Action for Biodiversity

Supporting the London Biodiversity Action Plan

London Biodiversity Partnership

Message from the Chair of the London Biodiversity Partnership

"The success of the London Biodiversity Partnership depends on improving the lives of London's inhabitants, wild and human. We have partners in place to implement these improvements, with the London Biodiversity Action Plan as a guiding framework, and we have delivered many projects so far. However, the key threats to London's biodiversity are ever present, and we need to shift our activities up a gear. The time is right, with new resources for the Partnership's secretariat, and new funding streams and support from Government in place.

"This document has a central role to play, and builds on the Funding Strategy the Partnership produced in 2003. ***Action for Biodiversity*** *is a clear and concise 'calling card' for potential funders and new partners, and includes an up to date set of action plan summaries. Cost estimates are attached, alongside key work requiring funding and other support. I encourage everyone who uses the document - current and new partners – to provide feedback so we can maintain as an accurate, live and evolving tool for action. I look forward to further successes."*

James Farrell, Chair of the London Biodiversity Partnership Project Board

London Biodiversity Partnership – Mission Statement

The mission of the London Biodiversity Partnership is to ensure delivery of the London Biodiversity Action Plan, assist the delivery of national biodiversity action and facilitate regional biodiversity action.

The Partnership will:

- Facilitate partners to implement the London Biodiversity Action Plan
- Facilitate secure project funding to deliver biodiversity action
- Act as a link between the London Biodiversity Action Plans, borough and company Plans and the UK Biodiversity Action Plan
- Provide guidance to businesses, boroughs and other organisations preparing and implementing Biodiversity Action Plans, avoiding duplication of effort and ensuring maximum efficiency in the maintenance of biodiversity
- Maintain an audit of London's priority species and habitats
- Help to develop new Action Plans where necessary
- Communicate to promote biodiversity to Londoners
- Recruit new organisations to the partnership
- Serve as a focus for interaction with Biodiversity Action Plans in other capital cities, particularly in Europe

Contents

Biodiversity

'Biodiversity is all living things, from the tiny garden ant to the giant redwood tree. You will find biodiversity almost everywhere, in window boxes and wild woods, roadsides and rain forests, snow fields and sea shore.'
(Biodiversity: The UK Steering Group Report 1996)

Biodiversity – the variety and interaction of living things – forms the Earth's life-support system. It helps provide many natural resources, such as clean water, flood control, breathable air and fertile soil. Biodiversity provides us with our food and helps clean up our waste. Without it we couldn't survive; no organism lives in isolation from other living things, and each contributes to the balance and very survival of the planet.

However, human activities are destroying and changing biodiversity on an ever-increasing scale. Extinction of species, loss of soil cover and pollution of air and water all reduce the effectiveness of the ecological systems on which we depend.

The widest variety of habitats and species need to be protected and conserved, not just the rare and endangered. A high quality natural environment not only supports habitats for wildlife, but also contributes to the well-being of the human population. This is especially important in towns and cities, where places for people to have direct contact with nature need to be provided.

We all have a part to play in safeguarding the earth's biodiversity: London is no exception. The London Biodiversity Partnership is working together to bring about its vision of a city rich in wildlife, enjoyed by people.

The London Biodiversity Partnership

The United Kingdom was one of 150 countries that signed the Convention on Biological Diversity during the Earth Summit at Rio de Janeiro in 1992 (www.biodiv.org). Each country is required to produce a National Biodiversity Action Plan to ensure the survival of endangered species and habitats, and to promote the conservation of biodiversity.

The UK is at the forefront of biodiversity planning. The UK Biodiversity Action Plan was produced in 1994 (www.ukbap.org.uk). This plan identifies the most vulnerable or threatened habitats and species, and those for which this country has a special responsibility, as priorities for action at a national level. However the plan also highlights the importance of local and regional action.

In 1996 the London Biodiversity Partnership was formed. The Partnership is composed of public, business, land management and voluntary organisations, all committed to London's biodiversity. The Partnership was formed for the following purposes:

- To establish an effective partnership of organisations working together to preserve and nurture biodiversity in London
- To carry out a Biodiversity Audit for London
- Based on that audit, to publish and implement a London Biodiversity Action Plan, including Action Plans for habitats and species

Its full mission statement is at the front of this Prospectus (page 2). Over 30 partner organisations have signed up to the Partnership, enabling it to draw on a wide range of experience and expertise from all sectors, working together in a way that was not possible before.

Heathland is a priority habitat in the UK Biodiversity Action Plan, which occurs in just a few places in London, for example, Wimbledon Common and Hounslow Heath. This action plan will improve the management of our remaining heathland and restore some former heathland sites.

The black redstart has been associated with London since it colonised bombsites after the Second World War. It now occurs mainly on industrial sites. This action plan has inspired developers to incorporate wildlife habitat in urban regeneration.

The London Biodiversity Action Plan

The London Biodiversity Action Plan takes forward the biodiversity planning process at a regional level. It seeks to protect nationally scarce habitats and priority species where these are found within the capital and it also identifies habitats and species that are declining or vulnerable on a regional scale.

However, at the heart of the programme is the aim to enhance the enjoyment of nature by Londoners. As well as rarities, the London Biodiversity Action Plan therefore features some quite widespread habitats and species, especially those that are characteristic of London, which provide good opportunities for people to experience 'hands on' contact with the natural world. Enabling access to nature is seen as a vital contribution to the health and quality of life of Londoners and a cornerstone of sustainable development.

House sparrows have declined sharply in the UK since the early 1990s, and notably in London. This Action Plan invited Londoners to contribute to a survey to help understand the problem.

Chalk grassland once occurred as extensive flower-rich downland. The remaining fragments are often threatened by invading scrub. This Action Plan will open up access and bring back colourful flowers like these pyramidal orchids.

The Audit

In January 2000 the London Biodiversity Partnership published Volume 1 of the London Biodiversity Action Plan, 'The Audit', which takes stock of London's priority habitats and species, and provides an assessment of their status, threats and needs.

The Action

Volume 2 'The Action' (first published in 2001) so far contains 32 action plans: 12 habitats, 12 species, and 8 cross-cutting, generic issues. It also has statements for the house martin, 'humble bumble' and London's exotic flora. The approach is one of habitat-based conservation; the species action plans have been written mainly for species whose needs cannot be covered by the habitat action plans.

Pages 9-36 give a brief overview of all the Action Plans. The full details are available on the website www.lbp.org.uk.

Supporting the London Biodiversity Action Plan

Key to the London Biodiversity Action Plan is the importance it places on the value of wildlife for Londoners. Many of the Habitat and Species Action Plans involve opportunities for people to observe and enjoy the wildlife, or to get involved by volunteering to help out with the work needed.

For example, as part of the Grey Heron Action Plan over 2,000 people were able to enjoy the dramatic spectacle of grey herons caring for young in their nests. Over 9,000 Londoners contributed to a survey for the House Sparrow Action Plan, helping to build up a picture of the ecology of house sparrows in the capital, the largest-ever public survey of a single species in the UK. As part of the Bat Action Plan over 700 people have attended guided bat walks through the London Bat Group.

