

Biosecurity Policy

The Royal Parks
July 2020

Biosecurity Policy Statement

What is Biosecurity?

Biosecurity can be defined as a series of preventative measures designed to reduce the risk of transmission of harmful organisms (these are non-native invasive species, pests and pathogens) and must address 'movement pathways' for such organisms. Good biosecurity practice involves early detection of pests, ongoing surveillance and contingency planning to eradicate or at least contain problems as they arise.

1. Background

The Royal Parks are custodians of 5,000 acres of historic parkland and green space across London, enjoyed by 77 million visitors annually. This includes legally protected sites such as a Special Area of Conservation, Sites of Special Scientific Interest and a National Nature Reserve, while all the Royal Parks, Brompton Cemetery and sections of the Longford River are designated Sites of Importance for Nature Conservation. The estate encompasses Habitats of Principal Importance for the Conservation of Biodiversity in England such as wood-pasture and parkland, lowland mixed deciduous woodland, lowland dry acid grassland, ponds, rivers and reedbeds. The Parks also support numerous legally protected species such as bats, great crested newt and badger, Species of Principal Importance including skylark, house sparrow, hedgehog, and reptiles, – as well as locally notable and characteristic species. All sites are protected and designated landscapes, they contain areas of high horticultural value and some feature national collections and rare and unusual tree and shrub species.

The threat to these natural assets has never been greater. The International Union for Conservation of Nature (IUCN) describes non-native invasive species (NNIS) as "animals, plants or other organisms that are introduced into places outside their natural range, negatively impacting native biodiversity, ecosystem services or human well-being." They are one of the biggest causes of biodiversity loss and species extinctions, as well as a global threat to food

security and livelihoods. NNIS cost the UK economy £1.7 billion per year and at least £23 million of this is dedicated to the impact and management of freshwater plants. Pests, pathogens and NNIS are having a significant impact on the health of our trees, woodlands and aquatic habitats resulting in both the loss of biodiversity and causing undesirable changes to ecosystems and landscapes. Most parks have single species features that, if lost, have the capacity to transform landscapes, for example the current decline of horse chestnut tree avenues. Financial and staff resources dedicated to the management of existing problems are considerable, and new threats continue to emerge - some also having negative implications for public health and safety.

The growth in international trade of plants and animals and tourism and travel has increased the potential for the movement of pests and pathogens. Imported plants are the single most frequent way in which pests and diseases are introduced into parks or gardens. London is a major gateway for people, trade and products from around the world into Britain and as such is potentially more vulnerable to the impacts of harmful organisms (LWT, 2017). The high visitor numbers in the Royal Parks and their interaction with the environment could potentially magnify the risks. Climate change is also making it easier for some exotic pests and pathogens to become established and spread in the UK. It is rendering species and habitats more vulnerable to pests and pathogens, resulting in physiological changes in the host plant and having an impact on natural competitors, predators and vectors.

Protecting the health of our plants, trees, grasslands, woodlands and aquatic resources has never been more important. The UK government set out its approach to plant biosecurity in DEFRA's Protecting Plant Health - A Plant Biosecurity Strategy for Great Britain (April 2014) which aims to tackle pests as part of a biosecurity continuum with action to be taken pre-border, at borders and inland. The Forestry Commission has also worked closely with several organisations encompassing arboriculture, forestry and landscaping sectors to develop industry-specific biosecurity guidance to reduce the introduction or spread of pests and diseases. In this policy we also echo and complement the approaches taken by organisations such as the National Trust and London Wildlife Trust.

2. Existing situation in TRP

2.1. Trees and plants

- In recent years TRP has seen the arrival of several pests and diseases which have had serious impacts on our sites. Poor biosecurity on imported trees at a national level led to the introduction of oak processionary moth to a site in Kew which later spread to many sites including the Parks. If not intensively managed, this pest can cause significant defoliation of oaks and threaten vulnerable veteran oak trees. The toxicity of the hairs on adult caterpillars also raises health and safety concerns for humans and animals.
- Major tree diseases include Acute Oak Decline which is resulting in the rapid decline and death of English oak, and Massaria disease of London Plane which causes mature trees to shed limbs. Over 70% of horse chestnuts across the Parks are affected by bleeding canker which is driving the near demise of this species.
- TRP has developed rules and guidance for the purchase of trees, shrubs and other woody species which specifies the requirement to inspect new consignments, the use of approved suppliers and the need for plant passports for species that host the most serious pests.
- TRP is proactively managing certain invasive alien plants such as Japanese knotweed and giant hogweed and must continue to monitor sites for presence of problematic species and the effectiveness of treatment.

