

Biodiversity Action Plan

2016-2020



Contents

1	Introduction	Page
1.1	What is biodiversity?	3
1.2	Why conserve biodiversity?	3
1.3	Biodiversity Legislation at the University of Roehampton	3
1.4	Aim of the Biodiversity Action Plan	5
1.5	Biodiversity Action Plan Implementation	5
1.6	Biodiversity Action Plan Stakeholders	6
2	Biodiversity at the University of Roehampton	7
2.1	Overview – London Borough of Wandsworth	7
2.2	Overview- Whitelands College	9
2.3	Overview – Froebel College	10
2.4	Overview- Digby Stuart College	11
2.5	Overview- Southlands College	12
2.6	Overview- Chadwick Hall (Downshire House)	13
3	Biodiversity Action Plan	14
4	References	16

1. Introduction

1.1 What is biodiversity?

'Biodiversity' refers to the variety of all life on Earth. It is the diversity of millions of different living organisms, their interactions and the natural systems that support them.

Biodiversity includes all:

- Plants
- Animals
- Fungi
- Bacteria
- Viruses

1.2 Why conserve biodiversity?

Biodiversity is essential for all life as it provides us with various ecosystem services which humans would not be able to function without. An ecosystem service is a benefit that humans gain from ecosystems, which can include providing humans with food, fuel, raw materials, medicines and oxygen. There are four defined types of service that biodiversity and its ecosystems can provide to humans (see Table 1.2.1)

Table 1.2.1 Ecosystem Services (UNEP, 2009)

Classification of Ecosystem Service	Benefits to humans
Provisioning services	The resources obtained from ecosystems e.g. food, fibre, freshwater, genetic resources
Regulating services	The benefits obtained from the regulation of ecosystem processes e.g. climate regulation, noise regulation, pollination, disease and pest regulation, regulation of water, air and soil quality
Supporting services	Services that are essential for the production of other ecosystem services e.g. soil formation, nutrient cycling, water cycling and primary production
Cultural services	The aesthetic, spiritual, recreational and cultural provision

As a result of these ecosystem services, the University of Roehampton can benefit from protecting and enhancing the provision of biodiversity across its Estate. It also provides the following benefits:

- It helps the University to meet its strategic objectives to continue to support biodiversity on or around the campus
- It helps to develop an awareness and understanding of the importance of biodiversity to staff and students
- It helps to form part of the University's Environmental Management System (EMS) which puts a framework in place to help ensure legal compliance, ecological monitoring and continual environmental improvement
- It helps the University to meet objectives set out by London's Biodiversity Action Plan
- It helps to improve the University's environmental reputation
- It helps to improve engagement with local environmental groups such as the RSPB, London Bat Group and London Wildlife Trust

1.3 Biodiversity Legislation at the University of Roehampton

The University has a legal obligation to ensure all biodiversity legislation is complied with. To ensure this is achieved, all relevant legislation is stored, updated and reviewed within the University's compliance register. The compliance register forms part of the Environmental Management System, and helps the University to ensure that legal compliance is achieved. Failure to comply with statutory legislation could lead to financial penalties and reputational damage to a University and as a result, it is within the University's best interests, economically, socially and environmentally to ensure that biodiversity is supported and protected across the Estate.

Biodiversity legislation can vary in order to protect a specific species, a biodiversity rich or rare habitat, or valuable green space. The statutory legislation that the University of Roehampton is required to comply with includes:

- Wildlife and Countryside Act 1981
- Countryside Rights of Way Act 2000
- Natural Environment and Rural Communities Act 2006
- The Conservation of Habitats and Species Regulations 2010
- National Planning Policy Framework
- Plant Health Forestry Order 2005
- Protection of Badgers Act 1992
- Hedgerow Regulations 1997

1.4 Aim of the University of Roehampton Biodiversity Action Plan

The aim of this plan is to support objectives of the defined biodiversity policy, specifically by defining distinctive actions that will enable the University to:

- Encourage the promotion of staff and student awareness of the importance of biodiversity
- Seek to support relevant projects and programmes that will conserve and, where possible, enhance biodiversity
- Engage as appropriate with the local community, businesses and organisations on biodiversity enhancing projects
- Encourage groups and individuals to consider the impacts on biodiversity in relation to purchasing, investments and developments
- Ensure that biodiversity is not reduced following on campus developments and where that is not possible, make its best endeavours to ensure compensating additional biodiversity elsewhere
- Comply with relevant biodiversity legislation

1.5 Biodiversity Action Plan (BAP) Policy Implementation

The Environment and Sustainability Officer, based within Estates and Campus Services, leads on ensuring implementation of the Biodiversity Action Plan and Biodiversity Policy, whilst also ensuring compliance with biodiversity legislation. Progress of the BAP is monitored annually through the Environmental Steering Group as part of the review of the University's Environmental Management System.

