation	False	405500	345500	2
Pipistrellus	Pipistrelle Bat species	mammal - bat	Oakamoor Parish	Oakamoor (near Cheadle) (NBMP site code: 120118)	SK0545	04/08/1998	National Bat Monitoring Programme	Field transect	2 Count	Not specified	1769	Yes	Yes	No	No	No	No	Original	False	405500	345500	2
Pipistrellus	Pipistrelle Bat species	mammal - bat	Oakamoor Parish	Oakamoor (near Cheadle) (NBMP site code: 120118)	SK0545	07/07/2003	National Bat Monitoring Programme	Field transect	1 Count	Not specified	1769	Yes	Yes	No	No	No	No	Original	False	405500	345500	2
Pipistrellus	Pipistrelle Bat species	mammal - bat	Oakamoor Parish	Oakamoor (near Cheadle) (NBMP site code: 120118)	SK0545	11/07/2000	National Bat Monitoring Programme	Field transect	2 Count	Not specified	1769	Yes	Yes	No	No	No	No	Original	False	405500	345500	2
Pipistrellus	Pipistrelle Bat species	mammal - bat	Oakamoor Parish	Oakamoor (near Cheadle) (NBMP site code: 120118)	SK0545	25/07/2000	National Bat Monitoring Programme	Field transect	5 Count	Not specified	1769	Yes	Yes	No	No	No	No	Original	False	405500	345500	2
Pipistrellus pipistrellus sensu lato	Pipistrelle	mammal - bat	Oakamoor Parish	Oakamoor	SK0544	07/06/1985	Staffordshire Bat Group (SER Records)	Field Observation	1 Count of In Flight	field record	2329	Yes	Yes	Yes	No	No	No	Requires Confirmation	True	405500	344500	2
Pipistrellus pipistrellus sensu lato	Pipistrelle	mammal - bat	Oakamoor Parish	ST10 3BA*	SK0544	12/07/2013	Staffordshire Bat Group (SER Records)	SBG grounded bat	1 Count of Immature Male	Roost	2329	Yes	Yes	Yes	No	No	No	Original	False	405500	344500	2
Pipistrellus pipistrellus sensu lato	Pipistrelle	mammal - bat	Oakamoor Parish	St Wilfrid's Cottages, Cotton*	SK06434587	27/08/2008	Staffordshire Bat Group (SER Records)	SBG grounded bat	1 Count of Juvenile	grounded bat	764	Yes	Yes	Yes	No	No	No	Original	False	406435	345875	4
Pipistrellus pipistrellus sensu lato	Pipistrelle	mammal - bat	Cotton Parish	Cotton Abbey Hotel	SK065463	31/08/1989	Staffordshire Bat Group (SER Records)	Field Observation	1 Count of Immature Female; 1 Count of Dead	field record	630	Yes	Yes	Yes	No	No	No	Validation	True	406550	346350	3
Pipistrellus pipistrellus sensu lato	Pipistrelle	mammal - bat	Farley Parish	Ramshorn Common	SK0745	2004	SER General Records 2004	Field Observation		field record	737	Yes	Yes	Yes	No	No	No	Original	False	407500	345500	2
Pipistrellus pipistrellus sensu stricto	Common Pipistrelle	mammal - bat	Oakamoor Parish	Oakamoor (near Cheadle) (NBMP site code: 120118)	SK0545	03/07/2002	National Bat Monitoring Programme	Field transect	25 Count	Not specified	1769	Yes	Yes	Yes	No	No	No	Original	False	405500	345500	2
Pipistrellus pipistrellus sensu stricto	Common Pipistrelle	mammal - bat	Oakamoor Parish		SK0545	03/07/2002	Staffordshire Bat Group (SER Records)	Field Observation	25 Count	Not specified	1769	Yes	Yes	Yes	No	No	No	Original	False	405500	345500	2
Pipistrellus pipistrellus sensu stricto	Common Pipistrelle	mammal - bat	Oakamoor Parish	Oakamoor (near Cheadle) (NBMP site code: 120118)	SK0545	04/08/1998	National Bat Monitoring Programme	Field transect	10 Count	Not specified	1769	Yes	Yes	Yes	No	No	No	Original	False	405500	345500	2
Pipistrellus pipistrellus sensu stricto	Common Pipistrelle	mammal - bat	Oakamoor Parish		SK0545	04/08/1998	Staffordshire Bat Group (SER Records)	Field Observation	10 Count	Not specified	1769	Yes	Yes	Yes	No	No	No	Original	False	405500	345500	2