2.2. Water

- The introduction of NNIS such as New Zealand pygmy weed, floating pennywort and water fern has led to the decline in quality of some of our aquatic habitats. Typically, their spread has been rapid and has led to the displacement of native species. The sensitivity of some habitats can make containment or eradication of NNIS more complicated.
- Amphibian diseases such as Ranavirus which occurs mainly in the common frog and chytrid fungus - to which all species of amphibian are susceptible in varying degrees - can potentially kill an entire population.
- Cases of avian botulism have occurred in recent years and the swift and efficient action taken by staff has been key to containing outbreaks as they have occurred. Where possible TRP has undertaken works to try and prevent the development of suitable conditions that allow the bacteria to proliferate. Our continued vigilance is vital.

- All areas of Great Britain remain at risk of avian influenza in wild birds and looking out for signs of disease in water birds remains an important aspect of good waterbody management.

2.3. Soils and organic matter (such as leaf litter).

“Soils are the bedrock of biodiversity – without healthy soils we don’t have the basic building blocks of ecosystems and hence nature is in trouble.” Professor Dieter Helm

Soils in many areas of our parks have been adversely affected in recent decades for a variety of reasons.

- Imported soils that have not been screened have resulted in the introduction of invasive plants such as Japanese knotweed.
- Human pressure results in significant compaction in many areas of our parks adversely affecting tree health and degrading soil structure and fauna.
- Human and domestic animal use of the parks risks the introduction and spread of a range of pests and diseases through poor individual hygiene measures such as cleaning footwear before visiting not being part of current societal awareness.
- Increasingly areas of grassland are becoming worn from human pressure, exposing soils which are then prone to erosion from increasingly regular heavy rainfall.
- Dog fouling enriches soils locally and is generally seen as a problem around park entrances and car parks. It also can result in the introduction of diseases such as toxocarasis.
- Remediation of soils after large and smaller scale events is planned from the start.
- Overuse of green mulches can adversely affect the soil/air interface detrimentally affecting soil structure and creating anaerobic conditions.
- Park maintenance operations such as sweeping, hoeing and excessive use of leaf blowers can all result in the loss of soils.

- General atmospheric pollution enriches soils and changes soil chemistry. This can be a particular issue in Richmond and Bushy Parks which are notified as SSSI's on account of their dry acid grasslands which rely on nutrient poor soils to maintain their characteristic species diversity.
- Road runoff can contaminate roadside grassland and alters soil structure with resulting changes to species composition.

3. Objectives

- TRP should continue to build resilience in our natural systems and environment to withstand the intrinsic threat presented by pets, diseases, and invasive species.
- TRP and our contractors will not act as a source of harmful organisms and expose other sites to risk.
- Best practice will be at the core of our operations; we will act upon existing threats and keep informed of new emerging pets and pathogens and the most up to date methods of control and eradication.
- We will engage with partners and park users to develop awareness of biosecurity to protect the parks.
- We will work organisations such as National Trust, London Wildlife Trust, English Heritage on coordinated campaigns on biosecurity and will continue to knowledge and best practice.

This strategy is to be read in conjunction with periodic risk audit reports and the Royal Parks Biodiversity Framework.

4. Approaches

4.1. Sourcing and purchasing plants

Importing live plants is the most significant pathway for the introduction of pests and pathogens: bacteria, fungi, spores, eggs, larvae or adults can be carried on the plants themselves or in the soil.

