

woodlands. The thin strip of woodland along the roadside on Gartree Road near Stoughton Farm Park did contain some typical woodland species such as dog's-mercury, Lords-and-Ladies and wood false brome. A sparrowhawk and kestrel were recorded in two copses (refer to Map 6, Page 19).

There are also a few small blocks of woodland dominated by non-native species such as false acacia and copper beech. Also, a new plantation on land belonging to the commercial nursery comprises of sapling trees of birches, poplar and maples. Small blocks of plantation mixed and coniferous woodland occur adjacent to buildings and comprise of oak, ash, Scot's pine and Leyland cypress. Scattered trees of varying ages also occur along hedgerows, road verges and field margins. Species include pedunculate oak, ash and Lombardy poplar. Dense scrub occurs in field corners and is dominated by dense stands of blackthorn and bramble. Scattered hawthorn and elder scrub occurs along field boundaries.

Evaluation

The mature woodlands and mature trees are considered important ecological features in the landscape. The 'Parish' value of Stackyard Spinney and Dams Spinney and the 'County' value of roadside woodland on Gartree Road at Stoughton Farm Park is reflected in their LERC designations (refer to Map 7, Page 21). In addition, the importance of broadleaved woodland is reflected in its inclusion on the UK BAP and Leicester, Leicestershire and Rutland BAP as a habitat of conservation concern. The presence of many large mature trees is a feature of the landscape in the study area. These included at least two trees (located at grid ref SK626020) likely to qualify for veteran status (these are trees considered to be of particular value due to antiquity, large size and the presence of associated habitats such as deadwood). Mature trees (including veterans) are a priority habitat on the Leicester, Leicestershire and Rutland BAP. Several trees have Tree Preservation Orders (TPOs) (refer to Map 4, Page 12). The woodlands are generally well established, include many large mature trees and have a reasonable structure. The shrub layer of many of the woodlands contains the non-native snowberry. The woodlands are likely to provide habitat for a range of typical species; including protected species such as badger, bats and notable bird species. The scrub is also likely to provide habitat for nesting birds. The mature scattered trees are important landscape features and provide habitat for fungi, insects, birds and bats. Little owls were recorded breeding in a mature white willow tree to the east of Stoughton Road (refer to Map 6, Page 19).

Wetlands

Habitat Types

- Dry ditch
- Running water
- Standing water (eutrophic)



Photo 10: Most wetland is found in the form of brooks

Descriptions

Due to lack of access it was not possible to survey the watercourses in detail. The descriptions relate to small sections that were visible from roads and footpaths. Several watercourses including dry ditches, drains, brooks and streams occur within the study area. A kingfisher was seen foraging along Bushby Brook, on the northern side of the area (refer to Map 6, Page 19). The banks of the majority of the watercourses are lined with willow trees and shrubs including hawthorn and elder. The brook running through Brook Spinney is lined with some mature pollard willows. Overhanging trees have led to heavy shading of the watercourses. The brooks and streams have slow-sluggish running water, with mud and gravelly substrate. All watercourses appear to have steep to shallow earth banks.

Only two areas of standing water are noted in the area (apart from the likely garden ponds in Stoughton). These comprise a fishing pond at Stoughton Farm Park and a small pond in the thin strip of roadside woodland along Gartree Road near Stoughton Farm Park. The farm pond has bare earth banks with occasional trees and shrubs. The water is green and appears highly eutrophic. Waterfowl use the pond and grazing and poaching by waterfowl has resulted in the banks being largely bare of herbaceous vegetation. The presence of waterfowl and fish may explain the highly eutrophic water. No aquatic plants were recorded. The pond in the woodland has limited marginal and

aquatic vegetation and is surrounded by mature trees and shrubs.

Evaluation

The brooks, stream and ponds will provide habitat for fish, aquatic invertebrates, mammals and birds. The watercourses also act as important 'wildlife corridors' along which plants and animals can disperse. The importance of standing water and streams is reflected in their inclusion on the UK BAP and Leicester, Leicestershire and Rutland BAP as habitats of conservation concern. Shading by bankside trees and shrubs may be reducing the value of the watercourses by inhibiting the growth of herbaceous bankside vegetation and marginal and aquatic vegetation. This in turn will reduce their value for water voles. The fields surrounding the watercourses are likely to have a significant effect on them. Any run-off from fertilisers and pesticides could wash into the watercourses. 'Buffer zones' on the margins of fields will help reduce the effects of run-off.