Progress and changes related to biodiversity management is reported to the Environmental Steering group and also to the Director of Estates and Campus Services through the Estates and Campus Services Senior Management Team.

The overall implementation structure for Biodiversity Policy and Biodiversity Action Plan is driven by the Universities Strategic Plan. The plan states its vision for Biodiversity and the Policy and Action Plan seeks to ensure that the vision is achieved (see Fig 1.5.1).

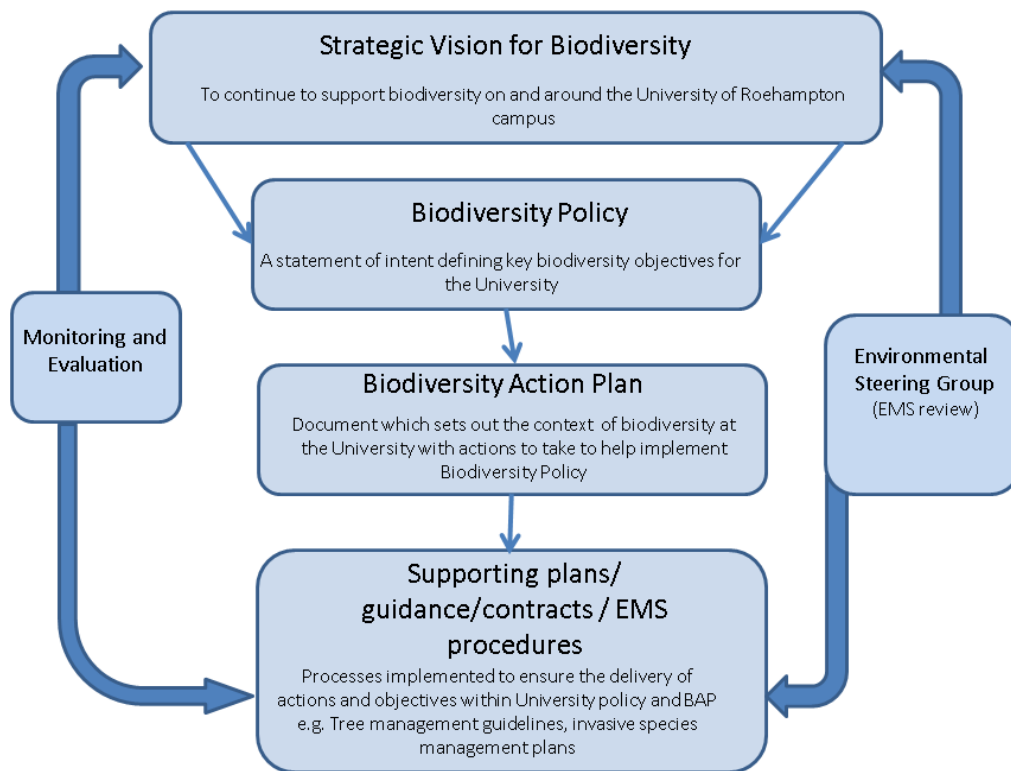


Fig 1.5.1 Biodiversity Action Plan Policy Implementation

1.6 Biodiversity Action Plan Stakeholders

Throughout the adoption of a this Biodiversity Action Plan, a variety of stakeholders both internal and external are likely to be involved and/or impacted by it, in order to ensure its success (see Table 1.7.1).

Table 1.7.1 Likely BAP Stakeholders

Internal Stakeholder	External Stakeholder
Assistant Director Campus Services (for Grounds) - Estates	Butterfly Conservation
Environmental Steering Group (EMS review) - Estates	Environment Agency
Environmental Action Group - University staff with key interest in environmental issues	London Bat Group
Grounds Management – The Green Team	London Orchard Project
Health, Safety and Environment - Estates	London Wildlife Trust
History and Heritage Promotions Adviser – Alumni, Development and Careers	The British Bee Keepers Association
Roehampton Student’s Union – via Growhampton	The Conservation Volunteers