- TRP will only procure plant material from trusted suppliers with stringent biosecurity procedures in place and a proven track record. We will devise a questionnaire to identify trusted suppliers and will maintain the established list through monitoring.
- We will prioritise the sourcing of plants propagated and grown in the UK to lower the risk of introducing pests and diseases into our sites. However if, exceptionally, plants need to be sourced from abroad then we need to ensure the supplier is responsible and effects the necessary quarantine period on arrival.
- When obtaining native species we will prefer to use plants of local provenance if possible or at least UK provenance. Imported seeds will not be permitted.
- We will not plant or introduce plants listed on Schedule 9 of the Wildlife & Countryside Act 1981 (as amended) and will consider removal or control of existing specimens where there is a risk of spread.
- All plant and tree purchases including those made by the Hyde Park nursery on TRP's behalf will be documented and stored at identified sites in each park.
- Plant, tree and shrub purchases made as part of contract works should be made by TRP staff or, if by contractors, concessionaires, events companies and licence holders, must comply with the above policies or their own processes approved in writing by TRP.
- Each Park will not use plants of uncertifiable provenance.

4.2. Day-to-day operations

Many plants and pathogens can be spread by footwear, tools and equipment. Staff and contractors travelling between sites or moving between areas of woodland, garden or standing water pose a greater risk of cross-contamination by transmitting organic material and pathogens from one site to another.

- TRP's Ecology Team will carry out biosecurity risk assessments with the Parks Team to help distinguish between routine biosecurity control measures and specific measures required for higher risk sites.

- TRP staff, contractors and volunteers will be trained in biosecurity measures. All relevant staff will complete best practice training by completing the biosecurity e-learning package on tree pests and diseases (<https://www.forestrylearning.org.uk/>) and/or the Non-Native Species Secretariat e-learning module on Biosecurity relating to aquatic systems (<http://www.nonnativespecies.org/elearning/>.)
- A portable biosecurity kit* will be carried and used by relevant operational staff e.g. Wildlife Officers, Park teams, the Arboricultural team, Ecology team and contractors to help limit the introduction and spread of pests and diseases.
- Importing soils onto TRP land will be kept to an absolute minimum. Where this is unavoidable, we will only accept sterilised top dressings to minimise the risk of importing contaminants to site.
- In the event of fly-tipping, it will be inspected, isolated and removed as soon as possible. Material will be treated as contaminated waste and disposed of appropriately.
- Movement of organic materials both within sites and between parks should be minimised.
- Staff, contractors, and volunteers working in water will adhere to the procedures outlined within the Government's Check-Clean-Dry campaign. This involves checking equipment and clothing for live organisms and plant material which should be removed at the site. All equipment, footwear and clothes should then be thoroughly cleaned and dried thoroughly. Staff working in ponds across parks will also disinfect footwear, clothing, and equipment to prevent the spread of amphibian diseases.
- We will remain vigilant to the signs of amphibian disease and report any sick or dead animals showing symptoms of Ranavirus or Chytrid fungus to Garden Wildlife Health (a collaborative project to monitor the health of, and identify disease threats to, British wildlife).
- We will remain vigilant to the signs of plant and tree pests and diseases and train parks staff in their identification.
- TRP will maintain good hygiene at necessary bird feeders, bird baths and feeding sites to ensure they are kept free from diseases such as avian

pox and Trichomonosis. Guidance will be developed, and dedicated cleaning kits will be provided at each location.

- Timber and wood packaging materials (WPM), such as shipping crates and pallets used for any works in the Parks (landscape, construction etc.) will either be removed prior to delivery or incinerated on site or, in the case of treated timber disposed of by recycling or other agreed safe process.

*Biosecurity kits to include a bucket, boot pick, brush, disinfectant, hand sanitiser, water container and portable pressure washer for cleaning larger equipment

4.3. Composting

The composting of green waste is a major undertaking in all parks enabling TRP to reduce the amount of waste exported from our parks as well as producing valuable products for use in mulching and soil improvement. Our larger composting sites (Kensington Gardens, Regent's Park and Greenwich Park) are regulated by Environmental Permits and must be operated in line with the permit requirements.

- TRP will aim to achieve PAS certification for all composting operations within 5 years.
- TRP will work within agreed limits to contain volumes stored in individual parks in line with EA permits.
- Green waste will not be permitted to be brought into any park from external sites.
- Composted green waste should be preferably used in the park in which it is processed, or in the case of Kensington Gardens, within Brompton Cemetery, Hyde, or St James's Parks.
- In Richmond and Bushy Parks bracken may be cut and composted for use in garden areas as an alternative to peat. Use of this product should be restricted to the park of origin.
- The management of leachate from composting operations must be controlled to eliminate run off into parkland and water courses. All composting sites need to adequately maintain interceptors, emptying

them when required, and ensure integrity of the hard standing surfaces where green waste and composting materials are deposited.