Hedgerows

Habitat Types

- Species-poor hedgerow (with and without trees)
- Species-rich hedgerow (with trees)

Descriptions

Hedgerows form the boundaries of the majority of the fields in the study area. They are mainly intact, with some gaps and are a mix of trimmed and unmanaged hedgerows with an average height of approximately 2m. Most are species-poor and dominated by either



Photo 11: Species-rich hedgerow edges

hawthorn or blackthorn. There are three species-rich hedgerows (for the purposes of the strategy species-rich hedgerows include those that are composed of eight or more native woody species in their length) on and adjacent to Gartree Road on the southern side of the area (refer to Map 6, Page 19). Shrub species include hazel, field maple, dog wood and wild plum. Many hedgerows contain scattered mature standard trees including pedunculate oak and ash. No ground flora species associated with woodlands were recorded

in any of the hedgerows. Two hedgerows on the eastern side of the area contained the highly invasive, non-native species Japanese knotweed (refer to Map 6, Page 19). Whitethroat, yellowhammer and reed bunting were recorded either singing or holding territory in hedgerows (refer to Map 6, Page 19). Other typical farmland birds are also likely to be present.

Evaluation

Although the majority of the hedgerows in the area are species-poor and do not contain any unusual features, all hedgerows are of ecological value. They will provide 'wildlife corridors' across the area, along which plants and animals can disperse. They will also provide habitat for small mammals, nesting birds and potential cover for amphibians and reptiles. The value of many of the hedgerows is increased due to the presence of many mature standard trees, which increases the structural diversity and provides additional habitat opportunities. The importance of hedgerows is reflected by its listing on the UK BAP and the Leicester, Leicestershire and Rutland BAP as a habitat of conservation concern. The local importance of one of the hedgerows is reflected in its designation as a feature of 'Parish' level importance (refer to Map 7, Page 21). None of the hedgerows in the area are likely to qualify as 'important' using ecological criteria, under the 1997 Hedgerow Regulations.

Other Habitats

- Introduced shrubs
- Tall ruderal vegetation

Descriptions

Patches of non-native, introduced shrubs occur around buildings, car parks and residential gardens. Limited areas of tall ruderal vegetation comprising of tall herbs and rank grasses were found throughout the area, mainly against field boundaries and around buildings.

Evaluation

Although these are botanically species-poor habitats, they will add to the habitat diversity of the area and provide habitat for insects, mammals and birds.

Surrounding Habitats

The study area is situated on the eastern outskirts of Leicester. The northern, north western, southern and south western boundaries of the area adjoin residential areas of Thurnby and Oadby. To the north there is also a school playing field and recreation ground and Thurnby Brook and Bushby Brook. To the east, south east and further to the north east of the area there is open countryside comprising of large agricultural fields lined with hedgerows, with pockets of woodland. Leicester

airport also occurs to the south east. To the west there is an Arboretum (comprising planted woodland, trees, tall and short grassland and a stream), a field and Leicestershire Golf Course (comprising mown grassland, tall grassland and planted trees).

There are numerous County Wildlife Sites and 'Parish' level sites in the surrounding area. The majority of the adjacent Wildlife Sites are grassland and woodland areas in the Arboretum and golf course to the west. Numerous 'Parish' level sites occur in the wider countryside to the north and east of the area. These include grassland, woodland, hedgerow and pond sites. Watercourses and hedgerows link the study area with the wider countryside to the east. However, Shady Lane and Gartree Road separate the area from the semi-natural habitats to the west.



Photo 12: Wildflowers found along hedgerow edges

Flora

No rare or specially protected plant species are known for the area and no areas of particular botanical interest were identified, apart from the small areas of 'less improved' grasslands.

It is of note that two hedgerows contain small patches of Japanese knotweed (a non-native, highly invasive plant) (refer to Map 6, Page 19). Japanese knotweed is regarded as the most invasive plant in Britain. It can colonise most habitats including grassland and river banks and can grow through walls, tarmac and concrete (Environment Agency 1994). It is an aggressive competitor and will out-compete native plant species.