Scientific Name	Common Name	Informal Group	Location	Location Detail	Grid Ref.	Date	Source	Sample Method	Abundance	Record Type	Dist. from Site (m)	European Protection	UK Protection	Principle Concern	Rare	Invasive	StaffsINNS	Record Validity	Confidential	Easting	Northing	Precision
Pipistrellus pipistrellus sensu stricto	Common Pipistrelle	mammal - bat	Oakamoor Parish	Oakamoor (near Cheadle) (NBMP site code: 120118)	SK0545	07/07/2003	National Bat Monitoring Programme	Field transect	5 Count	Not specified	1769	Yes	Yes	Yes	No	No	No	Original	False	405500	345500	2
Pipistrellus pipistrellus sensu stricto	Common Pipistrelle	mammal - bat	Oakamoor Parish		SK0545	07/07/2003	Staffordshire Bat Group (SER Records)	Field Observation	5 Count	Not specified	1769	Yes	Yes	Yes	No	No	No	Original	False	405500	345500	2
Pipistrellus pipistrellus sensu stricto	Common Pipistrelle	mammal - bat	Oakamoor Parish	Oakamoor (near Cheadle) (NBMP site code: 120118)	SK0545	11/07/2000	National Bat Monitoring Programme	Field transect	4 Count	Not specified	1769	Yes	Yes	Yes	No	No	No	Original	False	405500	345500	2
Pipistrellus pipistrellus sensu stricto	Common Pipistrelle	mammal - bat	Oakamoor Parish		SK0545	11/07/2000	Staffordshire Bat Group (SER Records)	Field Observation	4 Count	Not specified	1769	Yes	Yes	Yes	No	No	No	Original	False	405500	345500	2
Pipistrellus pipistrellus sensu stricto	Common Pipistrelle	mammal - bat	Oakamoor Parish	Oakamoor (near Cheadle) (NBMP site code: 120118)	SK0545	15/07/1998	National Bat Monitoring Programme	Field transect	4 Count	Not specified	1769	Yes	Yes	Yes	No	No	No	Original	False	405500	345500	2
Pipistrellus pipistrellus sensu stricto	Common Pipistrelle	mammal - bat	Oakamoor Parish		SK0545	15/07/1998	Staffordshire Bat Group (SER Records)	Field Observation	4 Count	Not specified	1769	Yes	Yes	Yes	No	No	No	Original	False	405500	345500	2
Pipistrellus pipistrellus sensu stricto	Common Pipistrelle	mammal - bat	Oakamoor Parish	Oakamoor (near Cheadle) (NBMP site code: 120118)	SK0545	25/07/2000	National Bat Monitoring Programme	Field transect	3 Count	Not specified	1769	Yes	Yes	Yes	No	No	No	Original	False	405500	345500	2
Pipistrellus pipistrellus sensu stricto	Common Pipistrelle	mammal - bat	Oakamoor Parish		SK0545	25/07/2000	Staffordshire Bat Group (SER Records)	Field Observation	3 Count	Not specified	1769	Yes	Yes	Yes	No	No	No	Original	False	405500	345500	2