4.4. Outbreak of pests or diseases

TRP recognise that in the event of pest and diseases outbreaks then we will be required to work with other government departments to implement control measures which may include practices such as exclusion of the public or the burning of diseased tree materials on site.

4.5. Commercial filming and events

Where other parties are bringing in materials there may be additional risks which will be addressed in filming and events contracts.

- TRP requires all filming licensees to drive and park on areas of hard standing only. Where driving and parking on the soft landscape of the park is unavoidable, vehicles must be on trackway or use equivalent ground protection. Vehicles will be free of soil, plants and other organic material. Prior written consent of TRP will be obtained to bring to site any trees, plants or other living organisms.

4.6. Public recreation

Various recreational activities can create specific risks to the parks.

- TRP will work with the angling community to protect our water bodies. Signage will be displayed in fishing areas alerting anglers to the risk of introduction and transfer of organisms on fishing gear, footwear and clothing and perils of using non-native bait. Fishing permits will incorporate the required biosecurity controls.
- Boating. Any boating equipment must be disinfected and cleaned prior to the arrival on side or movement between or out of the parks.
- Public swimming events should incorporate controls by submitting a RAMS to minimise the risk of transfer of waterborne diseases and plant material via contaminated clothing.
- TRP will require all beekeepers occupying TRP land to submit planned actions to maintain high standards of hygiene and regularly check (and,

if necessary, treat) their hives for pests (e.g. varroa mite) and diseases to minimise the risk of these spreading to other hives or native wild bees.

5. Next steps

To ensure delivery across TRP and by contractors/volunteers, TRP will develop and share the following guidance documents:

- Sourcing plants and handling incoming plants
- Composting/green waste handling
- Working in water
- Managing ornamental gardens to reduce pests and diseases
- Managing soil health
- Guidance for visitors
- Bird feeder hygiene

6. Appendices

W&C Schedule 9 list Xylella list

Wildlife and Countryside Act 1981 Schedule 9

PART II PLANTS

Common name	Scientific name
Alexanders, Perfoliate	<i>Smyrniium perfoliatum</i>
Archangel, Variegated Yellow	<i>Lamiastrum galeobdolon</i> subsp. <i>argentatum</i>
Azalea, Yellow	<i>Rhododendron luteum</i>
Balsam, Himalayan	<i>Impatiens glandulifera</i>
Cotoneaster	<i>Cotoneaster horizontalis</i>
Cotoneaster, Entire-leaved	<i>Cotoneaster integrifolius</i>
Cotoneaster, Himalayan	<i>Cotoneaster simonsii</i>
Cotoneaster, Hollyberry	<i>Cotoneaster bullatus</i>
Cotoneaster, Small-leaved	<i>Cotoneaster microphyllus</i>
Creeper, False Virginia	<i>Parthenocissus inserta</i>



Creeper, Virginia	<i>Parthenocissus quinquefolia</i>
Dewplant, Purple	<i>Disphyma crassifolium</i>
Fanwort	<i>Cabomba caroliniana</i>
Fern, Water	<i>Azolla filiculoides</i>
Fig, Hottentot	<i>Carpobrotus edulis</i>
Garlic, Three-cornered	<i>Allium triquetrum</i>
Hogweed, Giant	<i>Heracleum mantegazzianum</i>
Hyacinth, water	<i>Eichhornia crassipes</i>
Knotweed, Giant	<i>Fallopia sachalinensis</i>
Knotweed, Hybrid	<i>Fallopia japonica</i> x <i>Fallopia sachalinensis</i>
Knotweed, Japanese	<i>Fallopia japonica</i>
Knotweed, Japanese	<i>Polygonum cuspidatum</i>
Leek, Few-flowered	<i>Allium paradoxum</i>
Lettuce, water	<i>Pistia stratiotes</i>
Alexanders, Perfoliate	<i>Smyrniun perfoliatum</i>
Archangel, Variegated Yellow	<i>Lamium galeobdolon</i> subsp. <i>argentatum</i>
Azalea, Yellow	<i>Rhododendron luteum</i>
Balsam, Himalayan	<i>Impatiens glandulifera</i>
Cotoneaster	<i>Cotoneaster horizontalis</i>
Cotoneaster, Entire-leaved	<i>Cotoneaster integrifolius</i>
Cotoneaster, Himalayan	<i>Cotoneaster simonsii</i>
Cotoneaster, Hollyberry	<i>Cotoneaster bullatus</i>
Cotoneaster, Small-leaved	<i>Cotoneaster microphyllus</i>
Creeper, False Virginia	<i>Parthenocissus inserta</i>
Creeper, Virginia	<i>Parthenocissus quinquefolia</i>
Dewplant, Purple	<i>Disphyma crassifolium</i>
Fanwort	<i>Cabomba caroliniana</i>
Fern, Water	<i>Azolla filiculoides</i>
Fig, Hottentot	<i>Carpobrotus edulis</i>