Supporting the London Biodiversity Action Plan not only benefits biodiversity and wildlife in London, it directly benefits Londoners by giving them more opportunities to see and enjoy the rich diversity of nature that exists in the capital, which can often go unnoticed.

There are many ways to support Biodiversity in London and the Partnership's work:

- Sponsorship or Funding for the Action Plans (see page 8)
- Promoting the Partnership's work
- Groups of Volunteers to help with specific Actions (see page 8)
- Gifts in Kind, such as equipment, materials, expertise (e.g. marketing) etc
- Sponsorship or Funding for the Partnership
- An organisation producing its own Biodiversity Action Plan with guidance from the Partnership (see page 37)

If you, or an organisation with which you are involved, would like to get involved in any way please contact the Partnership.

The water vole is a UK priority species that survives along a few watercourses within London. It has strong cultural links and considerable public appeal.

Churchyards and cemeteries offer islands of calm with the urban environment. This action plan encourages their characteristic communities of birds, ferns and lichens and seeks to help Londoners enjoy these special places.

Case Studies – Funding in Action

Reedbeds

The company Reed Elsevier has worked in partnership with the Royal Parks and the London Biodiversity Partnership to fund the creation of a new reedbed habitat in Regent's Park.

Staff from Reed Elsevier have also volunteered their time to help plant the reedbed (see photo on right).

"At Reed Elsevier, we believe environmental issues matter and therefore actively try and reduce our environmental impact. When searching for a biodiversity project to support, it was important to us that it should be local to a significant number of our offices, so as to provide opportunities to engage our employees. The reedbed project matches this criteria and also fits perfectly with our RE Cares community programme with its central focus on education for disadvantaged young people, as large numbers of inner city school children will be able to enjoy a new natural resource in the capital. Our employees spent several days planting the beds and testing their green thumbs and, along with local residents and visitors, will be able to watch it grow. Our involvement in this project is a public signal of Reed Elsevier's commitment to biodiversity. Ultimately though, it was the reedbed project's obvious link to our company name that proved irresistible!"

Mark Gough, Environmental Coordinator, Reed Elsevier

Water Voles

The Environment Agency has worked in partnership with the London Wildlife Trust and the London Biodiversity Partnership to fund the Water Vole Project. This funding has helped the project to work with site managers to monitor water vole populations and begin mink trapping programmes to protect the water voles.

"Supporting this project since 2001 has been a key project for the Environment Agency and personally has given me invaluable support with technical advice and the co-ordinated overview this threatened species needs."

Antonia Scarr, Environment Agency

The Action Plans

The Action Plans

The following pages give an overview of the different Habitat and Species Action Plans in the London Biodiversity Action Plan, as well as the Generic Action Plans.

Each Habitat or Species Action Plan gives the following information:

Action Plan Lead: the partner with overall responsibility for coordinating the action plan.

Flagship Species: (habitats only) the special plants and animals that are characteristic of the habitat.

Summary: some background on the habitat or species.

Actions already taken: work already done under the action plan.

Action for the future: indications of the type of work still to do under the action plan, for which we are seeking funding and support. There is also scope for developing further projects.

Action Costs

For most of the future actions it is very difficult to give an exact cost; it can vary greatly according to the location of the habitats, the extent of work needing to be carried out, the timing of work, availability and cost of contractors, and many other unforeseen factors. Therefore the actions have been split out into three different cost bands, based on an estimate of their potential costs:

Up to £10,000	£10,000 to £50,000	Over £50,000

UK Priorities

UK Priority

Action Plans marked with the "UK Priority" symbol (left), as well as being part of the London Biodiversity Action Plan, are also national priorities in the UK Biodiversity Plan and contribute to national biodiversity targets.

More information

The full Action Plans have much more detail regarding specific actions and issues about the individual habitats or species; they are available to read or download from the website: www.lbp.org.uk.

Generic Actions

In addition to the specific action described in the individual Habitat and Species Action Plans, there are generic actions that lie across several plans. The Partnership has identified 8 Generic Action Plans, each with one or more objectives:

Site Management

- To ensure that biodiversity conservation objectives are incorporated into plans, briefs, statements and other documents relating to the management of public open spaces in London.

Habitat Protection

- To ensure that planners, developers and others are fully aware of and responsive to their responsibilities to protect wildlife habitat.

Species Protection

- To ensure that planners, developers and others are fully aware of their responsibilities in respect of protected species.

Ecological Monitoring

- To employ, encourage, develop and maintain long-term monitoring schemes for London's wildlife habitats and species, to indicate the status of London's biodiversity.

Biological Records

- To establish a biological records centre for London to collate and disseminate a wide-range of biological information, linked to the National Biodiversity Network.

Communications

- To provide strategic communications support for the partnership
- To support effectively the communications work of the individual Action Plans
- To produce a communications strategy to set out how the Partnership can encourage a greater understanding of biodiversity conservation and involve a wider audience in the delivery of the action plans.

Funding

- To maintain a funding strategy which identifies actions that require external funding and makes proposals for increasing funding availability.

Built Structures

Action Plan Lead: Peabody Trust

Summary

The urban environment of London means that its wildlife depends not only on green spaces, but also on the artificial fabric of the city: buildings, bridges and car parks, wharfs and jetties, masts and chimneys. Some species, such as bats, swift, house martin, jumping zebra-spider, London rocket and maidenhair spleenwort, are almost wholly confined to built structures or spend a significant amount of their lives in, on or around them. It is important that the management of buildings in London takes account of wildlife, and that new development is built with biodiversity in mind. The London Biodiversity Partnership, (through English Nature and the Greater London Authority) worked with the London Development Agency to produce the 'Design for Biodiversity' brochure, alongside an internal toolkit for the London Development Agency, to help their land and property team take full account of biodiversity.

London's priority habitats and species are influenced by built structures, and some depend on them for their existence. Some particularly relevant Action Plans are: Tidal Thames, Wasteland, Bats, Black Redstart, Sand Martin, House Sparrow, Grey Heron and Peregrine Falcon.

Aims

- To encourage developers, architects, designers, planners and others to design for biodiversity
- To collate evidence on the biodiversity benefit of green roofs, walls and other approaches to designing for biodiversity
- To promote the existing and potential biodiversity conservation value of built structures.

Action for the future

Action	Cost Band
Organise 'Birds on Buildings' event to raise awareness of birds breeding on built structures.	£10,000 to £50,000
Organise a 'Bugs on Buildings' event to raise awareness to green roof manufacturers and contractors, developers and architects, of the potential for habitat creation.	Up to £10,000
Organise a 'Plants on Buildings' event to raise awareness of contemporary research of roof plant performance and potential conservation opportunities.	Up to £10,000

Acid Grassland

UK Priority

Action Plan Lead: The Royal Parks

Flagship Species: Harebell, sheep's sorrel, heath Bedstraw, waxcap fungi, small copper butterfly, red-banded sand wasp and the green woodpecker.

