

FALCONRY IN THE UNITED KINGDOM



AN AUDIT OF THE CURRENT POSITION

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Executive summary on Falconry in the United Kingdom

The UK Government created the Hawk Board in 1979 to act as a consultative body for the implementation of the EU Birds Directive, which culminated in the Wildlife and Countryside Act (1981).

The board is democratically elected, and operates beyond the parameters of International Union on the Conservation of Nature (IUCN) on sustainable use, in that it includes individual animal welfare as well as the welfare of species and wild populations.

The Hawk Board provides a two-way point of contact between the UK and devolved governments.

“Falconry is the pursuit of wild quarry in its natural state by means of trained birds of prey”

Falconry has been practised continuously in the UK since pre-history. Its traditions, literature and art are part of the UK's intangible cultural heritage.

In 2007:

- 25,000 people keep birds of prey in the UK
- 5,000 falconers hunt with birds of prey in the UK
- 2,000 people breed birds of prey in the UK
- There is a National Award in Bird of Prey Management run by LANTRA and initiated by the Hawk Board
- There are 23 falconry or raptor-keeping clubs in UK, represented to the government by the Hawk Board
- 35 centres providing training courses in bird of prey management
- Education plays a big part in falconry. Over 12 million school children are advised on falconry, 400,000 people enjoy ‘experience days’, there are 5 million corporate hospitality days and over 45 million people watch displays each year.
- 21 pest control businesses use birds of prey at landfill sites, at civil and military airfields and other sites such as The Houses of Parliament and Cardiff Millennium Stadium. One company alone turns over £2 million (*€3 million*) per year.
- There are 3000 FTE (*full time equivalent*) jobs dependent on falconry, and over 300 UK-based raptor-related businesses.
- There are probably about 70,000 raptors legally kept in captivity in UK.
- The numbers of birds bred in captivity is expanding at the rate of 11% per annum.



- £8.5 to £10 million (*€12.75 – € 15 million*) worth of birds of prey were bred in 2005.
- All applications for export are reviewed by government scientific agencies. Importing a bird of prey requires quarantining in one of the licensed quarantine facilities.
- The registration process for captive birds is under review (*2007*), and certain aspects are also subject to devolved government in Wales and Scotland. This registration review has already lasted 7 years. Registered specimens are recorded on a central database held by DEFRA (*Animal Health*) in Bristol. There is no central database for the EU.
- Although birds of prey may be taken under licence from the wild for the purpose of falconry, no such licence has been issued since 1987.
- UK falconry is self-sustaining for birds of prey and exports £1.6 million (€2.4 million) each year.

... *Did you know that:*

- DEFRA spends £1,052,805 on CITES licensing and registering birds of prey. Users incurred similar costs, making a total cost of around £2.1 million per year.
- DEFRA is the largest single beneficiary of birds of prey, employing several full-time staff whose jobs depend solely on raptor registration and documentation. However, CITES monitoring of legitimate wildlife trade remains woefully inadequate due to inconsistent and erratic processing and reporting of data.
- The Hawk Board produces guidelines for the keeping and displaying birds of prey to comply with the Animal Welfare Act. Reviews by the RSPCA revealed no welfare issues of concern.
- In the UK, captive-bred raptors are privately owned. They come under private property law; they are not protected by wild bird legislation.
- The Hawk Board estimate that about 50 captive bred raptors are either electrocuted on power cables or illegally shot each year; it may be considerably more.



... *Interestingly:*

- As well as for falconry, raptors are kept in captivity for purposes such as captive breeding, rehabilitation, conservation breeding, education, research and pest control.
- British falconers were instrumental in re-introducing the Goshawk to the UK by importing and releasing birds in the early 1970s.

- In 1987, British falconers at International Wildlife Consultants UK hatched and reared 55 Red Kites as part of the Kite Restoration Programme. Kites are now flourishing in Wales, England and Scotland. Tourism from kites is worth £3 million (*€ 4.5 million*) and supports 114 full-time job equivalents in the rural economy.

- The UK's falconers led various raptor conservation projects and surveys, including Peregrines, Golden Eagles, White-tailed Sea-Eagles, Merlins, Sparrowhawks and Hen Harriers. Falconry specialists from UK have played major roles in conservation efforts in other countries, for example on Mauritius Kestrels, New Zealand Falcons and Vultures in the Indian Sub-Continent.



- Falconry is an extension of a natural activity in that both raptor and prey are completely free to use their natural attack and escape behaviours that have evolved with their morphology over millions of years. Falconry is a naturally self-limiting, low impact activity in that a raptor can make only a few hunts per day, and only a small percentage of these will be successful. It is a selective form of predation as raptors quickly detect sick and injured prey and hunt them preferentially.



- Legislators have made no contingency for the *fera naturae* of raptors. Extensive, bolt-on, confusing and incoherent legislation that governs 'falconry' includes over fifty pieces of law – most of which is outdated.

... *And finally:*

- In the last 10-15 years most of the UK's wild raptor population have now recovered to their pre-pesticide 1960's numbers, some even more so. Most are at capacity for the available habitat.
- Current mortality factors for wild birds are injury, starvation, disease, road traffic and illegal shooting. Currently up to 2,100 Peregrine falcons die per year from these factors in UK.
- Because of advances in DNA recording, illegal wild-take for falconry is no longer considered a problem either by the government or NGOs such as the RSPB.
- Falconers have part-funded government research into DNA forensic techniques and supplied family group DNA samples for testing.