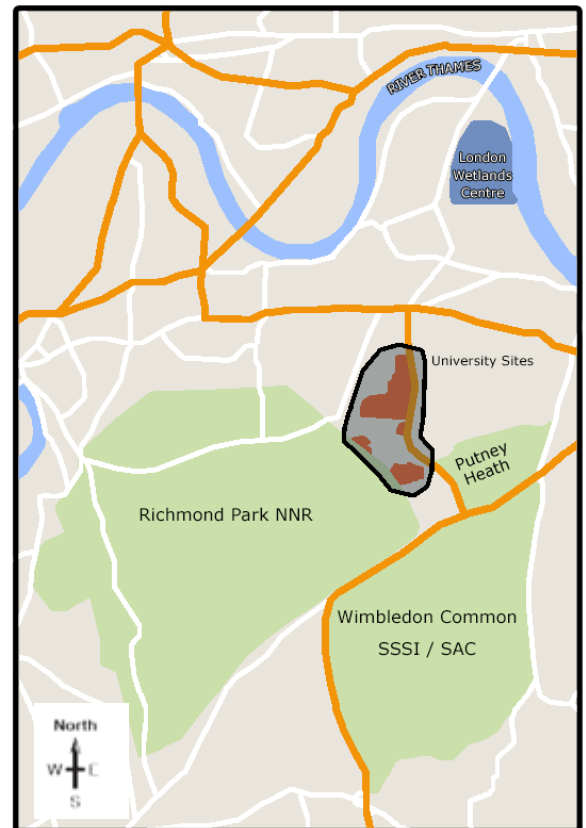
2. Biodiversity at the University of Roehampton

2.1 Overview – London Borough of Wandsworth

The University is located in South West London, directly south of the River Thames and within the London Borough of Wandsworth. The Borough includes an array of different habitat types including parks and gardens, as well as various protected habitats including a National Nature Reserve (NNR), a Site of Special Scientific Interest (SSSI) and a Special Area of Conservation (SAC).

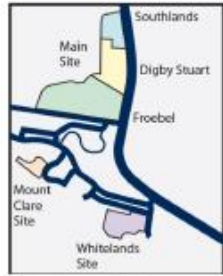
Sites of importance for biodiversity include:

- Wimbledon and Putney Commons – with part of the site designated as a SSSI and a SAC, the site consists of a network of heathland, acid grassland, woodland, a brook and ponds.
- Wandsworth Common – classified as a site of borough importance grade 1, the habitat consists of a network of acid and neutral grassland, secondary woodland and lakes.
- Tooting Common – classified as a site of metropolitan importance, habitats include acid grassland, secondary woodland scrub and ponds.
- Richmond Park – designated as a SSSI and NNR, habitats include, ancient trees, woodland gardens, a brook and the most extensive area of dry acid grassland in Greater London

