

**A framework for otter conservation  
in the UK: 1995-2000**

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### **Summary of organisational acronyms used in text**

<b>CCW</b>	The Countryside Council for Wales
<b>DOE</b>	Department of the Environment
<b>DOE(NI)</b>	Department of the Environment (Northern Ireland)
<b>DSFBs</b>	District Salmon Fisheries Boards
<b>EN</b>	English Nature
<b>FZGGBI</b>	Federation of Zoological Gardens of Great Britain and Ireland
<b>IFE</b>	Institute of Freshwater Ecology
<b>ITE</b>	Institute of Terrestrial Ecology
<b>IUCN</b>	IUCN - The World Conservation Union
<b>JNCC</b>	Joint Nature Conservation Committee
<b>LAs</b>	Local Authorities
<b>MAFF</b>	Ministry of Agriculture, Fisheries and Food
<b>MS</b>	Mammal Society
<b>NRA/EA</b>	National Rivers Authority/Environment Agency
<b>OT</b>	The Otter Trust
<b>SNCO</b>	Statutory nature conservation organisations (CCW, EN, JNCC & SNH)
<b>SNH</b>	Scottish Natural Heritage
<b>SSC</b>	Species Survival Commission
<b>SOAEFD</b>	The Scottish Office Agriculture, Environment and Fisheries Department
<b>VWT</b>	Vincent Wildlife Trust
<b>WTs</b>	The Wildlife Trusts (formerly Royal Society for Nature Conservation)

## 1. Introduction

- 1.1 This document provides a framework for the conservation of the Eurasian otter *Lutra lutra* in the UK for the next five years. It provides an approach within which organisations and individuals can utilise their resources efficiently and effectively, and allows both integration of work towards common objectives or development of individual programmes of work.
- 1.2 The Framework's effectiveness relies on input from many individuals and organisations in both production and implementation. In particular, representatives from the following organisations have been involved in the preparation of this document: the Countryside Council for Wales, Department of the Environment, Department of the Environment (Northern Ireland), English Nature, Federation of Zoological Gardens of Great Britain and Ireland, Highways Agency, Institute of Terrestrial Ecology, Joint Nature Conservation Committee, Mammal Society, National Rivers Authority, The Otter Trust, Scottish Natural Heritage, Vincent Wildlife Trust, The Wildlife Trusts and scientific staff from the Universities of Aberdeen, Cardiff, Essex, Exeter and London. As well as the above, there are many other organisations involved in conservation and land management who have important roles to play in otter conservation.
- 1.3 **The inclusion of organisational acronyms in the sections of 'Action points' does not commit these organisations to implementing those actions, nor does it represent a pre-contractual commitment by any organisation to resourcing the actions. It does, however, indicate those organisations with the appropriate remit for involvement in the implementation process.**
- 1.4 The Framework is complementary to the Species Action Plan prepared for the otter under the UK Biodiversity Action Plan programme. Both this Framework and the Species Action Plan should be reviewed in five years' time (2000).

## **2. Background**

- 2.1 The otter is an important part of the UK's natural heritage; it is also an important indicator of the quality of wetlands and waterways. UK populations are internationally important, especially since otter populations have declined across much of their western European range.
- 2.2 The otter is now widely, though unevenly, distributed across the British Isles and Ireland. Summaries of otter biology and conservation status can be found in Corbet & Harris (1991), Harris *et al.* (1995) and Morris (1993); Chanin (1985); Mason & Macdonald (1986), Macdonald & Mason (1994) and Kruuk (1995) provide comprehensive reviews of otter biology; whilst the National Rivers Authority (1993) has reviewed river and habitat management techniques which enhance areas for otters.
- 2.3 The otter was considered common through the UK in the 1950s, but declined from about 1957 onwards. By the late 1970s the otter population was extirpated from the majority of England and parts of Scotland and Wales. Surveys from the late 1980s and 1990s indicate that the otter population is recovering, with expansion from strongholds in the south-west and west, and is now repopulating many parts of the UK. It is likely that the original population crash, and subsequent expansion, were as a result of the use, and then phasing out, of chlorinated hydrocarbon pesticides in the UK.
- 2.4 The otter is listed on the EC Habitats Directive (and therefore the Conservation Regulations 1994), the Bern Convention and CITES, and is classified by the IUCN as 'Vulnerable' due to the declining or endangered status of many of its populations. The otter is protected by listing under two Schedules of the Wildlife and Countryside Act 1981 and has equivalent protection in Northern Ireland (Wildlife (NI) Order 1985). A summary of the legislation relevant to otter conservation is provided in Appendix 1.
- 2.5 There are many organisations and individuals undertaking conservation action or research to benefit otters in the UK. Co-operation between organisations and individuals will maximise the beneficial effects for otters and their habitats.