- About 90-95% of the falcons in the Arabian Gulf are now captive-bred and the importing of wild falcons has been reduced or banned entirely. Despite many unsubstantiated media reports, there is no demand for Peregrines. Falconers have spearheaded the conservation work on Saker falcons in 14 countries and part-funded various CITES conferences and meetings (www.savethesaker.com). Falconers successfully lobbied for a CITES Significant Trade Review for the Saker Range countries.
- Falconers in UK voluntarily follow the codes of practice on hybrid falcons as laid down by the International Association of Falconry and the Hawk Board. This is in line with Recommendation 3 in the UK Government Review of Non-native species policy (*DEFRA 2003*). Despite the thousands of hybrids flown in UK, there is no single record of their breeding in the British countryside and the Hawk Board does not consider this to be an issue.



1. Introduction

- 1.1 Falconry has been practised continuously in Britain since pre-history. By 670AD the statue at Bewcastle indicates that it was already well established.
- 1.2 Falconry has continued as an unbroken thread of intangible cultural heritage as defined by the UNESCO 2003 convention ratified by 75 member states. It is richly represented in British art and literature including the works of William Shakespeare.
- 1.3 Falconry is currently practised in 65 countries.
- 1.4 The Hawk Board was created at the instigation of the UK Government in 1979 to act as a consultative body for the implementation of the EU Birds Directive which culminated in the Wildlife and Countryside Act (1981). It is democratically elected, includes representatives of the UK's 14 largest falconry clubs, and operates according to its Principles, which are shown in Appendix 1. These Principles extend beyond those of IUCN on sustainable use, in that they include individual animal welfare as well as the welfare of species and populations. Nowadays the Hawk Board provides a two-way point of contact between the UK government and hawk-keepers and its consultation remit includes any potential regulation affecting keeping raptors in captivity. It has a subsidiary, the Scottish Hawk Board, and also includes members who deal with devolved issues concerning Wales and Northern Ireland.
- 1.5 **A definition:** *Falconry is the pursuit of wild quarry in its natural state by means of trained birds of prey.*

However, because many people keep and fly raptors in UK for reasons other than falconry, and because legislation is framed in that context, this review will include the wider aspects of 'hawk-keeping'.

2. The people who keep birds of prey

- 2.1. Falconry has been a legal activity in UK since pre-history, certainly for 1500 years. Falconers were the first people to create bird protection legislation.
- 2.2. Falconry is one of the earliest examples of planned sustainable use. The Anglo-Saxon Colloquy of Ælfric includes a dialogue in which a master asks a fowler how he feeds his hawks, to which the latter replies: "They feed themselves and me in the winter, and in spring I let them fly off to the wood, [to breed] and I catch the young hawks in autumn and tame them." (*Quoted in Oggins, 2004*).
- 2.3. The first laws protecting birds of prey were initiated by falconers to safeguard a renewable resource. In the 11th Century the Normans made hawks the property of the Monarch, but Henry III made it legal for freemen to own nests on their own land. Henry VII gave full protection to hawks, their eggs and nests: "None shall take out of the Nest

any Eggs of Falcon, Goshawk, Lanner, or Swan, in pain of a year and a days imprisonment, and to incur a fine at the Kings pleasure, to be divided between the King and the Owner of the ground where the Eggs shall be so taken. None shall . . . take, kill, or bear away any of the said Hawks from their Coverts where they use to breed, in pain of ten pounds.” (Ray, 1676).

- 2.4. In 2006, based on data from Defra, the Independent Bird Register, and consumption of hawk food supplied by commercial animal feed suppliers, the authors estimate that there are around 25,000 people keeping diurnal or nocturnal birds of prey in UK.
- 2.5. There are about 3000-5000 falconers who hunt with birds of prey (*Hawk Board data*).
- 2.6. There are about 1500-2000 people who breed birds of prey (*Independent Bird Register data*).
- 2.7. Provided that the raptors themselves are properly certificated, there is no further requirement for a falconer or keeper to be licensed in UK.
- 2.8. There is no mandatory falconry test or examination.
- 2.9. There is a voluntary National Award in Bird of Prey Management run by LANTRA and initiated by the Hawk Board (*www.lantra-awards.co.uk Tel: 02476 696996*). LANTRA is a land-based skills body accredited by the government: it is not a hunting organisation.
- 2.10. There are some 23 falconry or raptor-keeping clubs in UK, represented to the government by the Hawk Board. The 14 largest clubs have delegates on the Hawk Board.
- 2.11. About one in ten hawk-keepers are members of Falconry clubs; many of the others do not practice falconry but keep raptors for other reasons.
- 2.12. Provided that the bird is held legally, any species, type or number of bird of prey may be held and flown by any person. Basically, under the Vergy Arrest, the EU court has ruled that the Birds Directive 79/409 is not applicable to birds bred in captivity.
- 2.13. In 2005 there were approximately 35 centres providing training courses in bird of prey management.
- 2.14. We are still gathering data on educational providers, but our current best data are shown below:

	Approximate No. of providers	Average No. of days provided	Average No. of visitors	Total Visitor/days
School visits	1690	36.75	200	12,421,500
Hawking experience days	5875	21.9	3	385,987
Flying displays	5963	37.8	200	45,080,280
Corporate hospitality days	5317	22.8	40	4,849,104

School visits are of people visiting schools, usually with one or more live raptors, to give talks on raptor biology, conservation and falconry. Hawking experience days involve visitors coming out hawking and having a chance to handle the birds. Usually the quarry is rabbits flown with Harris Hawks. Flying displays are either held at 'falconry centres', usually throughout the summer months, or at 1-4 day country fairs and events. Corporate hospitality days entail giving people some experience of trained raptors flying to the fist or lure and are often in conjunction with other activities such as clay pigeon shooting, archery etc.