Anguis fragilis	Slow-worm	reptile	Heathy Gore (south)		SK055463	10/07/2008	SBI 2008 Resurvey	Field Observation		Not specified	1608	No	Yes	Yes	No	No	No	Original	False	405550	346350	3
Anguis fragilis	Slow-worm	reptile	Cotton Dell (res)		SK059456	30/06/2014	SWT ad hoc records	Photographic record	1 Count of Alive	Not specified	1296	No	Yes	Yes	No	No	No	Original	False	405950	345650	3
Natrix natrix	Grass Snake	reptile	Oakamoor Parish		SK0544	17/07/1991	Staffordshire BRC data	Field Observation		Not specified	2329	No	Yes	Yes	No	No	No	Validation	False	405500	344500	2
Natrix natrix	Grass Snake	reptile	Oakamoor Parish		SK0544	1959	BRC - Monks Wood Data	Field Observation		field record	2329	No	Yes	Yes	No	No	No	Original	False	405500	344500	2
Natrix natrix	Grass Snake	reptile	Churnet Valley (overview)		SK0544	20/07/1974	Staffordshire BRC data	Field Observation		field record	2329	No	Yes	Yes	No	No	No	Original	False	405500	344500	2
Natrix natrix	Grass Snake	reptile	Cotton Dell SWT Nature Reserve		SK0572145124	01/08/2013	SWT Nature Reserve Surveys 2013	Field Observation	1 Count of Alive	Not specified	1754	No	Yes	Yes	No	No	No	Original	False	405722	345125	5
Natrix natrix	Grass Snake	reptile	Cotton Dell (res)		SK059456	30/06/2014	SWT ad hoc records	Photographic record	1 Count of Alive	Not specified	1296	No	Yes	Yes	No	No	No	Original	False	405950	345650	3
Natrix natrix	Grass Snake	reptile	Cotton Dell SWT Nature Reserve		SK064457	2000	Staffordshire BAP Records	Field Observation		field record	804	No	Yes	Yes	No	No	No	Original	False	406450	345750	3
Natrix natrix	Grass Snake	reptile	Longshaw (north-west of)		SK067455	September 1976	Staffordshire BRC data	Field Observation		field record	720	No	Yes	Yes	No	No	No	Requires Confirmation	False	406750	345550	3
Natrix natrix	Grass Snake	reptile	Longshaw (north-west of)		SK074459	April 1987	Staffordshire BRC data	Field Observation		field record	359	No	Yes	Yes	No	No	No	Original	False	407450	345950	3
Natrix natrix	Grass Snake	reptile	Farley Parish	Ramshorn Common	SK0745	2004	SER General Records 2004	Field Observation		field record	737	No	Yes	Yes	No	No	No	Original	False	407500	345500	2
Natrix natrix	Grass Snake	reptile	Cote Farm		SK077448	18/06/1978	Staffordshire BRC data	Field Observation		field record	1430	No	Yes	Yes	No	No	No	Original	False	407750	344850	3