**3. Aim of the strategy**

- 3.1 To maintain existing populations, encourage natural recolonisation, and effectively safeguard viable populations of otters and their habitats throughout their natural range in the UK.

## **4. Conservation - objectives, background and action**

There are seven objectives for the effective conservation of the otter in the UK:

- survey and monitor populations to determine the UK resource and trends;
- maintain and enhance current populations through good habitat management;
- monitor, assess and reduce (or eliminate where possible) prevalent 'threats';
- promote expansion of populations by the natural recolonisation of areas;
- implement and enforce relevant legislation and policy;
- improve knowledge of ecology and conservation through appropriate research;
- promote education and awareness of the status and needs of otters.

These objectives are considered below in detail, along with an explanatory background section and suggested actions points.

### **4.1 Survey and monitoring**

#### **4.1.1 Objectives**

To establish effective survey and monitoring of otters, the aims of which are:

- to determine the status and trends of otter populations throughout the UK;
- to develop survey methods;
- to maintain and improve monitoring systems by ensuring co-ordination;
- to develop systems that allow efficient use of data and information;
- to integrate otter survey data with other relevant environmental data.

#### **4.1.2 Background**

- (a) As at 1994, data on the distribution of the otter are from a series of authoritative national sample surveys organised and funded by either the statutory nature conservation organisations or the Vincent Wildlife Trust. These surveys used standardised methods. Complementing the national surveys, there have been numerous local surveys funded from a variety of sources. Action is now needed to build upon this basis and improve knowledge of changing otter distribution.
- (b) Survey methods and data storage systems should be developed to allow the monitoring of changes in populations. This will require statistical rigour in survey design; new techniques for accurately quantifying populations, or calibrated methods for calculating 'population indices'; effective and efficient use and interrogation of information at local and national levels; and further inter-organisational co-ordination of surveys.
- (c) There is a need to integrate otter surveying with monitoring of other variables such as water quality, habitat and prey base, and thereby define otter requirements more precisely.

#### 4.1.3 Action Points

- (a) National surveys of the otter should continue. The current seven year cycle appears to be appropriate for the conservation requirements of the species but should be reviewed. **Action: SNCO, VWT, WTs.**
- (b) Local surveys should be structured to allow comparison between regions and inclusion in the national dataset. Local surveys, e.g. for otter catchment management plans, should be co-ordinated, to allow increased contact between regional staff from relevant organisations. Specific surveys will also be required in response to animal sightings or development proposals. These should also be co-ordinated across groups, by nomination of organisation contact points, and structured, perhaps by the use of generic information sheets, to allow input to national databases. An annual meeting of all those involved in otter survey would be an appropriate forum for the exchange of ideas and standardisation of methods. **Action: ITE, NRA/EA, OT, SNCO, VWT, WTs.**
- (c) There should be monitoring of the effects, and effectiveness, of habitat management schemes and site designations designed to conserve otter populations. **Action: NRA/EA, OT, SNCO, VWT, WTs.**
- (d) Recording and data storage systems should be standardised to allow wider access to, and use of, information whilst acknowledging that some information, for instance on the location of holt sites, is sensitive. **Action: ITE, NRA/EA, SNCO, VWT, WTs.**
- (e) Survey of habitat and other environmental variables should accompany otter survey, and data on otter distribution and abundance should be integrated with GIS systems, to allow the development of ecosystem and predictive modelling. **Action: DOE, ITE, NRA/EA, OT, SNCO, universities, VWT, WTs.**
- (f) There should be development of agreed methods to allow quantification of population levels, or the production of population indices, from current surveys; the analysis of DNA markers within spraints, for instance, may be a useful technique. **Action: ITE, SNCO, universities, VWT.**
- (g) There should be an analysis of how otter monitoring could be more closely allied to the monitoring of other riparian species (e.g. mink, water vole), even if this is simply an indication of presence/absence. **Action: ITE, MS, SNCO, VWT, WTs.**
- (h) Levels of important prey resources such as fish, amphibians and crustaceans should be monitor, at least in regionally targeted areas. **Action: IFE, ITE, NRA/EA, SNCO, universities.**
- (i) Analysis of spraints is a good potential source of information on otter diet. Methods of spraint analysis for otter diet should be agreed and follows. **Action: IFE, ITE, NRA/EA, SNCO, universities.**

## **4.2 Maintain and enhance current populations through good habitat management**

### **4.2.1 Objectives**

To maintain, enhance and improve habitats to conserve existing otter populations and also to promote natural expansion of populations.