- 2.15. Most hawk-keepers at some time or another re-habilitate injured or orphaned raptors brought to them by the public. Some centres specialise in re-habilitation. We do not have precise data but probably 2000 – 3000 raptors, including owls, are treated per year.
- 2.16. In 2005 there were approximately 21 pest control businesses using birds of prey at landfill sites, airfields and urban sites. The Houses of Parliament are protected by trained raptors, as is the Cardiff Millennium Stadium. One company alone turns over £2 million (*€3 million*) per year.
- 2.17. Bird of prey keeping in UK provides jobs for Centres, Zoos, pest controllers, breeders, equipment makers, food suppliers. We do not have exact figures to hand but estimate that 3000 full time equivalent jobs are dependent on it. We have almost 300 UK-based raptor-related businesses on our database.

3. The Birds of Prey

- 3.1. There are probably about 70,000 raptors in captivity in UK; the Independent Bird Register (*IBR*) alone has 28,355 current registered on its database, the Honeybrook Register has 784 current registered. From food supplies alone, Honeybrook estimates 37,000 raptors and from breeders' data, IBR estimate up to 100,000.
- 3.2. Birds of prey have been increasingly bred in captivity since the 1970s. In 2005 about 2320 individuals of Schedule 4 species (*Appendix 5*) and probably 12,000 – 15,000 raptors of non-registerable species were bred (*IBR data*).
- 3.3. The numbers bred per year are expanding at the rate of 11% per annum (*DEFRA Schedule 4 data*).
- 3.4. In real terms, the prices of most captive-bred raptors have fallen year on year since about 1995.
- 3.5. In 2005 the total value of domestic production was approximately £8.5 – 10 million (*€12.75 – €15million*).
- 3.6. UK is a net producer of birds of prey, exporting outside Europe. In 2005, 11 goshawks, 2 redtails, 57 Harris Hawks, 9 sakers, 211 gyr/sakers, 1 barbury, 13 peregrine/sakers, 13 peregrines, 2 peregrine/prairies, 244 gyr/peregrines, 18 gyrfalcons, 21 gyr/barbaries,

9 gyr/merlins, 10 gyr/prairies, 7 gyr/shaheens (*total 628 diurnal raptors*) and 71 owls were exported outside Europe to a value of about £1.6 million (*€2.4 million*).

- 3.7. To import a bird of prey from an EU country, no CITES permit is required; all 25 countries share one common CITES zone.
- 3.8. To import a bird of prey into the EU from outside requires a CITES permit.
- 3.9. As at October 2006, CITES permits cost £10 (*€15*) per permit per species per consignment. This could rise to £100 (*€150*) under current reviews
- 3.10. There are two CITES registered breeders for birds of prey in UK but the UK government does not implement the CITES breeders' register system and CITES countries interpret the regulations differently.
- 3.11. All applications for export have to be reviewed by the government scientific authority.
- 3.12. Importing and in some cases, exporting a bird of prey requires quarantining in licensed quarantine facilities. There are several privately-owned licensed quarantines for raptors in UK although this is in a state of flux because of the current Avian Flu problem.
- 3.13. Some species, such as the Peregrine (*Falco peregrinus*), no longer fulfil the biological criteria for their current CITES listings; the UK population approached capacity about ten years ago.
- 3.14. Within the EU any commercial use (*Sale, exhibition etc*) of an Annex A bird of prey requires an Article 10 certificate. The certificate for a captive bred bird lasts for the life of the specimen (*specimen specific certificate*) but if it were to die and be exhibited as a taxidermy specimen then it would be treated as a different specimen and a new certificate would be required. Currently no charge is made for such certificates however the UK is planning to make a charge which could be £100 (*€150*). This charge is currently the centre of a debate between the CITES authority (*DEFRA*) and HM Treasury; the latter wishing to make total cost recovery, a minimum of three times the proposed charge.
- 3.15. To sell or exhibit a dead bird of prey or its derivatives requires a different Article 10 Certificate.
- 3.16. In order to get an Art 10 certificate the bird must be permanently marked in accordance with Article 66 of EU Regulation 865/2006.
- 3.17. Certain raptor species on 'Schedule 4' of the Wildlife and Countryside Act require to be registered with the UK government (*DEFRA*).
- 3.18. Schedule 4 of the Wildlife and Countryside Act 1981 and the attendant registration process is under review, and certain aspects are also subject to devolved government in Wales and Scotland. This registration review has already lasted 7 years.