Summary

As its name suggests, acid grassland develops over acidic soils, usually derived from free-draining sand and gravel low in nutrients. It generally consists of fine-leaved grasses and associated wildflowers, such as common bent, red and sheep's fescues, wavy hair-grass, sheep's sorrel, tormentil, cat's-ear and heath bedstraw. The acid grasslands of Greater London appear to be the natural home of a distinctive group of insects and spiders. Most acid grassland in London is found in public open spaces and golf courses, where it is lost in providing more formal recreational areas and the reconfiguration of greens and fairways. It is also now uncommon through extensive development, conversion to farmland and quarrying for aggregates.

Aims

- To ensure the protection and optimal management of acid grassland in Greater London
- To improve on existing knowledge of its ecological value in the regional context
- To develop a more universal appreciation of the habitat and its wildlife, and secure the involvement of Londoners in its conservation

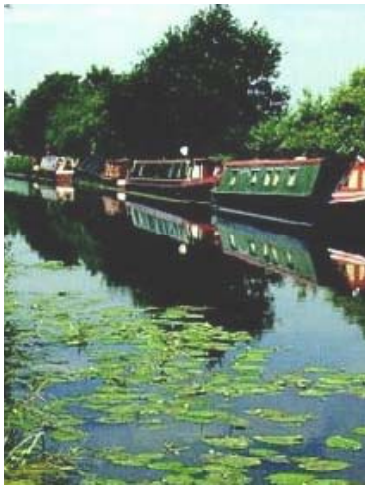
Action already taken

- Ongoing management and/or restoration of acid grassland in key sites such as: Mitcham and Wimbledon Commons, Hounslow Heath, Wanstead Flats and Richmond Park
- Best practice habitat management guidelines produced and distributed to local authorities and site managers

Action for the future

Action	Cost Band
Commission a data review, conduct a survey and produce a report evaluating the conservation status of invertebrates of acid grassland in Greater London	£10,000 to £50,000
Produce an educational resource pack on acid grassland aimed at a public audience	Up to £10,000

Canals



Action Plan Lead: British Waterways

Flagship Species: Mute swan, blue damselflies, spiked water-milfoil, skullcap, daubenton's bat and water vole.

Summary

Canals and waterways in London provide an important refuge for water birds, bats, fish and many other species of aquatic life. They act as linear habitats, stretching though 15 London boroughs and linking many wildlife sites together. Their character varies greatly from one stretch to another, but all are important to the local communities who live on either side, through offering a quiet space in the busy urban environment, with opportunities for recreation such as boating, angling and bird watching. The quality of the canal environment varies greatly and is often under considerable pressure. Vandalism, rubbish, pollution, historic contamination, inappropriate development and the pressures of recreation may all cause problems. Balancing demands such as cycling, walking and boating, whilst also maintaining biodiversity, requires sensitive and careful management.

Aims

- To increase knowledge and understanding of canals and associated habitats in London
- To ensure the protection, enhancement and appropriate management of canal habitats in London for the benefit of biodiversity and enjoyment of current and future generations
- To realise the potential of the canal and its biodiversity as an accessible resource for education, recreation and public involvement

Action already taken

- Audit completed of all invasive species for London's canals and waterways
- Installed habitat and fish refuge platforms on the River Lea at Tottenham

Action for the future

Action	Cost Band
Survey remaining areas of Regents Canal, extend to the Hertford Union and the Limehouse Cut	Up to £10,000
Habitat enhancement along canal in West London, the Paddington Arm and the Grand Union	Up to £10,000
Audit terrestrial invasive species and coordinate control	Up to £10,000

Chalk Grassland

UK Priority

Action Plan Lead: London Borough of Bromley

Flagship Species: Pyramidal orchid, marjoram, quaking grass, yellow meadow ant and the marbled white and small blue butterflies.

Chalk grassland develops on shallow lime-rich soils that are nutrient-poor and free-draining. It supports a wide array of wildflowers, butterflies, grasshoppers and other invertebrates, many of which are restricted to chalk soils. Traditionally chalk grasslands we kept open largely by grazing, primarily by sheep, although rabbits were also responsible for maintaining a short sward. Grazing declined after the 19th century and by 1945 few areas in London were grazed. In the 1950s myxomatosis devastated the rabbit population, which further reduced the grazing pressure and led to the spread of scrub and eventually woodland.

Aims

- To coordinate the protection, management and restoration of London's chalk grassland
- To ensure that the need for habitat restoration and management of London's chalk grasslands is widely understood and accepted
- To enable the public to enjoy chalk grassland

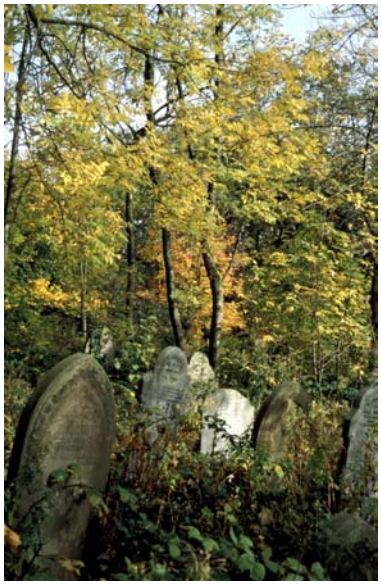
Action already taken

- Complete audit of all chalk grassland sites
- 'Chalking Up London's Downs' (2003) – a questionnaire for visitors to London's chalk grassland, followed by the production of a leaflet to encourage public access and enjoyment

Action for the future

Action	Cost Band
Identify potential chalk grassland sites in London for reversion and restoration or habitat creation, and implement on at least 2 sites annually	Over £50,000
Produce a cultural heritage slide pack and PowerPoint presentation to promote chalk grassland to the public	Up to £10,000
Develop a downland area grazing scheme, and ensure existing chalk grassland is maintained and enhanced by appropriate management	£10,000 to £50,000

Churchyards and Cemeteries



Action Plan Lead: Greater London Authority

Flagship Species: Wall ferns, holly blue butterfly, green woodpecker, lichens and the cuckooflower.

Summary

Churchyards and cemeteries make a significant contribution to the provision of urban greenspace in London, offering a quiet sanctuary for both people and wildlife. London's cemeteries contain a wide variety of habitats, including grassland, woodland, scrub and wetland.

Species also include bats, stag beetle, spotted flycatcher, tawny owl and song thrush, as well as holly blue, speckled wood and orange tip butterflies. The gravestones, monuments and walls may host ferns, invertebrates, lichens, fungi and mosses.