### **4.2.2 Background**

The management of existing habitat is complementary to the restoration of degraded habitats and the reduction of threats to habitats. Habitat evaluation and management should be carried out on a catchment basis to take account of the otter's wide-ranging habits and specific habitat requirements. Current wider countryside (Countryside Stewardship, Environmentally Sensitive Areas) and agri-environment schemes (e.g. water fringe options, otter havens) present potentially useful mechanisms for otter conservation. Many of the specific details on management of habitat for otters may be found in National Rivers Authority (1993).

### **4.2.3 Action points**

- (a) Evaluate the habitat and food resource on a region- or catchment-wide basis and identify areas of ecologically valuable and degraded habitat in terms of otter requirement (see also 4.1.3.e and 4.3.3.d) and, therefore, target areas for conservation and potential enhancement or restoration. Priorities for catchment-wide conservation should also derive from existing otter population levels, or proximity to existing populations. **Action: LAs, NRA/EA, WTs.**
- (b) Undertake a proactive management programme based on 4.2.3.a and/or best current knowledge of habitat requirements, considering also reactive management where appropriate. **Action: NRA/EA, WTs, land managers.**

## **4.3 Monitoring, assessment and reduction of threats**

### **4.3.1 Objectives**

Although individual animals, and their breeding sites and resting places, are protected by law (Appendix 1), otter populations face a range of threats. The threats should be monitored, the effects of these on populations should be assessed, and measures to eliminate or ameliorate them should be taken.

### **4.3.2 Background**

- (a) Disturbance - Anthropogenic disturbance will inevitably increase with the increase in water-based recreational activities and disturbance is also evident where mink are hunted. Breeding female otters may be particularly sensitive to disturbance, although it is not known if this limits population viability. Otters may be less sensitive to disturbance where habitats are good.
- (b) Habitat destruction is a serious problem, particularly for wetland habitats. Large areas of wetland have historically been lost through drainage and flood prevention



measures. Removal of habitat, such as reedbeds, woodland close to rivers, carr and individual riverside trees, deprives otters of suitable 'lying up' and foraging sites, as does the reduction in tree and shrub regeneration by overgrazing of riverside pasture. Ecologically-sensitive river management techniques are detailed in Royal Society for the Protection of Birds, National Rivers Authority & Royal Society for Nature Conservation (1994).

- (c) Direct effects of contaminants - Chlorinated hydrocarbons were probably largely responsible for the dramatic decline in otter populations in the late 1950s. Such environmental contaminants are particularly dangerous to species such as the otter, which have potentially long life spans and low reproductive rates and occupy the top of the food chain. Although the threat of chlorinated hydrocarbon insecticides has been reduced, polychlorinated biphenyls (PCBs) and heavy metals remain, and need to be monitored and assessed. In particular, causal links between population decline and pollutants should be examined.
- (d) Direct effects of other pollutants - Other pollutants, such as industrial, farming and anti-fouling chemicals and oil spills, may have local significance for otter populations.
- (e) Prey base and water quality - Water quality may be adversely affected, either by a high loading of organic matter (leading to low oxygen levels), or by acidification (particularly upland rivers). Both may reduce prey biomass. Additionally, low water quality often results from one or more forms of toxic pollutants (see (d) above).
- (f) Mortality by man - Common causes of otter mortality include accidental killing on roads and incidental killing in fish, eel and lobster nets/traps and bankside snares. Accidental deaths may have serious implications for the viability of populations, especially where otters are recolonising new areas and population size is small. The intentional killing of otters is illegal, except in certain exceptional circumstances (see Appendix 1).

#### **4.3.3 Action points**

- (a) Research should quantify threats where possible, and distinguish between widespread threats to populations and localised threats to individuals. **Action: ITE, SNCO, universities.**
- (b) The effects of disturbance on otters should be quantified to allow actions, such as the creation of increased cover or the effective management of human activity, to reduce these effects. **Action: ITE, SNCO, universities.**
- (c) Habitats should be managed for wildlife wherever appropriate and habitat destruction should be avoided. Where it is necessary, methods should be employed that reduce the severity of effects e.g. rotational clearing. **Action: LAs, land managers, NRA/EA, SNCO, VWT.**
- (d) Areas of both ecologically valuable and ecologically degraded habitat should be identified in order to undertake conservation or consider rehabilitation work respectively; once identified, programmes of habitat management, considering whole

ecosystem requirements, should be drawn up with landowners. **Action: land managers, NRA/EA, SNCO, WTs.**