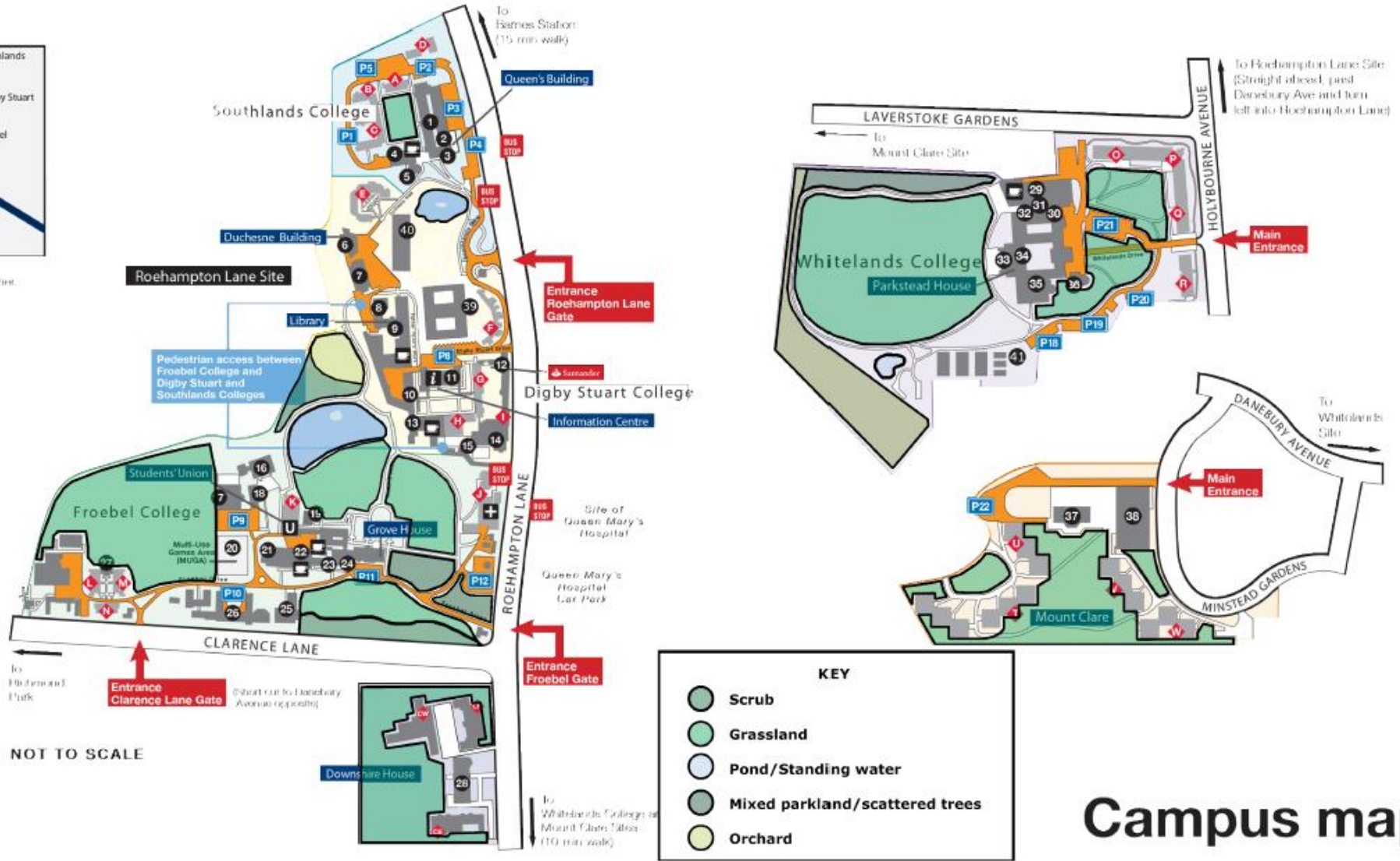


A London Borough rich in biodiversity relies on a network of ecological corridors which connects species with their habitats and the wider environment. Ecological corridors help to provide additional opportunities for foraging and genetic variety, whilst also protecting species from anthropogenic activities and structures such as roads and pollution. It is therefore important for the University to consider nearby habitats and their ecological connections, as the University Estate is likely to be a vital ecological corridor which supports a rich network of habitats and species across Wandsworth.

The University site consists of four separate colleges as well as additional sites for the halls of residence: Chadwick and Mount Clare (see Campus Map).



Our sites are all within a short walk of each other.



NOT TO SCALE

Campus map

2.2 Overview – Whitelands College

Whitelands College is located on the southern edge of Richmond Park, and is therefore likely to be of significant ecological value in providing a habitat but also an ecological corridor allowing species to move between sites. The habitat structure includes a mixture of scattered trees; parkland, grassland and scrubland (see Table 2.2.1). There is also significant amounts of deadwood available which is of a particular value for invertebrates.

Table 2.2.1 Whitelands College Habitats as defined by National Vegetation Classification (NCC,2007)

Code (JNCC)	Habitat Type
A2	Scrub
A3.3	Mixed parkland/scattered trees
G1	Standing water - pond
J1.2	Amenity grassland
J3.6	Built up areas, buildings

Invasive Species:

Japanese Knotweed was previously found on site. This has been treated but should be monitored to ensure that if it does return it is detected early. Other invasive species noted are the grey squirrel and ring-necked parakeets which are becoming increasingly common.

Conservation:

A badger set is present on site which is protected under the 1992 Badgers Act. The majority of the trees are protected by Tree Preservation Orders from the Local Planning Authority.

Biodiversity records

There are good species lists from 2007 for birds, amphibians, reptiles and mammals. 2015 list for bees.

2.3 Overview – Froebel College

Froebel College is located approximately 1km east of Richmond Park. The habitat structure is dominated mainly by parkland and scattered trees, standing open water known as “Froebel Lake” and an orchard that is thought to date back to 1910 (see Table 2.3.1). The grassland surrounding the lake, “Froebel lawn” has also been found to be acid grassland, a priority habitat for conservation and noted on the National Biodiversity Action Plan for the UK. This grassland supports rare invertebrates and is vital for the existence of fungi such as “Waxcaps”.