Scientific Name	Common Name	Informal Group	Location	Location Detail	Grid Ref.	Date	Source	Sample Method	Abundance	Record Type	Dist. from Site (m)	European Protection	UK Protection	Principle Concern	Rare	Invasive	StaffsINNS	Record Validity	Confidential	Easting	Northing	Precision
Natrix natrix	Grass Snake	reptile	Farley Parish	road	SK078455	July 1984	Staffordshire BRC data	Field Observation		field record	920	No	Yes	Yes	No	No	No	Requires Confirmation	False	407850	345550	3
Natrix natrix	Grass Snake	reptile	Ramshorn Parish	Wootton Park	SK081445	April 1982	Staffordshire BRC data	Field Observation		field record	1884	No	Yes	Yes	No	No	No	Original	False	408150	344550	3
Natrix natrix	Grass Snake	reptile	Oakamoor Parish		SK081445	April 1982	Staffordshire BRC data	Field Observation		field record	1884	No	Yes	Yes	No	No	No	Original	False	408150	344550	3
Natrix natrix	Grass Snake	reptile	Ramshorn Parish		SK082449	May 1983	Staffordshire BRC data	Field Observation		field record	1625	No	Yes	Yes	No	No	No	Original	False	408250	344950	3
Natrix natrix	Grass Snake	reptile	Ramshorn Parish		SK082449	May 1983	Staffordshire BRC data	Field Observation		field record	1625	No	Yes	Yes	No	No	No	Original	False	408250	344950	3
Natrix natrix	Grass Snake	reptile	Ramshorn Parish		SK082451	August 1982	Staffordshire BRC data	Field Observation		field record	1484	No	Yes	Yes	No	No	No	Original	False	408250	345150	3
Natrix natrix	Grass Snake	reptile	Farley Parish	lane between garden	SK082452	1984	Staffordshire BRC data	Field Observation		field record	1418	No	Yes	Yes	No	No	No	Original	False	408250	345250	3
Natrix natrix	Grass Snake	reptile	Ramshorn Parish	road between garden and lane	SK082452	22/07/1976	Staffordshire BRC data	Field Observation		field record	1418	No	Yes	Yes	No	No	No	Original	False	408250	345250	3
Natrix natrix	Grass Snake	reptile	Ramshorn Parish		SK082452	22/07/1976	Staffordshire BRC data	Field Observation		field record	1418	No	Yes	Yes	No	No	No	Original	False	408250	345250	3
Natrix natrix	Grass Snake	reptile	Farley Parish	Longshaw	SK082452	August 1981	Staffordshire BRC data	Field Observation		field record	1418	No	Yes	Yes	No	No	No	Original	False	408250	345250	3
Natrix natrix	Grass Snake	reptile	Ramshorn Parish		SK082452	August 1981	Staffordshire BRC data	Field Observation		field record	1418	No	Yes	Yes	No	No	No	Original	False	408250	345250	3
Natrix natrix	Grass Snake	reptile	Farley Parish	lane	SK082452	August 1984	Staffordshire BRC data	Field Observation		field record	1418	No	Yes	Yes	No	No	No	Original	False	408250	345250	3
Natrix natrix	Grass Snake	reptile	Ramshorn Parish		SK082452	August 1986	Staffordshire BRC data	Field Observation		field record	1418	No	Yes	Yes	No	No	No	Original	False	408250	345250	3
Natrix natrix	Grass Snake	reptile	Ramshorn Parish		SK082452	August 1986	Staffordshire BRC data	Field Observation		field record	1418	No	Yes	Yes	No	No	No	Original	False	408250	345250	3
Natrix natrix	Grass Snake	reptile	Ramshorn Parish	garden	SK082452	July 1989	Staffordshire BRC data	Field Observation		field record	1418	No	Yes	Yes	No	No	No	Original	False	408250	345250	3
Natrix natrix	Grass Snake	reptile	Longshaw (north-west of)		SK082452	May 1987	Staffordshire BRC data	Field Observation		field record	1418	No	Yes	Yes	No	No	No	Original	False	408250	345250	3
Natrix natrix	Grass Snake	reptile	Ramshorn Parish		SK082452	September 1987	Staffordshire BRC data	Field Observation		field record	1418	No	Yes	Yes	No	No	No	Original	False	408250	345250	3
Natrix natrix	Grass Snake	reptile	Weaver Hills: The Walk	Weaver Hills	SK0946	27/05/1975	Staffordshire BRC data	Field Observation		field record	2369	No	Yes	Yes	No	No	No	Original	False	409500	346500	2
Vipera berus	Adder	reptile	Oakamoor Parish		SK0645	August 1976 - September 1976	Staffordshire BRC data	Field Observation		Not specified	917	No	Yes	Yes	No	No	No	Requires Confirmation	False	406500	345500	2
Vipera berus	Adder	reptile	Farley Parish	Ramsor	SK082452	August 1981	Staffordshire BRC data	Field Observation		field record	1418	No	Yes	Yes	No	No	No	Original	False	408250	345250	3