Aims

- To develop a strategic approach to the protection, management and enhancement of the nature conservation value of cemeteries and churchyards
- To respect the primary purpose of cemeteries and churchyards, which is that of burial and as a space to accommodate grieving visitors
- To secure the involvement of all London's faiths and communities in the conservation of churchyards and cemeteries, by raising awareness

Action already taken

- Dissemination of advice for biodiversity in burial ground management

Action for the future

Action	Cost Band
Develop and coordinate a burial grounds public survey	£10,000 to £50,000
Review the biodiversity content of existing cemetery management training, and offer workshops as required	£10,000 to £50,000
Review and revise existing school education packs	Up to £10,000

Heathland

UK Priority

Action Plan Lead: English Nature

Flagship Species: Heather, cross-leaved heath, bell heather, dwarf gorse, common gorse, linnet, green tiger beetle and the bumblebee.

Summary

Although natural in appearance, heathland is a product of human activity, such as burning and grazing, over hundreds, if not thousands, of years. It is important as the last refuge of a distinctive group of plants and animals, including heather, dwarf gorse, the linnet, the green hairstreak butterfly and the adder. Lowland heathland is a scarce and declining habitat in Europe and is of global importance, as the UK has 20% of the world's remaining heathland. Heathland in public open spaces and golf courses is at risk from demands for more formal recreational use.

Aims

- To develop a strategic approach to the protection, management, creation and restoration of heathland in London
- To promote the value of healthland and secure the involvement of Londoners in its conservation

Action already taken

- Identified key heathland species with specialist requirements
- Evaluated restoration funding requirements for heathland sites
- Developed/distributed contacts for walk leaders and speakers to site managers
- Produced targeted and costed heathland restoration and creation strategy

Action for the future

Action	Cost Band
Produce best practice habitat management guidelines	Up to £10,000
Maintain annual programme of training for site managers	Up to £10,000
Initiate restoration and creation of heathland on suitable sites as outlined in the restoration study	Over £50,000
Produce a leaflet on London's heathland resource	Up to £10,000

Parks and Urban Green Spaces

Action Plan Lead: Greater London Authority

Flagship Species: Oxeye daisy, buttercup, lady's bedstraw, great tit, robin, song thrush, house sparrow, bumblebee, holly blue and meadow brown butterflies, six spot burnet moth and the hedgehog.

Summary

Parks, squares and other amenity green spaces are important in providing access to green landscapes close to home. Alongside their social and recreational roles, they are valued by many for providing an opportunity for contact with the natural world – be it birds, butterflies or simply enjoying being out in the fresh air in a living landscape. London has some of the finest parks in the world, with great wildlife interest. But others fall far short of what is desirable and also lack significant wildlife value. Many of these have potential for enhancement. This action plan works through the London Parks and Green Spaces Forum, seeking to enhance the natural value of parks whilst respecting their varied uses and constraints of management.

Aims

- To encourage good conservation practice in parks and green spaces, respecting their varied functions and the aspirations of local communities
- To improve access to nature in London's parks and green spaces, particularly in areas of need
- To raise awareness of the importance of parks, squares and green spaces in the conservation of London's biodiversity

Action already taken

- Regular series of seminars to identify and promote best practice
- Boroughs and parks management making local biodiversity improvements
- Survey of bird life in small parks and squares

Action for the future

Action	Cost Band
Improvements to individual parks and green spaces	£10,000 to £50,000
Park lake restoration in individual parks, or whole park restoration including biodiversity enhancements	Over £50,000
Best practice guidebook	£10,000 to £50,000

Private Gardens

Action Plan Lead: London Wildlife Trust

Flagship species: Hedgehog, common frog, dragonflies, damselflies, wren, blackbird, ladybird and the bumblebee.

Summary

Private gardens form an important part of London's landscape. For many people these are the places where they have most frequent contact with nature. Garden ponds support amphibians and dragonflies, dense undergrowth provides good breeding sites for small birds, and hedgehogs, bats, butterflies, stag beetles and other invertebrates are associated with private gardens. Larger gardens may help support grass snakes, badgers, foxes and many birds, including woodpeckers.

The design and approach to management has a profound effect on the wildlife associated with gardens. Excessive pesticides are one of the potential causes of the decline of certain species, especially birds and hedgehogs.

Aims

- To highlight and protect the overall resource for wildlife provided by private gardens in London
- To improve individual private gardens as habitat for a range of local wildlife

Action already taken

- Londoners' Wildlife Gardening Day at the Natural History Museum
- Wildlife Gardening Guide for London's wildlife gardeners
- Attitudinal surveys of garden centre users
- Survey of home pesticide use

Action for the future

Action	Cost Band
Support garden centres in marketing wildlife-friendly products and providing advice and guidance	Up to £10,000
Workshops to raise profile of wildlife gardening criteria and categories in 'Borough in Bloom' competitions	£10,000 to £50,000

Reedbeds

UK Priority

Action Plan Lead: Wildfowl and Wetlands Trust

Flagship Species: Common reed, ruddy darter, twin-spotted wainscot, common eel, bittern and reed warbler

Summary

Reedbeds are areas of shallow water dominated by a tall wetland grass called common reed, with cane-like stems that last throughout the winter. Reedbeds are home to birds such as the water rail, reed and sedge warblers, also the water vole, harvest mouse and many invertebrate species. Newcomers to London's reedbeds include the bittern and the otter.

Factors affecting reedbeds include: potential sea level rise, water pollution, low freshwater flows raising salinity levels, management neglect, the invasion of non-native species (such as Canada geese and Chinese mitten crabs) and water-based recreation.

Aims

- To ensure the protection and optimal management of reedbeds in Greater London
- To demonstrate the value of reedbeds and to promote their creation in the urban environment

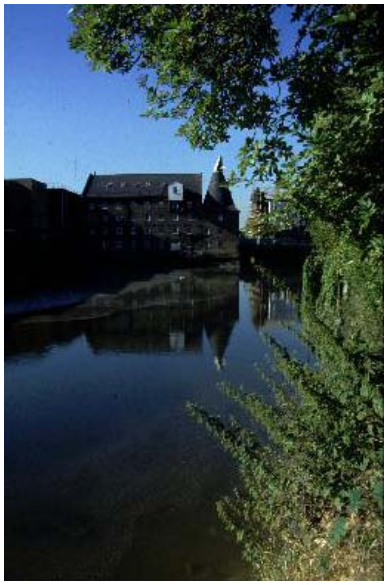
Action already taken

- Development of a 500m^2 reedbed area on the north eastern shore of St James's Park lake (project supported by Reed Elsevier)

Action for the future

Action	Cost Band
Implement at least 4 reedbed creation projects each of 2 hectares or larger	Over £50,000
Establish 10 new small reedbeds where opportunities occur and in areas of known deficiency	£10,000 to £50,000
Produce and distribute best practice guidelines to all appropriate reedbed managers	Up to £10,000
Publish promotional leaflet on key/accessible reedbeds	Up to £10,000

Rivers and Streams



Action Plan Lead: Environment Agency

Flagship Species: Daubenton's bat, water vole, kingfisher, grey wagtail, common eel, banded demoiselle, water-crowfoots, water-cress and crack willow.