Table 2.3.1 Froebel College Habitats as defined by National Vegetation Classification (JNCC, 2007)

Code (JNCC)	Habitat Type
A1.1.2	Broadleaved woodland plantation
A3.3	Mixed parkland/scattered trees
B1.1	Acid grassland
G1	Standing water
J3.6	Built up areas, buildings
J4	Bare ground

In addition, there is also a University apiary, consisting of five bee hives, in place on the roof of Lawrence building. These are managed in partnership with the Students Union and the National Bee Keepers Association.

Invasive Species

Valerian is currently present on site and it is growing within the mausoleum structure near Grove House and the Grade 2 listed wall near the Courts. Buddleia is also present within the drainage pipework near the Courts and Willow is present outside the front of Grove House. Other invasive species include Canada geese and grey squirrels.

Conservation

Tree preservation orders are not in place but if any were at threat from development, they would be likely to get approved due to their amenity value and age. This particularly refers to a group of large cedars surrounding the lake which are thought to be present since the Georgian era and are therefore likely to be between 230 and 250 years old.

Biodiversity records:

There is a comprehensive tree list from 2006 and a bird list (undated).

2.4 Overview – Digby Stuart College

Digby Stuart is located within 1.5km of Richmond Park, and is within the centre of the main set of colleges, south of southlands and north east of Froebel College. The habitat structure is dominated by mixed parkland/scattered trees and built up areas, buildings (see Table 2.4.1).

Table 2.4.1 Digby Stuart Habitats as defined by National Vegetation Classification (JNCC, 2007)

Code (JNCC)	Habitat Type
A1.3	Mixed woodland
A3.3	Mixed parkland/scattered trees
J3.6	Built up areas, buildings
J4	Bare ground

Invasive species:

No other known invasive species of concern

Conservation:

Bat boxes present on some of the trees to help provide a refuge - bats and their roosts are protected under the Wildlife and Countryside Act 1981.

Biodiversity records

A Phase 1 habitat survey was undertaken before developments have been undertaken on Digby Stuart and Southlands colleges. No other known biodiversity records.

2.5 Overview - Southlands College

Within 1.5km of Richmond Park, Southlands is the most northerly site. The habitat structure is dominated by mixed parkland/scattered trees, and also a pond (see Table 2.5.1).

Table 2.5.1 Habitats as defined by National Vegetation Classification (JNCC, 2007)

Code (JNCC)	Habitat Type
A1.3	Mixed woodland
A3.3	Mixed parkland/scattered trees
G1	Standing water - pond
J3.6	Built up areas, buildings
J1.2	Amenity grassland
J4	Bare ground

Invasive species

Invasive *Rhododendron (Rhododendron ponticum)* and *(Cotoneaster horizontalis)* identified on site in 2013 and consequently removed due to their invasive properties and risk of infringement with relevant legislation – Schedule 9 (Wildlife and Countryside Act 1981).

Conservation

Bat boxes are present on a selection of trees around the lake.

Biodiversity records

A Phase 1 habitat survey was undertaken before developments have been undertaken on Digby Stuart and Southlands colleges. No other known biodiversity records.

2.6 Overview – Chadwick Hall (Downshire House)

The grounds surrounding Chadwick Hall consist of the following habitat types as defined by the National Vegetation Classification guidance (JNCC, 2007)

Table 2.6.1 Habitats as defined by the National Vegetation Classification (JNCC, 2007)

Code (JNCC)	Habitat Type
A3	Parkland/ scattered trees
J3.6	Built up areas, buildings

Invasive species

No invasive plants recorded or known to be monitored

Conservation

Tree preservation orders are in place to cover the Downshire House site

Biodiversity records

No known formal biodiversity records

2.7 Overview - Mount Clare

The grounds surrounding Mount Clare consist of the following habitat types as defined by the National Vegetation Classification guidance (JNCC, 2007)

Code (JNCC)	Habitat Type
A3	Parkland/ scattered trees
J3.6	Built up areas, buildings