- (e) Pollutants which bio-accumulate in otters should be monitored. A system should be established that allows tissue from otter corpses to be collected, stored and analysed using standard techniques. **Action: DOE, ITE, NRA/EA, SNCO, universities, WTs.**
- (f) A standard method for the analysis of contaminant levels in fish tissue should be agreed and promoted and subsequently incorporated into UK programmes of fish tissue analysis. **Action: IFE, ITE, MAFF, NRA/EA, SOAEFD.**
- (g) Voluntary safeguards should be encouraged and legislative safeguards should be enforced, preventing both localised and diffuse discharge of pollutants. **Action: NRA/EA.**
- (h) Integrated catchment management plans should be targeted to take account of regional differences in otter distribution and, where appropriate, otter catchment management plans that cut across regions or rivers should be produced. **Action: DOE(NI), NRA/EA, SNCO, WTs.**
- (i) Practical measures such as underpasses under new and existing roads and guards on fishing nets should be used to prevent accidental and incidental killing of otters by man. A code of best practice on the use of waterside snares should be promoted to reduce otter mortality. **Action: land managers, LAs, NRA/EA, SNCO, WTs.**

#### **4.4 Expansion and recolonisation**

##### **4.4.1 Objectives**

To promote the expansion of populations by natural recolonisation.

##### **4.4.2 Background**

- (a) At the forefront of naturally advancing populations it is important to achieve environmental conditions that favour otter survival and facilitate the spread of the population. The key environmental criteria for these areas are suitability of habitat and elimination or amelioration of threats, as outlined in 4.3.
- (b) Restocking may be a management option but only where conditions are known to be favourable and where no viable otter population is present or near enough to recolonise naturally in the foreseeable future.
- (c) There is now a declining need for the reintroduction of otters. On the occasions when it is deemed appropriate it should be seen as a complementary, rather than alternative, tool to natural recolonisation. There is thus a need to consider every proposed reintroduction programme very carefully. Prior to, and during, reintroduction, the following guidelines should be followed:
  - SSC/IUCN criteria should be met; the essentials of these are set out in 4.4.3.a.

- There should be strong presumption against the taking of wild animals for translocation purposes. Such actions are appropriate only where there is a clear need for animals to be reintroduced and *either* a lack of suitable captive animals *or* clear evidence that the use of translocated animals will provide a better alternative.
  - Guidelines on rearing and release methods and consultation protocols for releases should be produced and common standards agreed.
- (d) There should be established and agreed criteria for measuring the long-term success of restocking and reintroduction programmes.
- (e) There should be mechanisms which allow compliance with these guidelines, including licensing for release of otters into the wild.
- (f) Restocking of existing otter populations with orphaned or rehabilitated animals should follow similar criteria to those for reintroductions, with the additional presumption that rehabilitated animals should be released as close as is safely possible to the area in which they were found.
- (g) Whenever otters are released, micro-transponders should be fitted in an agreed position and blood samples should be taken for DNA analysis.

#### **4.4.3 Action points**

- (a) There should be agreed locations targeted for reintroduction with appropriate consultation with all relevant parties prior to release. In all circumstances, reintroduction programmes and individual releases should satisfy the following criteria:
- good historical evidence of former natural occurrence;
  - an understanding of why the species was extirpated from the area;
  - a removal of those factors that caused extirpation and an absence of other threats;
  - the presence of suitable habitat, prey and water quality for the reintroduced animals and their offspring;
  - any taking of animals for release should not prejudice the survival of the donor population;
  - no viable otter population should be present;
  - no otter populations exist near enough to recolonise naturally in the foreseeable future.
- Action: OT, SNCO, VWT, WTs.**
- (b) Standard codes of practice for the release of otters into the wild should be agreed and followed. **Action: OT, SNCO, VWT, WTs.**
- (c) Standard methods for monitoring the success of releases should be agreed and followed; these should consider both short-term survival and breeding success of released animals and long-term effects on the status of population. **Action: ITE, OT, SNCO, VWT, WTs.**

- (d) Standard codes of practice for the keeping of otters should be agreed and followed. These should include guidelines on rearing and maintenance; sound genetic protocols for management of captive otters, the maintenance of a UK studbook and its input to the European studbook; best practice for rehabilitation. **Action: FZGGBI, OT, SNCO, VWT.**
- (e) There should be public education on otter ecology and conservation in those areas of the country that otters are now recolonising. **Action: FZGGBI, NRA/EA, OT, SNCO, VWT, WTs.**

## **4.5 Legislation and policy**

### **4.5.1 Objectives**

To ensure that otters are appropriately protected and conserved in law, and that the law is effectively implemented and enforced.