Summary

The rivers and streams of Greater London comprise all free-flowing watercourses that are above the tidal limit. Together these total over 600km in length, with many smaller watercourses such as drainage ditches further increasing this network. There are strong overlaps with other Habitat Action Plans, such as Woodland, Canals and Reedbeds.

This range of habitat supports a large variety of plant and animal species as well as being of recreational, cultural, heritage and landscape importance. However since the Industrial Revolution many London rivers have been progressively straightened and culverted ("boxed in" under ground) leaving sterile channels of low ecological and social value. Rivers such as the Fleet, Tyburn and Effra were lost altogether below ground, forming part of the city's sewerage system. Today the priority is to prevent further degradation of riverine habitats and to enhance their biodiversity, improve flood management, provide new opportunities for recreation and regeneration, and thereby improve the quality of life in London.

Aims

- To maintain and enhance the ecological value of London's rivers and their associated habitats
- To maintain and restore the natural processes and continuity of London's rivers
- To increase and promote the contribution of rivers towards quality of life in London

Action for the future

Action	Cost Band
Audit and collate existing data on London's rivers, and identify and map areas of opportunity and threats to habitat.	£10,000 to £50,000
Produce best practice guidelines for developments adjacent to rivers and streams, and distribute to targeted audiences.	Up to £10,000
Establish five dedicated self-sustained river catchment flagship projects on five rivers by 2010.	Over £50,000

Tidal Thames

Action Plan Lead: Thames Estuary Partnership

Flagship Species: Common tern, grey heron, oystercatcher, teal, purple loosestrife, hemlock water-dropwart, sea aster, two-lipped door snail, flounder, Atlantic salmon and smelt.

Summary

The Tidal Thames is London's largest continuous wildlife corridor, supporting species and habitats not found elsewhere in the capital. It is a 'wildlife superhighway', a vital link and migration route for many species. The Tidal Thames can be separated into three broad habitats: freshwater, brackish and marine. Since the 1960s there has been a general trend of recovery and improvement within the Tidal Thames, as a result of improvements in water quality. Today the Tidal Thames supports a diverse flora and rich populations of invertebrates, fish and birds. This Action Plan is the London part of the wider Tidal Thames Habitat Action Plan, a strategic plan for the whole estuary created in partnership with Kent and Essex.

Aims

- To conserve and enhance the wildlife habitats, species diversity and local distinctiveness of the Tidal Thames
- To adopt a strategic approach to deliver biodiversity targets for the Tidal Thames as a whole
- To promote public awareness and appreciation of the Tidal Thames

Action already taken

- Biodiversity incorporated into strategies and plans that include the 'Blue Ribbon' concept in the Mayor's London Plan, Thames Strategy East and City to Sea
- Production of Tidal Thames Habitat and Species Audit

Action for the future

Action	Cost Band
Education and low tide events on the Estuary to communicate biodiversity priorities to wider Thames community	Up to £10,000
Develop and distribute guidance for habitat management	Up to £10,000
Deliver biodiversity priorities in State of the Estuary project	£10,000 to £50,000
Implement Thames habitat enhancement scheme	Over £50,000

Wasteland

Action Plan Lead: London Wildlife Trust

Flagship Species: Black redstart, linnet, common lizard, false London rocket, rosebay willowherb, teasel, viper's bugloss, buttoned snout, common blue and small copper butterflies, wormwood and the 'humble bumble'.

Summary

Wasteland comprises the range of habitats that develop on land, the industrial, commercial or residential use of which has declined or ceased. The biodiversity supported can be stunning and unique; wasteland provides ideal foraging habitat for birds like goldfinches, linnets and black redstarts. Wasteland can provide important open spaces for local people in London and are often seen as being the only truly 'wild' city spaces remaining for the public to enjoy. In many built up areas wasteland may be the sole natural greenspace available. Beyond recreational value, wasteland often exhibits a fascinating mix of native and exotic species, reflecting London's past and present international trade and diverse cultural energies.

Aims

- To highlight and promote the value of London's wastelands for people and wildlife
- To promote the appropriate retention, incorporation and management of wasteland habitats within new developments in London
- To maintain a diverse network of wasteland sites

Action already taken

- Research and dissemination for developed survey methodology for wasteland

Action for the future

Action	Cost Band
Develop and disseminate wasteland management guidance to relevant construction industry contacts	£10,000 to £50,000
Hold a wasteland awareness day, annual conference and other events for landowners, boroughs and land managers	£10,000 to £50,000
Identify and enable five publicly accessible wasteland sites with potential for habitat creation or retention	Over £50,000
Develop and provide guidance for landowners/managers on the wildlife and community value of temporary wasteland sites	£10,000 to £50,000

Woodland

UK Priority

Action Plan Lead: Greater London Authority

Flagship Species: Bluebell, wild service tree, hornbeam, badger, stag beetle, great spotted woodpecker, speckled wood butterfly, common dormouse and bats.

London contains wonderful woodlands that spread from the Green Belt almost to the city centre, covering about 4.5% of London, and they are rich in biodiversity. Many have public access, affording London's residents a leafy retreat from the urban environment. However, lack of appropriate management is a major factor affecting woodland today, as markets for certain types of wood fall away. Dumping and vandalism can be a problem, as can damage by animals and disease.

Aims

- To conserve and enhance London's woodland for the benefit of biodiversity and for both current and future generations of people
- To maintain, improve and promote the enjoyment and use of London's woodlands
- To increase significantly the area of woodland in London, particularly in areas where there is little accessible woodland
- To increase the sustainable economic use of woodland in London

Action already taken

- Production of a Tree and Woodland Framework setting out a vision for London and priorities for action

Action for the future

Action	Cost Band
Improve management of six flagship woodlands	Over £50,000
Disseminate advice on woodland management using six flagship sites as examples of best practice	Up to £10,000
Improve public access, enjoyment and community involvement through the six flagship woodlands and woodlands generally	£10,000 to £50,000
Carry out a survey of the management of London's woodlands	Up to £10,000
Initiate and develop training in woodland management	Over £50,000

Bats

UK Priority

Action Plan Lead: London Bat Group

Bats are highly adapted nocturnal mammals – the only ones to have evolved powered flight. It is known that at least 8 species breed in Greater London. Bats are an excellent indicator of the quality of our environment, as their complex ecological requirements leave them highly sensitive to environmental changes. They are generally only seen at dusk and their nocturnal habits have resulted in popular misconceptions and even fear of them.

With the loss of natural roost sites in trees and woodlands, many bats have adapted to living in buildings, and Londoners can sometimes find them lodging in the roof during the summer. Their reliance on buildings for roosting greatly focuses conservation efforts on encouraging people's tolerance and goodwill. Although they are among the most protected of species of British wildlife legally, disturbance of bats and destruction of roosts still goes on. Less direct threats come from changes in land use, leading to loss of feeding habitat, and disruption to flight-paths by development and floodlighting.