Fauna

The variety of habitats in the area will provide habitat opportunities for a wide range of characteristic faunal

species. The mature woodlands and hedgerows in the area provide potential sett building habitat for badgers and the grassland and arable fields provide suitable foraging habitat. Badgers have been previously recorded from the area, although no specific evidence of them was found during the survey. Numerous trees within the woodlands and the scattered mature trees alongside road verges, field margins and hedgerows contain features such as cracks and holes, suitable for roosting bats (e.g. refer to Map 6, Page 19). The farm buildings and residential properties also provide bat roosting opportunities. The woodlands and hedgerows also provide sheltered conditions for insects and therefore will provide bat foraging habitat and the network of hedgerows and watercourses will also provide important bat commuting routes. Bat roosts have been previously recorded from local churches and residential properties in the study area and in the vicinity.

The woodlands, hedgerows, trees, shrubs and fields provide potential habitat for a variety of bird species (e.g. refer to Map 6, Page 19). These include several declining farmland species of conservation concern that are listed on UK BAP and the RSPB 'red list' and 'amber list' of species of conservation concern (RSPB 2002) (refer to Map 6, Page 19). Barn owl, reed bunting and yellowhammer are listed on the Red List and kestrel, kingfisher and yellow wagtail are listed on the Amber List. Barn owl is the only species recorded listed with a specific Action Plan on the Leicester, Leicestershire and Rutland BAP, although it is likely that other BAP species do occur. It is possible that barn owl nest in buildings or trees in the area. Breeding little owls were noted in a mature white willow tree. A kestrel was observed breeding in an old crow nest in a small copse. A male reed bunting was observed holding territory in a hedgerow. A male yellowhammer and male whitethroat were recorded singing from hedgerows. A female sparrowhawk was observed circling a small copse. A yellow wagtail nest was observed in the crops of an arable field. The only specially protected bird species recorded for the area are barn owl (on Stoughton Road) and kingfisher (recorded on Bushby Brook). It is considered unlikely that kingfishers are breeding in the area, as no steep earth cliffs suitable for nesting were noted near watercourses.

Water voles have been previously recorded from Stoughton Farm Park pond and Bushby Brook. However, the watercourses appear to provide poor habitat for water voles, as they are heavily shaded by adjacent trees and shrubs.

The ponds provide potential breeding habitat for

'Red list' species are birds of high conservation concern, having declined in the UK by 50% or more in breeding population or breeding range over the last 25 years.

'Amber list' species are birds of medium conservation concern, having declined by between 25% and 49% in breeding population or breeding range over the last 25 years.

amphibians. The farm pond is likely to provide poor habitat due to the lack of vegetation and the presence of fish and waterfowl. The woodland pond will provide more suitable habitat as it contains vegetation. Great crested newts have been previously recorded to the west of the area, although the nature of the habitat is such that it is considered unlikely that they are in the study area.

Grass snakes have been previously recorded in the vicinity of Bushby Brook. The area provides some habitat for reptiles, although it is limited in extent with much of this area being comprised of large arable and improved fields.

Legislation

Japanese Knotweed

Under Schedule 9, part II, of the Wildlife and Countryside Act (WCA) 1981 (as amended) makes it an offence to plant or cause Japanese knotweed to grow in the wild.

Badgers

Badgers and their setts are protected under the Protection of Badgers Act 1992. Under this Act it is illegal to destroy, damage or obstruct access to a sett or disturb a badger while it is using its sett. A sett is defined, under the Act, as any structure or place showing signs of current or recent occupation by a badger. Under the current interpretation of the act, licences are required for the following operations:

- Use of hand tools within 10 metres of a badger sett;
- Use of light machinery within 20 metres of a badger sett;
- Use of heavy machinery within 30 metres of a badger sett.

Bats

All species of British bat and their roosts receive full protection under both the WCA 1981 (as amended) and the Conservation (Natural Habitats, & c.) Regulations 1994. This makes an offence to kill, injure or disturb a bat and to destroy any place used for rest and shelter by a bat.

Bird

All nesting birds, their eggs, young and nests are protected under the WCA (1981). Some birds, such as kingfisher and barn owl, are also listed on Schedule 1 of the WCA (1981) and are protected by special penalties at all times, including against harm, disturbance, or destruction of nests.

Reptiles

All native reptiles are protected under the WCA 1981 (as amended) from intentional or reckless killing or injuring.

Water Voles

Water voles are protected under Schedule 5 of the WCA

1981 (as amended), in respect of Section 9(4). This makes it illegal to intentionally or recklessly damage, destroy or obstruct access to any structure or place which water voles use for shelter or protection and to disturb water voles while they are using such a place.