- 3.19. Currently, registration costs £20 (€30) per bird.
- 3.20. Registered specimens are recorded on a central database held by DEFRA in Bristol.
- 3.21. In 2003 falconers hosted a meeting of CITES Management Authorities at ERWDA in UAE and demonstrated that the data submissions to the CITES Secretariat are both inaccurate and unreliable. This is because of varied reporting criteria and late and incomplete submissions from the Management Authorities.
- 3.22. There is no central database for EU and there is never likely to be because the turnover of birds and data is too fast and too big for administration to handle, not to mention the language difficulties.
- 3.23. Although birds of prey may be taken under licence from the wild for the purpose of falconry, no such licence has been issued since 1987. The Hawk Board policy on wild raptors is shown in Appendix 4.
- 3.24. We understand in Scotland some licences have been issued in 2005/6 for catching nuisance Sparrowhawks (*Accipiter nisus*) and for obtaining Peregrines for breeding in Germany.
- 3.25. For most species of raptors breeding is in balance with the market; for some species such as Harris Hawks there is an over-supply and for some groups, such as hybrid falcons, surplus birds may be euthanized to prevent them being maltreated or lost into the wild.
- 3.26. In 2003 DEFRA spent £1,052,805 (€1.58 million) on CITES licensing and registering birds of prey. Users incurred similar costs, making a total cost of around £2.1 million (€3.15 million) per year.
- 3.27. DEFRA is the largest single commercial ‘beneficiary’ of birds of prey, employing several full-time staff whose jobs depend solely on raptor registration and documentation.
- 3.28. Despite this expenditure and effort, the CITES monitoring of legitimate wildlife trade remains woefully inadequate due to inconsistent and erratic processing and reporting of data. We have made complaints to DEFRA, to the CITES Secretariat and to several Management Authorities. All acknowledge the inadequacy, but there is no sign of improvement.
- 3.29. The 2000-2006 average annual number of raptors reported lost to the Independent Bird Register is 250. Of these, 64 are natives, 130 are non-natives and 57 are hybrids. Many are quickly recovered and many do not survive. None have been found cross-breeding in the wild in Britain.
- 3.30. Reviews by the Royal Society for the Protection of Animals (*Cromie and Nicholls 1995*) revealed no welfare issues of significant concern. Falconry is controlled by voluntary Guidelines produced by the Hawk Board for keeping birds of prey and for displaying (*Appendix 2*) in compliance with the requirements of the Animal Welfare Act.

- 3.31. In UK, captive-bred raptors are privately owned. That is to say, they come under private property law; they are not protected by wild bird legislation and may be killed with the permission of the owner.
- 3.32. Eggs and eggshells from indigenous captive-bred raptors may not be sold, but those from non-indigenous raptors may be sold.
- 3.33. We have not yet collated the data, but we estimate that about 50 captive bred raptors are either electrocuted or shot each year. It may be considerably more. Captive-bred birds are not protected by legislation that covers wild birds.
- 3.34. As well as falconry, raptors are kept in captivity for captive breeding, rehabilitation, conservation breeding, education, research and pest control.

4. Huntable species for falconry

- 4.1. Falconry is an extension of a natural activity in that both raptor and prey are completely free and use their natural attack and escape behaviours which have evolved with their morphology over millions of years.
- 4.2. Falconry is naturally a self-limiting, low impact activity in that a raptor can make only a few hunts per day and only a small percentage of these will be successful. Once it has caught and eaten its prey, the hawk becomes unresponsive, hence the expression ‘fed up’.
- 4.3. Falconry is a selective form of predation; raptors quickly detect sick and injured prey and hunt them preferentially.
- 4.4. Falconry employs raptors mainly of the families Falconidae and Accipitridae. These raptors hunt live prey and they eat only fresh meat. Their sizes, morphology and hunting behaviour dictate the range of species and the types of habitat that they can use for hunting. For example, some such as the Sparrowhawk, are adapted for hunting small birds in wooded areas, whereas others, such as Eagles, are better suited for medium-sized mammals in open terrain. There are thus natural constraints on the lists of prey for each raptor species, and their harvests are very much density-dependent and self-limiting.
- 4.5. Falconry is non-polluting, not noisy and not dangerous to humans. Therefore it is often the pest control method of choice in urban environments.
- 4.6. Falconry has such a low percentage kill rate that often it is used as a non-lethal method of pest control especially at airfields and urban sites, (*under WCA Section 11*).
- 4.7. Falconry in UK now relies almost totally on domestically-produced raptors rather than wild-sourced ones.
- 4.8. Falconry is becoming more popular because of the increasing need of humans to connect with nature and to use the countryside for recreational uses as well as agriculture.

Current legislation

- 4.9. Since the development of gunpowder and especially of the breech-loading gun, it has become possible to kill much larger quantities of animals more quickly and more easily. In order to control excessive shooting a raft of legislation was enacted during the period 1828-1906. This legislation was not aimed at falconry; during this period falconry was at a low ebb and several of our raptor species became locally extinct due to over-zealous game-keeping.
- 4.10. Current legislation on huntable species is a complex maze of laws which are patch-ups and add-ons and which do not currently comply with the principles of sustainable use, primarily because they were not designed to do so. In the last 30 years or so the pendulum has swung the other way due to growth of a protection industry, so that many species are over-protected to an extent that hinders legal wildlife management.
- 4.11. Unlike shooting on the one hand, or protectionism on the other, falconers follow the principles of sustainable use and we are calling for a revision of the legislation to provide a clear list of huntable species for falconry in its own right.
- 4.12. **Current legislation affecting falconry includes:**