Aims

- To reverse the current population declines in London's bats
- To redress Londoner's misconceptions about bats and secure their status as culturally valued species

Action already taken

- Promotion of best practice to all major tree contractors/wardens through written letters and the 'Bats in Trees' leaflet
- Programme of guided bat walks for the general public
- Collation of current and historical records for bat populations in London

Action for the future

Action	Cost Band
Creation of new roost opportunities (from simple 'bat boxes' to elaborate hibernacula) on 40 identified sites	£10,000 to £50,000
Maintain programme of guided bat walks	Up to £10,000
Training programmes for use of bat detectors, guides for bat walks, and bat box inspection and roost visitor licenses	Up to £10,000

Black Poplar

Action Plan Lead: Natural History Museum

Summary

Until recently the native black poplar was largely a forgotten tree. Where it occurred it was just assumed to be one of the several types of hybrid poplars that can be found in many open spaces in London. The true native black poplar is a very scarce species, and usually found in wet areas, typically alongside streams and rivers. It is characterised by its large and ungainly appearance with massively arching, down-curved branches and heavily burred, often leaning trunk.

In the past, black poplar wood has been used in mill buildings and for brake blocks, as it is heat and fire resistant. Its shock absorbent properties were exploited in wagon bottoms and it was used to make rifle butts in the First World War. Thin branches from pollarded black poplars have been used for hurdles and fruit baskets in place of hazel and willow.

An action plan is needed for this species because of its rarity, generally elderly age profile and likely inability to reproduce sexually due to genetic pollution from hybrid poplars. It will probably be reliant for some time on the planting of cuttings.

Aims

- To protect existing trees and encourage restoration in appropriate locations through planned planting
- To inform and educate landowners, managers and the public about black poplars
- To ascertain, maintain and increase a diverse age structure and genetic diversity of the London population

Action already taken

- Safeguarding of existing trees by ensuring Tree Protection Orders
- Explore past and possible uses for black poplar wood

Action for the future

Action	Cost Band
Phase two of London black poplar survey	Up to £10,000
Increase black poplar numbers through laboratory research	Up to £10,000
Establish long-term planting scheme	Up to £10,000

Black Redstart

Action Plan Lead: London Wildlife Trust

The black redstart is an attractive, robin-sized bird of the thrush family, with a distinctive orange/brown tail. A recent colonist from Europe, in the UK the black redstart is regarded as the 'bomb site' or 'power station' bird, as its distribution is concentrated in the urban environment of London: power stations, gasworks, industrial units and dilapidated wharves. This makes its conservation requirements unique.

The Partnership launched www.blackredstarts.org.uk providing information, and the Environment Agency and English Nature advise developers that they require black redstart surveys on likely sites and mitigation for any birds present in any planning proposals. This species has also become an icon for encouraging green roofs in London.

Aims

- To protect, conserve and enhance the present population in London
- To promote the black redstart as a cultural icon for London
- To raise awareness of the black redstart to the population as a whole and more specifically to planning authorities, architects, landscapers and developers

Action already taken

- Commissioning of a PhD studying brownfield invertebrate life, increasing knowledge of black redstart food sources
- Creation and promotion of www.blackredstarts.org.uk
- Creation and dissemination of black redstart Advice Note for developers

Action for the future

Action	Cost Band
Survey of black redstart populations and habitats in wider Thames Gateway area	£10,000 to £50,000
Promote PhD research results to appropriate audiences to encourage the creation of specific landscape schemes in new developments and key locations	£10,000 to £50,000

Grey Heron

Action Plan Lead: Borough of Wandsworth

Grey herons are easily recognised and appreciated by most Londoners with their dark wings and black crest, although they can be mistakenly known as 'stork' or 'crane'. At the top of the freshwater food chain, their presence indicates a healthy freshwater environment. Increases in fish stocks following improvements in the Thames and its tributaries have led to a plentiful food supply, allowing herons to increase and spread. The recent run of mild winters has also helped, as numbers can decline sharply in severe winters. Despite their clear adaptation to busy urban environments, heronries, day roosts and foraging habitat remain vulnerable to disturbance from recreational and development activity, especially whilst sitting on eggs. Discarded fishing line is also a threat.

Aims

- To conserve London's grey heron population by protecting existing and newly established heronries, roosting and foraging habitat
- To raise awareness of grey herons, their requirements and their value as an indicator of healthy rivers and water bodies

Action already taken

- 'Heron Day' attended by 2,000 members of the public
- Researched the viability of artificial breeding platforms in current heronries
- Annual census of heronries in London to monitor numbers

Action for the future

Action	Cost Band
Produce and disseminate best practice document for habitat improvements around heronries	Up to £10,000
Continue holding an annual 'Heron Day' at several accessible sites, where the public can view heronries with young	£10,000 to £50,000
Identify established day roosts and assess their importance	Up to £10,000
Work with landowners and managers to protect threatened trees in current heronries, following best practice document	£10,000 to £50,000
Programme to monitor breeding success at selected heronries	Up to £10,000

House Sparrow

Action Plan Lead: Greater London Authority

Until about 15 years ago the house sparrow was one of the commonest birds in London and a regular visitor to garden bird tables. The 'cockney sparrer' has always been a firm favourite with Londoners. However in recent years the population has declined dramatically – a study in Wimbledon Park has documented a 95% decline since 1989.

The Partnership ran a public participation survey in 2002, in which more than 9,000 Londoners took part. It became clear that the status of the house sparrow varies greatly across London, with losses particularly acute in the city centre. Contributing factors might include a reduction in insect food supply for the young, a lack of seed sources for the adults, increased predation, loss of nesting habit or disease. A number of research projects are underway to try to pinpoint the cause, but it is still far from clear which has been the main factor driving the decline in urban areas. Sparrows remain scarce over much of London, although there is some indication of levelling off in the last couple of years. Until an answer is found it is important to maintain public interest rather than simply accept the loss of a much-loved bird.

Aims

- Raise awareness of the need for biodiversity conservation by focusing attention on the decline in the house sparrow and its importance as a cultural emblem
- Establish the cause(s) of decline in the population of house sparrows and, if possible, undertake measures to reverse the decline.

Action already taken

- Collation of existing research information of the status of house sparrows
- Establish links with other relevant research projects and surveys in London
- Public participation survey of house sparrow population and distribution in London

Action for the future

Action	Cost Band
Public awareness project to restore and maintain public interest in house sparrows, drawing on cultural and historic associations in London	£10,000 to £50,000

Mistletoe

Action Plan Lead: Jonathan Briggs (National Mistletoe Survey Coordinator)

Mistletoe is a parasitic plant of deciduous trees that produces milk-white berries. It has a long history in herbal medicine and seasonal traditions, and in turn is host to four species of specialist mistletoe-dependent insects.