### **4.5.2 Background**

- (a) Current legislation and conventions relevant to the otter are listed in Appendix 1. Government ensures that legislation to safeguard habitats and species is in place, and is responsible for the designation of protected sites under international legislation. The statutory nature conservation authorities (JNCC, CCW, DOE(NI), EN, SNH) are responsible for providing advice to Government, and for implementation of some aspects of conservation legislation. The country agencies also cover aspects of licensing, and the designation of protected sites under domestic legislation. The following are priorities for action:
  - The effectiveness of current legislation relevant to otter conservation should be examined. This should include consistent bye-laws on the deployment of guarded Fyke nets.
  - There should be a mechanism for controlling the release of otters into the wild.
  - Appropriate mechanisms should be developed for informing local planning authorities, statutory undertakers and conservation organisations of the presence of otter populations and of the resulting legal implications under the Wildlife and Countryside Act 1981 and Conservation (Natural Habitats, etc) Regulations 1994.
  - The designation of Special Areas of Conservation for otters as required by the Habitats Directive.

### **4.5.3 Action points**

- (a) The definition of 'trap' in the Wildlife and Countryside Act 1981 should be examined. **Action: DOE.**
- (b) Fisheries bye-laws on the use of otter guards on Fyke nets should be introduced to all areas currently without them. **Action: NRA/EA.**
- (c) Potential mechanisms for controlling otter releases should be reviewed. **Action: SNCO, DOE.**

- (d) 'Regional Indicative Otter Strategies' may provide a mechanism for proactively informing local authorities of the likelihood of otter presence; the potential effectiveness of this should be assessed. **Action: SNCO, LAs.**
- (e) Special Areas of Conservation (SACs) will be designated for the otter according to Part II of the Conservation (Natural Habitats, etc) Regulations 1994. **Action: DOE, SNCO.**

## **4.6 Conservation research**

### **4.6.1 Objectives**

To underpin current, and develop new, conservation actions with sound scientifically-derived data and information on the ecology and conservation of otters.

### **4.6.2 Background**

- (a) Much research has been undertaken on otter populations and much is known of otter ecology. Nevertheless, there are still gaps in our knowledge (e.g. the importance of breeding sites) that require applied research and a need to co-ordinate both between organisations and between researchers and conservationists.
- (b) The movement patterns of otters, particularly recolonising movements, need to be understood to ensure that management of factors affecting populations is effective. Information is required also on the response of otters, both in the short- and long-term, to anthropogenic disturbance.
- (c) Data are needed on the genetic diversity of wild populations of otter to assess the relative value of restocking programmes; blood, hair or spraint samples should be taken wherever possible.
- (d) Data on natural natality, sex ratios, survivorship and mortality are needed to progress both 'Population and Habitat Viability Analysis' (PHVA) and 'Regional Management' approaches. PHVA constructs a simulation model to evaluate population dynamics and extinction risks. Regional Management applies common management criteria across regional scales (section 5).
- (e) Data are required on the effectiveness (success) of conservation management techniques.

### **4.6.3 Action points**

- (a) There should be a desk study to collate and critically evaluate current information relevant to otters in this UK; this should proceed in parallel with the development of the strategy. **Action: SNCO.**
- (b) In particular, research is required on the interactions between otters and fish stock productivity and biomass, otter populations and pollutants (particularly PCBs and certain heavy metals), otters and mink, and otter populations and disturbance by man.

**Action: DOE, DSFBs, ITE, MAFF, MS, NRA/EA, OT, SNCO, SOAEFD, universities, VWT, WTs.**

- (c) Data are required on natural colonising movements and parameters necessary for PHVA. **Action: FZGGBI, ITE, MS, OT, SNCO, universities, VWT, WTs.**
- (d) A freely available list of current research and planned research is required to avoid duplication of effort. **Action: DOE, ITE, MAFF, MS, NRA/EA, OT, SNCO, SOAEFD, universities, VWT, WTs.**
- (e) Research should assess the effectiveness of management techniques for otter conservation, ranging from local efforts to reduce mortality (e.g. roadside reflectors) to catchment-wide habitat management. The suite of most appropriate actions will reflect regional differences in otter conservation throughout the UK. **Action: ITE, NRA/EA, SNCO, universities, WTs.**
- (f) Research should assess the genetic variation within and between otter populations in different parts of the UK, and greater use should be made of the tissue banks, captive animals and otter corpses currently available. **Action: FZGGBI, ITE, OT, SNCO, universities, VWT.**

#### **4.7 Education and awareness**

##### **4.7.1 Objectives**

To promote an increased awareness of the conservation status and needs of the otter.