Night Poaching Act 1828
The Game Act 1831
Night Poaching Act 1844
Hares Act 1848
Game Licences Act 1860
Game Laws (*Amendment*) Act 1860
Poaching Prevention Act 1862
Game Act 1870
The Ground Game Act 1880,
Ground Game Act 1906
The Protection of Animals Act 1911,
Protection of Animals Act (*1911*) amendment Act 1912
Performing Animals (*Regulation*) Act 1925
Protection of Animals Act (amendment) Act 1927
Protection of Animals Act 1934
Prevention of Damage by Pests Act 1949
Pet Animals Act 1951
Protection of Animals (*amendment*) Act 1954
Abandonment of Animals Act 1960
Wildlife and Countryside Act 1981
Wildlife and Countryside (*Amendment*) Act 1985
Wildlife and Countryside (*Service of Notices*) Act 1985
Protection of Animals (*amendment*) Act 1988

Wildlife and Countryside (*Amendment*) Act 1991
 Conservation (*Natural Habitats, &c.*) Regulations 1994 which implements the EC Directive 92/43/EEC
 The Spring Traps Approval Order 1995,
 Wild Mammals (*Protection*) Act 1996
 Hunting with Dogs Act 2005.
 SI 1988 No. 288 - amended Schedule 5 and 8
 SI 1989 No. 906 - amended Schedule 5
 SI 1991 No. 367 - amended Schedule 5
 SI 1992 No. 320 - amended Schedule 9
 SI 1992 No. 2350 - amended Schedule 5 and 8
 SI 1992 No. 2674 - amended Schedule 9
 SI 1992 No. 3010 - amended Schedule 2 and 3
 SI 1998 No. 878 - amended schedules 5 and 8
 WLF 5 - Application for a licence to kill birds in the course of falconry
 WLF 6 - Annual return - as required by the licence to kill birds in the course of falconry
 WLF100085 - Licence to kill or take certain birds to preserve air safety
 WLF100087 - Licence to kill or take certain birds to conserve wild birds
 WLF100088 - Licence to kill or take certain birds to preserve public health or safety.

This list is by no means exhaustive, nor have we been able to obtain copies of many of these pieces of legislation. Obviously, for the ‘man in the street’ there is little hope of deciphering what species are huntable and the conditions that apply. This is exacerbated now by the divergence of Scotland and Wales and the increased ‘shooter’ tourism to the UK.

Hunting seasons

- 4.13.** Closed hunting seasons for shooting game species are imposed primarily to enable maximum breeding, and animals are hunted in the autumn and winter. Most of the set dates are traditional rather than biological. Some, such as the grouse and the partridge seasons, are totally contradictory and are rooted in the Edwardian habit of taking the train north to shoot grouse during the parliamentary summer recess. Some, such as being allowed to shoot pests on Sundays, but not game, are rooted in religion, in concepts of work versus recreation, and in class distinctions.
- 4.14.** For falconry, because raptors are not machines like guns, there are additional factors to consider. Raptors are living organisms and have to develop their physical and mental skills in order to learn to hunt. Although the urge to hunt is instinctive (*Fox 1997*) there is a large learning and developmental element in order for the raptor to develop sufficient hunting skills to survive. This is closely calibrated with the summer flush of naïve young prey. If the young raptor misses this window it will be trying its skills against prey which are already developmentally much more advanced, rather like a 10 year old trying to manage in a degree class. Thus seasons for falconry must start early enough to include young prey. Adult prey normally has sufficient survival skills to escape.

Recreational Use of Wildlife

4.15. The concept of recreational use of wildlife is enshrined in British and European Law. Some species of wildlife are legally (*if not biologically*) defined as 'Game' to be hunted for sport and human food. We even now have the situation in the new Hunting Act where it is legal to use a terrier on foxes to protect game birds but not to protect domestic farm stock! Some species, such as rabbits and pigeons, are hunted for multiple purposes such as sport, pest control and food (*Fox and Macdonald 1995, Third Edition 2006*). There has been a failure by Defra to understand that many of the species on the Pest List, although not classed as 'Game', are nevertheless hunted recreationally, often in far larger numbers than Game itself. Recently the Starling and House Sparrow were removed from the Pest List (*administered by the General Licences*) in complete disregard that they are hunted recreationally by falconers, and without any consultation of the user-group.

Bye-catches

4.16. Commercial fishing is very indiscriminate and often destroys large bye-catches of non-target species. Shooting kills large numbers of 'pest' animals in order to maximise the harvest of 'game' animals. But raptors are only able to catch their own adapted prey species and only one animal at a time. In falconry the bye-catch is low whereas in free-range cat-keeping, although some warehouse and farm cats kill good ratios of target to non-target prey, all the prey of pet cats are non-target animals, the bye-catch of an activity which is often not seen as a hunting activity even though it is by far the largest user-group (*Fox and Macdonald 1995*).

Control of animals

4.17. The training of a raptor is largely aimed at training it to come back and in developing its flying skills. Once a raptor is flying free it is in law '*Fera naturae*', that is to say it is deemed uncontrollable because it will hunt according to its own wild nature.