APPENDIX III

Botanical Species List Star Bank, Oakamoor

Appendix III Botanical Species List Star Bank, Oakamoor

Common Name	Scientific Name	DAFOR			
		General	Grassland	Pond	Hedge
Woody species					
Blackthorn	*Prunus spinosa*				A
Butterfly bush	*Buddleja davidii*	R			
Bramble	*Rubus fruticosus* agg.	O			
Hawthorn	*Crataegus monogyna*				A
Grasses, sedges and rushes					
Bulrush (prev. grt Reedmace)	*Typha latifolia*			D	
Cock's-foot	*Dactylis glomerata*	O	A		
Red fescue	*Festuca rubra*	F	F		
Soft-rush	*Juncus effusus*			A	
Yorkshire fog	*Holcus lanatus*				
Forbs					
Broad-leaved dock	*Rumex obtusifolius*	F	F		
Common hogweed	*Heracleum sphondylium*	O	LO		
Common knapweed	*Centaurea nigra*		LO		
Common nettle	*Urtica dioica*	F			
Creeping buttercup	*Ranunculus repens*	F	F		
Creeping thistle	*Cirsium arvense*	R			
Dandelion	*Taraxacum officinale* agg.	O	O		
Herb-Robert	*Geranium robertianum*	O			
Lady's mantle spp. (non-native)	*Alchemilla* sp.	R			
Ribwort plantain	*Plantago lanceolata*		LO		
Rosebay willowherb	*Chamerion angustifolium*	O			
Selfheal	*Prunella vulgaris*		O		
Smooth sow-thistle	*Sonchus oleraceus*	R			
Spear thistle	*Cirsium vulgare*	LF			
Vetch sp.	*Lathyrus* sp.		R-O		
White clover	*Trifolium repens*	LF			
Willowherb species	*Epilobium sp.*	O			
Other					
Dryopteris fern species	*Dryopteris* sp.	R			
Field horsetail	*Equisetum arvense*		LF	F	

DAFOR Key:
D = Dominant
A = Abundant
F = Frequent
O = Occasional
R = Rare
L = Locally

APPENDIX IV

Building Inspection Results

Appendix IV Building Inspection Results

Building Number	Description	Suitability for & Evidence of Bats	Roost Potential Classification
B1	Single-storey stone barn with pitched roof covered with corrugated asbestos and supported by large wooden timbers. Pointing on external walls mostly intact, but several deep crevices into stonework on gable ends and above wooden door lintels. Walls approx 18" thick with several open doorways providing access to interior. Internal rooms open to ridge with partial height walls dividing the space at ground level. Ridge beam exposed, providing no shelter for bats. Internal walls rendered with no obvious holes or crevices. No obvious gaps at joints in roof timbers.	Low suitability for brown long-eared bats due to roof structure and lack of shelter at ridge. Deep crevice features in walls that may be used by crevice dwelling species. Primarily suitable for summer use, but potentially also some limited opportunities for hibernation within the walls. No evidence of bat presence found.	High
B2	Two-storey stone barn with pitched roof covered with clay tiles and supported by wooden rafters. Walls approx 18" thick. Two small rooms on ground floor with wooden steps leading to single room on upper floor with large unglazed window on gable end. Roof in poor condition with large holes on both pitches where tiles have fallen. Partially lined with bitumen felt. Multiple deep crevices in external stonework. Crevices between uneven roof tiles.	Low suitability for brown long-eared bats due to poor condition of roof and resulting ingress of wind & rain. Deep crevice features in walls and gaps between uneven roof tiles that may be used by crevice dwelling species. No evidence of bat presence found.	High
B3	Large steel framed warehouse type barn with breezeblock walls and roof of corrugated asbestos.	May provide sheltered conditions for foraging bats, particularly on windy nights but no obvious potential roost features. No evidence of bat presence found.	Negligible
B4	Large steel-framed warehouse type barn adjacent to B3. Breezeblock walls and sloping roof of corrugated asbestos. Open on two sides.		Negligible
B5	Large open-sided barn, steel frame with breezeblock walls and corrugated asbestos roof.		Negligible

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