##### **4.7.2 Background**

- (a) The otter is an attractive and photogenic animal with a great appeal to the general public and its conservation is widely supported.
- (b) As the otter population recolonises areas there will occasionally be a minority sector that regard this as unwelcome and, additionally, land managers or fishermen who may be unaware of the hazards their practices (e.g. snares, Fyke nets) pose to new colonists.
- (c) There should be an increased communication to, and targeting of, audiences in appropriate parts of the country for particular messages. Audiences range through land owners, land managers, fisheries managers and staff, anglers, NRA/EA staff, SNCO staff, voluntary sector staff, local volunteer groups and members of the general public.

##### **4.7.3 Action points**

- (a) There should be an increased awareness of otter status and conservation amongst the general public via educational material and posters. **Action: FZGGBI, NRA/EA, OT, SNCO, VWT, WTs.**

- (b) Such educational material may be usefully targeted at specific sectors of the general public in specific areas. **Action: NRA/EA, SNCO, WTs.**
- (c) There should be an examination of the best methods of information dissemination amongst otter conservationists in the UK. **Action: all.**
- (d) There should be regional workshops on otter conservation to which all relevant parties are invited to attend. **Action: FZGGBI, NRA/EA, OT, SNCO, WTs.**
- (d) There should be an advisory booklet aimed at land managers and fish farmers. **Action: MAFF, NRA/EA, OT, SNCO, SOAEFD, VWT, WTs.**

## **5. Guidelines for Regional Management**

- 5.1 The uneven distribution of the otter across the UK means that regional (river catchment-, county- or NRA regional-scale) approaches to, and targets for, conservation may differ. It is important, however, that such regional approaches are consistent with, and contribute effectively to, national objectives, and *vice versa*. This framework provides common guidelines for appropriate conservation action.
- 5.2 The main parameters which determine appropriate conservation action are:
- (i) otter population status - presence of otters or proximity of location to existing otter populations and the status and condition of those existing populations;
  - (ii) water quality - an important factor in determining prey quality (see 5.2.iii), but also in the detection of direct factors such as potentially lethal or sub-lethal bio-accumulating pollutants;
  - (iii) prey quality - both availability and suitability (but note that many naturally 'good' waterways, e.g. upland rivers, do not necessarily support adequate prey for otters);
  - (iv) habitat quality - principally the availability of breeding and resting sites (and freshwater washing sites in coastal ranges);
  - (v) anthropogenic factors - abiotic mortality or levels of disturbance.
- 5.3 The first step is the quantitative definition of these parameters and the provision of data necessary to classify the area according to these guidelines. Where such data are unavailable the best available science should be used, in conjunction with the establishment of a monitoring programme to provide them in the future.
- 5.4 If the data are available, then management plans, at either regional or catchment levels, may be formulated using the decision flow charts shown in Figures 1 & 2.
- 5.5 Figure 1 considers guidelines based on the presence or absence of otters and indicates where particular management strategies may be appropriate. Figure 2 gives examples of the more detailed processes that may be considered within that overall context.
- 5.6 In summary, a regional planning process should explicitly address the criteria outlined in Figures 1 & 2 in the assessment of the most appropriate management action for that region. This assessment should be both agreed and promoted between and within all relevant organisations.



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## **Appendix 1.**

### **A summary of the domestic and international legislation relating to the otter**

The otter is listed on Annexes II & IV of the EC Habitats Directive (EC/92/43), Annex II of the Bern Convention and Appendix 1 of the Convention on International Trade in Endangered Species. It is classified by the IUCN as 'Vulnerable' due to the declining or endangered status of many of its populations. Obligations of the EC Habitats Directive are transposed into national legislation by the Conservation (Natural Habitats, etc.) Regulations 1994. The otter is listed under two Schedules of the Wildlife and Countryside Act 1981: Schedule 5 listing makes it an offence intentionally to kill, injure, take or sell the animal or parts of it, or to damage, destroy or obstruct access to their resting places; Schedule 6 listing restricts certain methods of killing, taking or injuring. The otter has equivalent protection in Northern Ireland (Schedules 5, 6 & 7 of the Wildlife (NI) Order 1985).