Ferae naturae, Latin for "nature [wild] animals," is a legal term that means any animals that are not designated domesticated animals by law. In property law, *ferae naturae* residing on real property are not usually considered part of the property unless the animals have been tamed or captured.

Domestic cats kill approximately 300 million birds and mammals each year (*Mammal Society Report*). About 70 million of these are protected animals. According to DETR (*as Defra was then*) legal advisors, in response to our enquiry, the reason that cats are allowed to catch these prey, in apparent contravention of the EC Birds Directive 1979, Article 8(1), is because the cat's legal status (*despite it being domesticated!*) is *fera naturae*.

Article 8(1): In respect of the hunting, capture or killing of birds under this Directive, Member States shall prohibit the use of all means, arrangements or methods used for the large-scale or non-selective capture or killing of birds or capable of causing the local disappearance of a species, in particular the use of those listed under Annex IV(a).

- 4.18.** Falconers endeavour to ensure that their raptors come back, and they use technical aids such as bells and telemetry. This means that releasing a raptor is not a ‘release’ or ‘introduction’ to the wild (*as in Section 14(1) of the Wildlife and Countryside Act 1981*), nor an ‘abandonment’ of an animal (*as in The Abandonment of Animals Act 1960*). If the raptor or cat damages private property through the negligence of its owner, there may be a case for compensation. But hunting and eating wild prey is part of the natural behaviour of raptors and cats and no person has the ability or responsibility to prevent these predators from catching food while they are free.
- 4.18.** In the past, Defra has advised falconers that they are in the same position as cat-owners and therefore do not need licences if their raptors catch protected wildlife. However, because falconers have traditionally been more responsible than cat-owners and supervise their animals more closely, and because one of the reasons for flying raptors free is to see them hunt their prey, falconers have negotiated special licences for some species and follow the same laws as shooters for other species. This has worked reasonably well and has not been a significant issue in the past.
- 4.19.** But now we are seeing increasing over-legislation on prey species and there is an increasing temptation for falconers to give up attempting to follow the legislation for shooters and follow the example of cat-owners instead. For example, many of the main huntable species for falconry used to be classed as vermin and were on the Pest List of species that could be killed by authorised persons at any time. With the advent of the EU Birds Directive, the Pest List became a Schedule of the Wildlife and Countryside Act (1981). Suddenly these species could only be hunted under General Licences allowing certain Methods (*including falconry*) to be used only for certain Purposes. The situations in which these Licences are issued have become more and more restricted, unlike the Game Licence, so that now one can kill a Black Grouse (*which is game*) but not a Starling (*which is fully protected*).
- 4.20.** We now have a complex set of protection laws which bear almost no relationship to species abundance. This has reached a point where some falconers are giving up attempting to follow the legislation for shooting because it is not practicable in real life. Legislators have made no contingency for the *fera naturae* of raptors. Whereas it is feasible to expect humans to understand and adhere to a complex system of legislation it is clearly ridiculous to expect an animal to do so. For example the recent Hunting Act allows a dog to hunt a rabbit but not a hare, but nobody is able to train a dog to make such a differentiation! Although raptors can to some extent become ‘wedded’ to certain groups of prey species, such as ‘fur’ or ‘feather’, most raptors in nature have varied diets of 20-30 different species, and this relates mainly to species abundance.

A Huntable Species List for Falconry

- 4.21. At the moment, falconers hunt species under the same legislation as shooters in respect of game birds, pest birds under various general licences, and mammals under motley bits and pieces of law. In addition, falconry has specific provision for Individual Quarry Licences to hunt certain species such as Blackbirds, Song Thrushes, Skylarks and Pipits.
- 4.22. Attached below is the proposed Huntable Species List for Falconry.

We would like to do the following:

1. Evaluate the status of each species and, regardless of its seasonal numbers (*resident or migratory*), and of whether or not it is perceived to be in decline, stable or increasing, reach a decision on whether or not a harvest by falconers would be a sustainable use or would have any significant effect. This decision must be seen to be biologically supportable and non-discriminatory, unlike some of the advice recently given to Defra. We are prepared to enter into a science-based discussion on each species.
2. For some species which are in serious (*but one hopes, temporary*) decline, such as the Blackcock, the harvestable falconry quota would be set at zero until the situation has improved. This retains an incentive for conservation measures.
3. For species that are hunted for recreation (*marked R*) there would be a close season of 1 February to 31 July. For the period 1 August until the start of the shooting season, a let-lie clause would apply. That is to say, it is legal to use a raptor to hunt the species but the body of the prey may only be eaten by the raptor and must be left lying where caught.
4. For species hunted both for recreation and because they are pests (*marked P*), there would be no close season. There would be no requirement to demonstrate that an individual animal was a pest in any particular circumstance; this would be based entirely on the species designation.
5. In no instances would falconry be more restricted than shooting in respect of quarry.

Control

- 4.23. Licensing could either be through new legislation (*eg a new Schedule in a revised WCA Act*), or as a new General Licence for Falconry (*which we have requested for some time now*). For certain sensitive species, Individual Falconry Quarry Licences could be continued. There should be harmony in law between birds and mammals.
- 4.24. Currently, all the species below may be hawked under one or another piece of legislation apart from Bullfinch, Chaffinch, Redwing and Fieldfare.