Invasive species

No invasive plants recorded or known to be monitored

Conservation

Tree preservation orders are in place to cover the whole Mount Clare site

Biodiversity records

No known formal biodiversity records

3. University of Roehampton Biodiversity Action Plan (2016-2020)

Area	Objective	Timescales	Stakeholders	Baseline	KPI (where appropriate)
Tree management	To continue to ensure that the health of trees is monitored on site	Continuous	Head of Health, Safety and Environment, Environment and Sustainability Officer, Grounds Maintenance, Assistant Director Campus Services.	n/a	Monitoring records of trees
	To ensure trees are considered with any new developments and that any trees removed are replaced by at least 2 new trees	When required	Head of Health, Safety and Environment, Environment and Sustainability Officer, Grounds Maintenance, Assistant Director Campus Services	n/a	Records of the number of trees removed and planted
Control of invasive species	To ensure that monitoring is in place to find any Oak Processionary Moth Nests and that they are managed appropriately	April - September	Environmental Action Group, Environment and Sustainability Officer, Growhampton, Assistant Director Campus Services.	April 2016 - No formal university records	Records of monitoring surveys completed and any records of any management taken place
	To ensure that any invasive species found present are recorded on site and managed appropriately	Ongoing	Environmental Action Group, Environment and Sustainability Officer, Assistant Director Campus Services.	April 2016 - No formal university records	Update records of invasive flora and fauna regularly
Chemical use	To compile a detailed list of the chemicals used on site by the Grounds Maintenance contractor.	By April 2017	Environment and Sustainability Officer with Grounds Maintenance Contractor	April 2016 - No formal university records	Detailed list of chemicals used
	To consider the development of chemical usage guidelines for the Grounds Maintenance contractor to follow.	By April 2017	Environment and Sustainability Officer with Grounds Maintenance Contractor	April 2016 - No university guidelines	University guidelines produced
	To continue to reuse green waste and compost on site	Ongoing	Grounds Maintenance Contractor	April 2016 - All green waste currently reused on site	Records of the amount of green waste composted onsite
Biodiversity Education and awareness	To increase the awareness of biodiversity to staff and students through organising ecological events e.g. Bat walk	Ongoing	Environment and Sustainability Officer and Growhampton	April 2016 – Growhampton – learn to grow and harvest morning session	Student and staff attendance at events
	To engage with as many volunteers as	Ongoing	Environment and Sustainability Officer and	April 2016 – Volunteers mainly	Records of the number of

	possible		Growhampton	for Growhampton. – not quantified	volunteers engaged with
Monitoring of biodiversity	To undertake regular ecological surveys of all sites and keep up to date records	Ongoing	Environment and Sustainability Officer and Department of Life Sciences	April 2016 - Species lists for birds, bees and fungi but more detailed needed for bats, small mammals, butterflies and moths and ground flora.	Number of surveys completed and updated records
Suitable Habitat Provision	To continue to provide deadwood onsite from old trees as a habitat for invertebrates	Ongoing	Grounds Maintenance Contractor	April 2016 – no records but lots onsite	Amount of deadwood reused on site – mapping of quantities
	To investigate the provision of outdoor lighting on campus and consider whether a good practice guide is required to help reduce the impact on local biodiversity	April 2018	Environment and Sustainability Officer	Not known	Number of lights with lower level lighting to adapted to help promote biodiversity
	To consider providing bird boxes on site to encourage nesting birds	April 2017	Environment and Sustainability Officer	None on site	Number of bird and bat boxes
	To increase the area on site that is favourable for pollinating insects such as bees and/or butterflies	April 2018	Environment and Sustainability Officer	April 2016 – a selection of areas provided but not highlighted or documented	Area of site improved (m ²)
External partnerships	To develop relationships with external, organisations where relevant e.g. Mammal society, London Bat Group	Continuous	Environment and Sustainability Officer	London Orchard Project and Urban Wild engaged with for 2016	Number of partnerships made
Legislation	To ensure that any new relevant biodiversity legislation is updated within the compliance register	Continuous	Environment and Sustainability Officer	Legislation relevant up to 2016 included within register	Legislation within compliance register and updates

References

Convention on Biological Diversity (2010). *Ecosystem services*. UNEP. Accessible at <https://www.cbd.int/iyb/doc/prints/factsheets/iyb-cbd-factsheet-ecoservices-en.pdf>.

Department for Communities and Local Government (2012), 'National Planning Policy Framework'

Friends of Richmond Park. (2016). *Flora and fauna*. Richmond. Accessible at <http://www.frp.org.uk/richmond-park/flora-and-fauna>.

Wandsworth Council. (2016). *Biodiversity action plans*. Wandsworth. Accessible at http://www.wandsworth.gov.uk/info/745/biodiversity_and_wildlife/168/biodiversity_action_plans.

Wandsworth Council. (2016). *Biodiversity and wildlife*. Wandsworth. Accessible at http://www.wandsworth.gov.uk/info/745/biodiversity_and_wildlife.