### **Wildlife and Countryside Act 1981**

Schedule 9 of the Act states that it is an offence to do the following to any species of wild animal included in Schedule 5:

Schedule 9(1) - intentionally (a) kill, (b) injure or (c) take the species;

Schedule 9(2) - be in possession or control of a live or dead specimen, any part of a specimen, or anything derived from it;

Section 9(4) - intentionally damage or obstruct access to any place of shelter or protection or disturb the animal whilst occupying such a place of shelter or protection;

Section 9(5) - sell any live or dead specimen, any part of a specimen, or anything derived from it.

Section 11 of the Act states that it is an offence to do the following to any species of wild animal included in Schedule 6:

Section 11(2) - (a) set in position any of the following articles, being an article which is of such a nature and so placed as to be calculated to cause bodily injury, any trap or snare, any electrical or poisonous substance; (b) use for the purpose of killing or taking any such article as aforesaid, whether or not of such a nature and so placed as aforesaid, or any net; (c) use for the purpose of killing or taking any automatic or semi-automatic weapon, any device for illuminating a target, any form of dazzling device, any gas or smoke; (d) use as a decoy, for the purpose of killing or taking, any sound recording; (e) use any mechanically propelled vehicle in immediate purpose of the animal.

Under certain circumstances, where otters are causing serious damage, licences for their destruction or removal may be granted under Section 16(3). Control of otters without such a licence is an offence.

Further site-specific protection is afforded by Part II of the Act, under which the statutory nature conservation agencies can designate areas as SSSIs if they are of the opinion that the land is of special interest by reason of its flora or fauna.

It should be noted that the Isle of Man and the Channel Islands are not covered by the Wildlife and Countryside Act 1981. Northern Ireland has its own legislation, as outlined below.

### **Wildlife (Northern Ireland) Order 1985**

Part II Article 10 is similar to Part 1 Section 9 of the Wildlife and Countryside Act, and states that it is an offence to do the following to any species of wild animal included in Schedule 5:

Article 10, subsection (1) - intentionally (a) kill, (b) injure or (c) take the species;

Article 10, subsection (2) - be in possession or control of a live or dead specimen, or any part of a specimen;

Article 10, subsection (4) - intentionally damage or obstruct access to any place of shelter or protection or disturb the animal whilst occupying such a place of shelter or protection.

There is further site-specific protection afforded under the Nature Conservation and Amenity Lands (Northern Ireland) Order 1985, Article 24, which allows for the designation of Areas of Special Scientific Interest (ASSIs).

### **Bern Convention**

The UK is a signatory to the Convention on the Conservation of European Wildlife and Natural Habitats (the Bern Convention), which makes provision for the protection of species and places obligations on the UK in respect of implementation. The otter is on Appendix II.

Article 2 requires that measures are taken to maintain populations of wild flora and fauna, whilst taking account of economic and recreational requirements. Article 6 seeks to ensure special protection for species listed in Appendix II of the Convention. Article 8 prevents the use of indiscriminate means of capture. These appendices are implemented in the UK by the Wildlife and Countryside Act 1981 and Wildlife (Northern Ireland) Order 1985.

### **EC Habitats Directive and Conservation (Natural Habitats etc.) Regulations 1994**

EC Directive 92/43 on the Conservation of Natural Habitats and of Wild Fauna and Flora (the 'Habitats Directive'), adopted in May 1992, requires the conservation of habitats and of wild flora and fauna of community interest. This is to be achieved through the designation of Special Areas of Conservation (SACs) which, together with Special Protection Areas (SPAs) classified under the EC Birds Directive, form a 'coherent European ecological network' called Natura 2000. Member states are also exhorted to improve the coherence of this network by appropriate additional measures in the wider countryside, which are aimed at maintaining and developing key landscape features.

The otter is on Annexes IIa and IVa. Articles 3, 4 and 6 require the designation and conservation of SACs for species listed on Annex IIa. Article 10 requires the UK to encourage the management of features of the countryside which, by virtue of their linear nature, promote the migration, dispersal and genetic exchange of wild species. 'Rivers with their banks' are cited as an example of such a feature. Article 11 requires the surveillance of species on Annexes IIa and IVa. Article 12 requires strict protection of species on Annex IVa, prohibiting deliberate killing, keeping, transport, etc., and requires the monitoring of any killing/capture; it also includes an obligation to take steps to prohibit the deterioration or destruction of breeding sites or resting places. Obligations of the EC Habitats