HUNTABLE SPECIES LIST FOR FALCONRY

Common name	Scientific name	P = hunted as pest R = hunted for recreation
Red fox	<i>Vulpes vulpes</i>	P R
Brown Hare	<i>Lepus europaeus</i>	P R
Blue Hare	<i>Lepus timidus</i>	P R
Rabbit	<i>Oryctolagus cuniculus</i>	P R
Feral cat	<i>Felis catus</i>	P R
Grey squirrel	<i>Sciurus vulgaris</i>	P R
Brown rat	<i>Rattus norvegicus</i>	P R
Black rat	<i>Rattus rattus</i>	P R
Stoat	<i>Mustela erminea</i>	P R
Weasel	<i>Mustela nivalis</i>	P R
Mink	<i>Mustela vison</i>	P R
Field Mouse	<i>Apodemus sylvaticus</i>	P R
House Mouse	<i>Mus musculus</i>	P R
Field Vole	<i>Microtus agrestis</i>	P R
Mole	<i>Talpa europea</i>	P R
Pheasant	<i>Phasianus colchicus</i>	R
Grey Partridge	<i>Perdix perdix</i>	R
Red-legged partridge	<i>Alectoris rufa</i>	R
Red Grouse	<i>Lagopus lagopus</i>	R
Ptarmigan	<i>Lagopus mutus</i>	R
Black Grouse	<i>Lyrurus tetrix</i>	R
Capercaillie	<i>Tetrao urogallus</i>	R
Common Snipe	<i>Gallinago gallinago</i>	R
Jack Snipe	<i>Lymnocyptes minimus</i>	R
Woodcock	<i>Scolopax rusticola</i>	R
Golden Plover	<i>Pluvialis apricarius</i>	R
Common Teal	<i>Anas crecca</i>	R
Mallard	<i>Anas platyrhynchos</i>	R
Tufted duck	<i>Aythya fuligula</i>	R
Gadwall	<i>Anas strepera</i>	R
Goldeneye	<i>Bucephala clangula</i>	R
Pintail	<i>Anas acuta</i>	R

Pochard	<i>Aythya ferina</i>	R
Shoveler	<i>Anas clypeata</i>	R
Wigeon	<i>Anas penelope</i>	R
Ruddy Duck	<i>Oxyura jamaicensis</i>	P R
Canada goose	<i>Branta canadensis</i>	P R
Greylag goose	<i>Anser anser</i>	R
Pink-footed goose	<i>Anser brachyrhynchus</i>	R
White-fronted goose	<i>Anser albifrons</i>	R
Coot	<i>Fulica atra</i>	P R
Moorhen	<i>Gallinula chloropus</i>	P R
Cormorant	<i>Phalacrocorax carbo</i>	P R
Carrion crow	<i>Corvus corone</i>	P R
Collared dove	<i>Streptopelia decaocto</i>	P R
Great black-backed gull	<i>Larus marinus</i>	P R
Lesser black-backed gull	<i>Larus fuscus</i>	P R
Herring gull	<i>Larus argentatus</i>	P R
Black-headed gull	<i>Larus ridibundus</i>	P R
Jackdaw	<i>Corvus monedula</i>	P R
Jay	<i>Garrulus glandarius</i>	P R
Magpie	<i>Pica pica</i>	P R
Feral pigeon	<i>Columba livia</i>	P R
Rook	<i>Corvus frugilegus</i>	P R
House sparrow	<i>Passer domesticus</i>	P R
Starling	<i>Sturnus vulgaris</i>	P R
Woodpigeon	<i>Columba palumbus</i>	P R
Blackbird	<i>Turdus merula</i>	P R
Song thrush	<i>Turdus philomelos</i>	R
Bullfinch	<i>Pyrrhula pyrrhula</i>	P R
Chaffinch	<i>Fringilla coelebs</i>	R
Ring-necked parakeet	<i>Psittacula krameri</i>	P R
Meadow pipit	<i>Anthus pratensis</i>	R
Skylark	<i>Alauda arvensis</i>	R
Redwing	<i>Turdus iliacus</i>	R
Fieldfare	<i>Turdus pilaris</i>	R

5. Hawking Land

- 5.1. There is very little state land in UK and most hawking is done on private land. There is a loose group of species known as ‘Game’ that can be hunted by persons in possession of the ‘Game Rights’, often called ‘Shooting Rights’ nowadays. These Game Rights may be held by the land-owner, or he may have sold or rented them out to someone else, or to a syndicate. These rights may or may not include rights to deer. To kill game, a ‘Game Licence’ is also required by purchase at a Post Office.
- 5.2. ‘Ground game’, mainly hares and rabbits, are considered as part game for food and part pest. Tenant farmers and persons authorised by them may also hunt ground game. In addition are some pest species, such as crows and pigeons, which can be hunted by any authorised persons. Thus hawking is controlled not only by species legislation but also by legislation concerning land rights and access agreements. Ground game and pest species may be hunted by authorised persons even though they are not the holders of the Game Rights. Thus on one farm or estate, there may be a syndicate of people renting the shooting rights for pheasants, the farmer might shoot the rabbits as pests, another person, such as a gamekeeper, might shoot the wood pigeons and trap ground predators such as mustelids, a falconer might hawk the rabbits as pests and, until recently, local Hunts might hunt the foxes or hares.
- 5.3. Although there are extensive areas of ‘commons’ in parts of UK, these rights concern grazing and firewood while the hunting rights may be retained by the land-owner. Thus hunting rights, especially for game, are an asset with monetary value. Exclusivity of rights enables prey populations to be managed on a sustainable basis in UK, and we do not suffer from the ‘law of the commons’ as seen in sea fisheries and certain other countries where common hunting rights prevent resource management. As a result, UK has one of the highest densities of huntable species in the world, and one of the lowest densities of large predators.