Garlic, Three-cornered	<i>Allium triquetrum</i>
Hogweed, Giant	<i>Heracleum mantegazzianum</i>
Hyacinth, water	<i>Eichhornia crassipes</i>
Knotweed, Giant	<i>Fallopia sachalinensis</i>
Knotweed, Hybrid	<i>Fallopia japonica x Fallopia sachalinensis</i>
Knotweed, Japanese	<i>Fallopia japonica</i>
Knotweed, Japanese	<i>Polygonum cuspidatum</i>
Leek, Few-flowered	<i>Allium paradoxum</i>
Lettuce, water	<i>Pistia stratiotes</i>
Hogweed, Giant	<i>Heracleum mantegazzianum</i>
Hyacinth, water	<i>Eichhornia crassipes</i>
Knotweed, Giant	<i>Fallopia sachalinensis</i>
Knotweed, Hybrid	<i>Fallopia japonica x Fallopia sachalinensis</i>
Knotweed, Japanese	<i>Fallopia japonica</i>
Knotweed, Japanese	<i>Polygonum cuspidatum</i>
Leek, Few-flowered	<i>Allium paradoxum</i>
Lettuce, water	<i>Pistia stratiotes</i>
Hogweed, Giant	<i>Heracleum mantegazzianum</i>
Hyacinth, water	<i>Eichhornia crassipes</i>
Knotweed, Giant	<i>Fallopia sachalinensis</i>
Knotweed, Hybrid	<i>Fallopia japonica x Fallopia sachalinensis</i>
Knotweed, Japanese	<i>Fallopia japonica</i>
Leek, Few-flowered	<i>Allium paradoxum</i>
Lettuce, water	<i>Pistia stratiotes</i>
Montbretia	<i>Crocsmia x crocosmiiflora</i>
Parrot's-feather	<i>Myriophyllum aquaticum</i>
Pennywort, Floating	<i>Hydrocotyle ranunculoides</i>
Potato, Duck	<i>Sagittaria latifolia</i>



Primrose, Floating Water	<i>Ludwigia peploides</i>
Primrose, Water	<i>Ludwigia grandiflora</i>
Montbretia	<i>Crococsmia x crocosmiiflora</i>
Parrot's-feather	<i>Myriophyllum aquaticum</i>
Pennywort, Floating	<i>Hydrocotyle ranunculoides</i>
Potato, Duck	<i>Sagittaria latifolia</i>
Primrose, Floating Water	<i>Ludwigia peploides</i>
Primrose, Water	<i>Ludwigia grandiflora</i>
Primrose, Water	<i>Ludwigia uruguayensis</i>
Rhododendron	<i>Rhododendron ponticum</i>
Rhododendron	<i>Rhododendron ponticum x Rhododendron maximum</i>
Rhubarb, Giant	<i>Gunnera tinctorial</i>
Rose, Japanese	<i>Rosa rugosa</i>
Salvinia, Giant	<i>Salvinia molesta</i>
Stonecrop, Australian Swamp (otherwise known as New Zealand Pygmyweed)	<i>Crassula helmsii</i>
Waterweed, Curly	<i>Lagarosiphon major</i>
Waterweeds (except Nuttall's Waterweed)	All species of the genus <i>Elodea</i> except <i>Elodea nuttallii</i>

N.B. There may other species in addition to the above that could cause an issue e.g., Spanish bluebell and American skunk-cabbage.