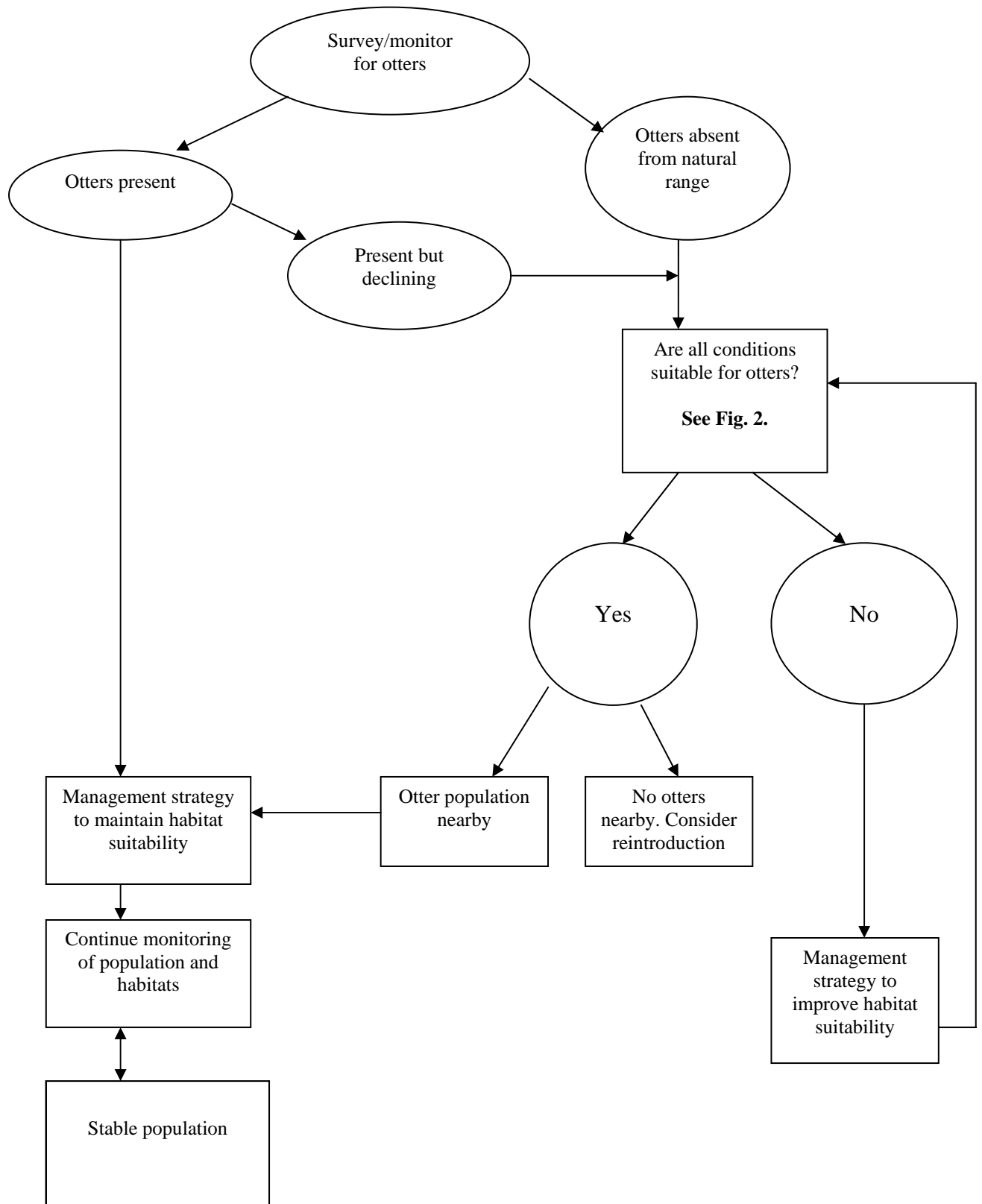
Directive are transposed into national legislation by the Conservation (Natural Habitats, etc.) Regulations 1994; sections 7 *et seq.* & 39 *et seq.* cover designation of sites as Special Areas of Conservation (SACs) and protection of listed species of animal respectively. In particular, Section 39(1) makes it an offence to deliberately capture, kill or disturb a wild otter, or to damage or destroy an otter's breeding site or resting place.

### **International trade**

CITES is implemented in the UK through EC Directive 3626/82. The otter is listed on Appendix 1 of CITES. Under that Appendix, trade in the species is allowed only in "exceptional" circumstances.

*The summaries of legislative requirements given in this Appendix should be used as guidance only. Reference should be made to the original text of each document when a full definition is required.*

**Figure 1. Guidelines for otter population management**



**Figure 2. The management of an environment to maximise suitability for otter habitation**