Its status in London is fairly well known thanks to a survey in the 1990s by Plantlife and the Botanical Society of the British Isles. Most mistletoe in London today grows in man-made habitats, and the vast majority occurs on trees in parks and gardens. The most central records are a single plant each in Lambeth and Westminster. Forestry and tree management practice in parks and gardens may be unsympathetic to mistletoe, pruning it out as a tree parasite.

Aims

- To ensure the conservation, enhancement and greater awareness of London's mistletoe for current and future generations
- To ensure that this cultural emblem is more widely recognised as a London species

Action already taken

- Determine past and present distribution of mistletoe in London, collation and validation of data, and input into local databases
- Selection of sites for establishing mistletoe populations
- Review of existing knowledge of mistletoe in other UK and European cities
- Review of possible alternative protection measures and policies

Action for the future

Action	Cost Band
Establish monitoring system for London mistletoe populations	Up to £10,000
Produce and distribute leaflet for landowners with information about mistletoe conservation	Up to £10,000
Establish status of mistletoe-associated species in London – obligate insects and berry-eating birds	Up to £10,000
Establish mistletoe at suitable selected sites	Up to £10,000

Peregrine

Action Plan Lead: English Nature

Peregrines are iconic birds – large powerful falcons that evoke the 'wildness' of the uplands and rocky coastlines. They have only recently begun breeding in London, utilising the facades of large buildings that mimic their more typical cliff-edge nest sites.

Peregrines do not build nests but make a shallow scrape for eggs. Building material is not soft enough to allow this, and so eggs are in danger of damage or rolling off ledges. The provision of nest boxes or trays containing a layer of soft substrate can help solve this problem.

This action plan aims to provide practical help and advice to owners and managers of buildings and structure where the species nests or roosts. It also aims to raise awareness of the presence of peregrines in the skies over London as proof of the relevance of nature conservation even in the heart of the city.

Aims

- To assist the colonisation of London by Peregrines, so that current and future generations of Londoners have the opportunity to see this magnificent bird over their city

Action already taken

- Contact owners/managers of buildings where peregrines are behaving territorially
- Contact owners/managers of buildings where peregrines display or nest of their own accord, within one month of discovery
- Monitoring of known breeding pairs

Action for the future

Action	Cost Band
Install nest-boxes at suitable sites	Up to £10,000
Establish a web-cam to view nest boxes	Up to £10,000
Establish a view point where people can watch peregrines at a nest	Up to £10,000

Reptiles

Action Plan Lead: English Nature

Reptiles, associated in most people's minds with warmer climes, are reasonably widespread in London. No doubt the 'heat island' effect of the city combined with a still significant number of wasteland sites make parts of the capital a relatively reptile-friendly environment.

Adders are now very rare in Greater London and are under threat of local extinction unless conservation action is quickly put into effect. Grass snakes are locally common in many outer London boroughs although populations are declining due to habitat fragmentation and loss. Common lizards and slow-worms are widespread in outer London, with isolated populations further in, especially on allotments, railway embankments and 'brownfield' sites.

Development pressure on habitats and the increasing isolation of core populations pose threats to reptiles, as well as their bad reputation with the general public, which can lead to persecution.

Aims

- To protect and conserve the native reptile populations of Greater London
- To save the adder from its imminent extinction in Greater London
- To promote wider awareness of reptile conservation in Greater London

Action already taken

- Reptile surveys on sites identified using existing adder records
- Advice note on reptile conservation issues produced for planners and developers
- Existing leaflets on reptiles for the general public updated and reproduced
- Reptile tick-box public surveys of garden biodiversity

Action for the future

Action	Cost Band
Identify, populate and promote a central database for reptiles	Up to £10,000
Publish a Herpetofauna Atlas for Greater London	Up to £10,000
Produce and implement management briefs for all extant populations of adders in Greater London	£10,000 to £50,000

Sand Martin

Action Plan Lead: RSPB

The sand martin is the smallest of Britain's swallow family. A common summer visitor to England, it starts arriving from its winter retreat in sub-Saharan Africa from mid-March. The UK's breeding population is recovering from droughts in the Sahel region of Africa in 1968 and 1985.

Sand martins catch their insect prey in flight, usually over water. They breed colonially in tunnels dug deep into steep riverbanks and cliffs, however they are remarkably adaptable and can be found nesting in gravel pits, canal banks and even drainpipes set in walls. In the 1999 London Bird Report ten colonies were identified in Greater London, representing a total of some 188 nest holes. However a comparison of recent records with those from 30 years ago suggests a general decrease in population in the London area. Their breeding sites beside urban waterways provide excellent opportunities for Londoners to view this fascinating bird.

Aims

- To protect and enhance sand martin populations in London
- To increase our knowledge of sand martins and their habitat requirements in London
- To raise public awareness of sand martins and involve Londoners in their conservation

Action already taken

- Collation of existing information on known breeding sites
- Production and dissemination of best practice advice on the creation of artificial banks
- Six artificial nest sites created in London

Action for the future

Action	Cost Band
Targeted breeding Sand Martin survey	Up to £10,000
Create 3 artificial breeding sites a year	Up to £10,000
Ensure regular monitoring of artificial sites to assess success	Up to £10,000

Stag Beetle

UK Priority

Action Plan Lead: London Wildlife Trust

The stag beetle is the country's largest ground-living beetle; its name comes from the male's distinctive large antler-shaped jaws. Dead and rotting wood is important to its life cycle; eggs are laid next to rotting logs, tree stumps or timber and the larvae spend up to seven years in the wood.

The London region is nationally important for the UK stag beetle population as in the 1998 national survey it supported 30% of this UK Biodiversity Action Plan priority species. Stag beetles are rarely found in the city centre – hotspots are in the west, south and east. Richmond Park, Wimbledon Common and Epping Forest are designated candidate Special Areas for Conservation, with stag beetles as a recognised feature of the designation.

Aims

- To protect, conserve and enhance the nationally significant populations of stag beetle in London
- To ascertain the reasons for the uneven distribution of stag beetle populations across London
- To maintain the stag beetle as a valued London species through increasing public awareness of their importance and that of their dead wood habitat

Action already taken

- Advice note distributed to all managers and owners of parks, woodlands, nature reserves and major formal gardens to encourage retention of dead wood
- Information distributed to arboriculturalists, planning and tree officers to promote retention of stag beetle habitat

Action for the future

Action	Cost Band
Produce guidance on installing and monitoring nestboxes and loggeries	Up to £10,000
Identify 50 key sites and install loggeries	£10,000 to £50,000
Establish a monitoring baseline of existing nestboxes/loggeries	Up to £10,000
Pilot a number of loggery monitoring schemes	Up to £10,000

Tower Mustard

UK Priority

Action Plan Lead: London Borough of Richmond-upon-Thames

Tower Mustard is a biennial plant of disturbed habitats on free-draining, sandy soils. It has smooth, grey-green leaves and very pale yellow flowers. It is nationally scarce and declining, and known from only about 30 sites in England. Its rarity and undistinguished appearance mean that this species does not often touch the public consciousness.