Consolidated EU *Xylella fastidiosa* host list.



Department
for Environment
Food & Rural Affairs

Botanical name	Common name	Grown (✓)	Botanical name	Common name	Grown (✓)
<i>Acacia dealbata</i>	Mimosa		<i>Polygala myrtifolia</i>	Myrtle-leaf milkwort	
<i>Acacia saligna</i>			<i>Prunus avium</i>	Sweet Cherry	
<i>Acer pseudoplatanus</i>	Sycamore		<i>Prunus cerasifera</i>	Cherry plum	
<i>Anthyllis hermanniae</i>	Yellow Kidney Vetch		<i>Prunus domestica</i>	Plum	
<i>Artemisia arborescens</i>	Wormwood		<i>Prunus dulcis</i>	Almond	
<i>Asparagus acutifolius</i>	Wild asparagus		<i>Quercus suber</i>	Cork Oak	
<i>Calicotome villosa</i>	Spiny broom		<i>Rhamnus alaternus</i>	Italian buckthorn	
<i>Catharanthus species</i>	Rose periwinkle		<i>Rosa canina</i>	Dog-rose	
<i>Chenopodium album</i>	Fat Hen (Weed)		<i>Rosmarinus officinalis</i>	Rosemary	
<i>Cercis siliquastrum</i>	Judas Tree		<i>Spartium junceum</i>	Spanish broom	
<i>Cistus creticus</i>	Rock rose		<i>Streptocarpus spp</i>	Cape Primrose	
<i>Cistus monspeliensis</i>	Rock rose		<i>Vinca species</i>	Periwinkle	
<i>Cistus salvifolius</i>	Rock rose		<i>Vitis vinifera</i>	Grape Vine	
<i>Coffea species</i>	Coffee		<i>Westringia fruticosa</i>	Australian rosemary	
<i>Coronilla valentina</i>	Bastard senna		<i>Westringia glabra</i>	Violet westringia	
<i>Cytisus scoparius</i>	Common Broom				
<i>Cytisus villosus</i>					
<i>Dodonaea viscosa</i>	Hopbush				
<i>Eremophila maculata</i>	Spotted Fuschia Bush				
<i>Erigeron bonariensis</i>	Hairy Fleabane (Weed)				
<i>Erigeron sumatrensis</i>	Guernsey Fleabane (Weed)				
<i>Erysimum spp</i>	Wall Flower				
<i>Euphorbia terracina</i>	False caper				
<i>Ficus carica</i>	Common Fig				
<i>Fraxinus angustifolia</i>	Narrow-leaved Ash				
<i>Genista x spachiana (syn. Cytisus racemosus)</i>	Sweet broom				
<i>Genista corsica</i>	Broom				
<i>Genista ephedroides</i>	Broom				
<i>Grevillea juniperina</i>	Juniper-leaf grevillea				
<i>Hebe species</i>					
<i>Helichrysum italicum</i>	Curry Plant				
<i>Heliotropium europaeum</i>	Common Heliotrope				
<i>Laurus nobilis</i>	Bay laurel				
<i>Lavandula angustifolia</i>	English lavender				
<i>Lavandula dentata</i>	French lavender				
<i>Lavandula stoechas</i>	French lavender				
<i>Lavandula x allardii</i>	Allards Lavender				
<i>Lavandula x intermedia</i>	Hybrid Lavender				
<i>Metrosideros excelsa</i>	NZ Christmas Tree				
<i>Myoporum insulare</i>	Blueberry tree				
<i>Myrtus communis</i>	Common myrtle				
<i>Nerium oleander</i>	Oleander				
<i>Olea europaea</i>	Olive				
<i>Pelargonium graveolens</i>	Sweet-scented pelargonium				
<i>Pelargonium x fragrans</i>					
<i>Phagnalon saxatile</i>					
<i>Phillyrea latifolia</i>	Mock Privet				

Consolidated list of plant that have been found to be susceptible to *Xylella fastidiosa* in the EU and which consequently now require a plant passport:
Updated 29/08/17.