There is one large population in London, at Stain Hill Reservoir near Hampton. This is one of the largest populations in the UK, surpassed only by a couple of East Anglian sites. The site is in secure ownership and management, which this plan seeks to maintain. Other historical records have been traced, but none appear suitable for population restoration. The plan will therefore look to other ways to contribute to research and targets for population creation.

Aim

- To contribute to the conservation of Tower Mustard in the UK through the maintenance of London's population

Action already taken

- Advice and guidelines produced for the management of Stain Hill Reservoir
- Continuing management of Stain Hill Reservoir population
- Researched historical records to establish where Tower Mustard used to originate in London, to find suitable receptor sites

Action for the future

Action	Cost Band
Use historical records to establish an introduced wild population of tower mustard at a suitable receptor site	Up to £10,000
Choose and establish another public demonstration plot at a suitable site outside of London Borough of Richmond	Up to £10,000
Produce suitable interpretation material for the public for any established population sites	Up to £10,000

Water Vole

Action Plan Lead: London Wildlife Trust

The water vole is a priority for protection in the UK Biodiversity Action plan. Where it survives it is one of the few British wild mammals that can be easily seen and enjoyed by the public, since it is often active in the daytime and is not overly sensitive to the presence of people. It has strong cultural associations through 'Ratty' in *'Wind in the Willows'*.

The population has declined sharply across much of the UK since the 1930s, and particularly since the 1980s, as a result of habitat degradation and loss, and predation by mink. The species has been lost from many London boroughs, but localised populations survive in about 13 outer boroughs. A project officer, funded by the Environment Agency, Lee Valley Regional Park Authority, British Waterways and London Wildlife Trust has been developing a programme of conservation since 2002.

Aim

- To conserve London's water vole population and increase their range and numbers for the benefit of current and future generations

Action already taken

- Water Vole Project Officer employed to actively promote water vole conservation in the London area
- Collation of existing records of water voles and mink in London
- Identify at least 3 historic sites suitable for reintroduction

Action for the future

Action	Cost Band
Establish a programme of future monitoring of existing populations and update knowledge of species range in London	£10,000 to £50,000
Initiate the humane control of mink as a conservation tool where they threaten water vole populations	£10,000 to £50,000
Ensure the use of rodenticides in areas supporting water voles is avoided by providing leaflets and advice	£10,000 to £50,000
Distribute best practice guidelines for priority audiences	Up to £10,000
Carry out reintroduction on at least 3 sites	£10,000 to £50,000

Helping other organisations produce a Biodiversity Action Plan

As well as producing its own Biodiversity Action Plan for London, the London Biodiversity Partnership is committed to working with other organisations in London to help them produce their own Biodiversity Action Plans.

In addition to sharing the partnership's experience and expertise, this will also help avoid duplication of effort and encourage cooperative working throughout London to help preserve and nurture London's biodiversity.

The London Boroughs Biodiversity Forum

All of London's 32 Boroughs are responsible for Biodiversity planning and implementation in their local area. Working with the London Biodiversity Partnership, the Boroughs have joined together to create the London Boroughs Biodiversity Forum.

The London Boroughs Biodiversity Forum is for the sharing of information and expertise between Council Officers responsible for the delivery of biodiversity objectives within their Borough. It meets once a quarter to discuss new developments and share good practice in the preparation and delivery of local biodiversity action plans.

It also acts as a representative voice for the London Boroughs on the Partnership Board.

Working with Companies

Many private companies are developing their own Biodiversity Action Plans for the work that they do. London Underground is currently working with the Partnership to develop a Corporate Biodiversity Action Plan.

"London Underground is committed to protecting and enhancing the flora and fauna found along our 221km of over ground track. In the past, our standards and work instructions have afforded a good level of protection for the habitats and species that reside in the 4000 hectares of track side property that we own. But in today's changing climate, with increasing pressure on biodiversity, it is even more important to ensure the action we are taking is specific in a local, national and an international context.

"For this reason London Underground welcomes the support of the London Biodiversity Partnership in aiding in the development of our Biodiversity Action Plan. London Underground believes that a Biodiversity Action Plan is the best way to ensure we target priority species and habitats with our management activities and afford the right level of protection and enhancement where it is required."

Richard Barton, Environment Manager, London Underground Limited

Partners

(Signatories to the Partnership's Memorandum of Understanding)

Association of London Government
British Waterways Ltd
BTCV
CIP
Countryside Agency
Corporation of London
English Nature
Environment Agency
Forestry Commission
Lee Valley Park Authority
London Borough of Barnet
London Borough of Camden
London Borough of Havering
London Borough of Islington
London Borough of Merton
London Borough of Redbridge
London Borough of Richmond upon Thames
London Borough of Tower Hamlets
London Borough of Wandsworth
London First
London Underground Ltd
London Natural History Society
London Wildcare
London Wildlife Trust
The Mayor of London
Natural History Museum
Peabody Trust
Royal Botanic Gardens Kew
The Royal Parks
Royal Society for the Protection of Birds
Thames Estuary Partnership
Thames Water Utilities Ltd
Trees for Cities
University College London
Wildfowl and Wetlands Trust
Woodland Trust
Zoological Society of London

Photo Credits

Front Cover		Phoenix Garden, M Frith
Page	4	Pond at Vauxhall City Farm, I Yarham
	5	Cross-leaved heath, M Waite; Black redstart, C Churchill
	6	House sparrow, M Senior; Chalk grassland, M Waite
	7	Water vole, A Fisher; St John's Wood Church Grounds, J Hewlett
	8	Volunteers planting reedbeds, W Moreno
	12	Horniman Museum, M Frith
	13	Harebells, N Reeve
	14	Grand Union Canal, British Waterways
	15	Chalk grassland, M Waite
	16	Chingford Mount Cemetery, M Frith
	17	Cross-leaved heath, M Waite
	18	Russell Square, M Waite
	19	Garden flowers, S Bain
	20	Reedbed, W Moreno
	21	River Lea, I Yarham
	22	River Thames foreshore, I Yarham
	23	Wasteland, P Harvey
	24	Monken Hadley Woods, J Hewlett
	25	Pipistrelle bat, H Clark, Bat Conservation Trust
	26	Black poplar catkins, J Farrell
	27	Black redstart, C Churchill
	28	Heron by canal, British Waterways
	29	House sparrow, M Senior
	30	Mistletoe, T Drakeford
	31	Peregrine, A Fisher
	32	Adder, London Wildlife Trust
	33	Sand martin, M Holmes
	34	Stag beetle, T Drakeford
	35	Tower mustard, M Waite
	36	Water vole, A Fisher
Back Cover		Fly agaric, M Waite

Supported by the Mayor of London

London Biodiversity Partnership
Ground Floor
Skyline House
200 Union Street
London SE1 0LW

020 7803 4276

funding@lbp.org.uk
www.lbp.org.uk

London Biodiversity Partnership
working together for wildlife

London Biodiversity Partnership, 2005