6. The conservation of wild raptors in the UK

- 6.1 Falconers have **never** caused even the local extinction of a raptor population in any country at any time.
- 6.2 Prior to the introduction of sport shooting, when falconry was popular, wild raptor populations flourished, protected by falconry laws.
- 6.3 There have been two major extinction periods for UK raptors. The first was in 1800-1900 when shooting interests, particularly battue shooting, decreed that many predators were ‘vermin’ and in the nineteenth century several species including the Sea-eagle (*Haliaeetus albicilla*), Goshawk (*Accipiter gentiles*), Marsh Harrier (*Circus aeruginosus*) and Osprey (*Pandion pandion*), were eradicated. Others, such as the Peregrine (*Falco peregrinus*), Hen Harrier (*Circus cyaneus*), Common Buzzard (*Buteo buteo*) and Red Kite (*Milvus milvus*), were reduced both in numbers and distribution.

- 6.4** In the early 20th century some raptor species made a partial recovery.
- 6.5** The second period was 1960-1975 when pesticides decimated the peregrine, merlin and sparrowhawk. Owing to commercial interests, the UK government failed to actually ban these chemicals until 1982; long after the damage was done. No prosecutions were made against the users, no compensation was given and no funds were obtained from the chemical companies to fund restoration programmes.
- 6.6** In response to the widespread decline in some species, falconers started to breed them in captivity, they also undertook labour-intensive rehabilitation programmes.
- 6.7** British falconers were instrumental in re-introducing the Goshawk (*Accipiter gentilis*) to UK by importing and releasing birds in the early 1970s.
- 6.8** By 1990, 400 breeders were releasing 1500-2000 Barn Owls (*Tyto alba*) per year to augment the failing wild population. This effort became so widespread that eventually, in 1993, the Barn Owl was put on Schedule 9 of the Wildlife and Countryside Act to control the releases through a licensing system. (Andrews Ward 1995)
- 6.9** In 1987-2001, falconers at International Wildlife Consultants UK hatched and reared 55 Red Kites (*Milvus milvus*) as part of the Kite Restoration Programme. Kites are now flourishing in Wales, England and Scotland and by 2001 tourism from kites was worth £3 million (£4.5 million) and 114 full-time job equivalents (Raymont and Dickie 2001).
- 6.10** Falconers have participated in various raptor conservation projects and surveys, including Peregrines (*F. peregrinus*), Golden Eagles (*Aquila chrysaetos*), White-tailed Sea-Eagles (*Haliaeetus albicilla*), Merlins (*F.columbarius*), Sparrowhawks (*Accipiter nisus*) and Hen Harriers (*Circus cyaneus*).
- 6.11** In the last 10-15 years most UK raptors have now recovered to their pre-pesticide numbers, some even more so. Most are at capacity for the available habitat.
- 6.12** Given the very poor state of the rural economy, bird of prey keeping and falconry have provided an opportunity for farm diversification and for increasing public access to the countryside.
- 6.13** Specialists from UK have played major roles in conservation efforts in other countries, for example on Mauritius Kestrels (*Falco punctatus*), New Zealand Falcons (*F. novaeseelandiae*) and recently on Vultures in the Indian Sub-Continent.
- 6.14** A survey in 2002 for the EU project Reconciling Game-bird Hunting and Biodiversity (REGHAB) found that live-trapping and killing of raptors was a subject of derogation in 2002 in Austria and the Czech Republic. Live-trapping and release was permitted in Denmark, Estonia, Germany, Hungary, Lithuania and Sweden. No responses were obtained from France, Greece, Italy, Malta and Portugal. Currently, in Denmark licences to take wild Goshawks are for relocation rather than killing. In Germany the Goshawks are used for falconry in preference to killing them.

- 6.15 Current mortality factors are probably injury, starvation, disease, road traffic and shooting. Currently up to 2,100 Peregrines die per year from these factors in UK.
- 6.16 Illegal take for falconry is no longer considered a significant factor, either by the government or NGOs such as RSPB. As far as we can ascertain there were no prosecutions involving falconers taking birds illegally from the wild in 2004 or 2005. Most prosecutions are for illegal shooting or poisoning of raptors.
- 6.17 Far from being a drain on wild Peregrines, falconers actually lose about 25 Peregrines per year to the wild. If any of these were to survive, there would be a net gain to the wild population.
- 6.18 Falconers have part-funded government research into DNA forensic techniques and supplied family group DNA samples for testing.
- 6.19 There is pressure on the government from shooting interests and from pigeon enthusiasts to provide licences to cull or remove wild nuisance raptors.
- 6.20 The demand for wild falcons for the Arab market has dwindled, especially since 2001. About 90-95% of the falcons in the Gulf are now captive-bred and the importing of wild falcons has been reduced or banned entirely. In particular there is almost no demand for Peregrines. There has never been a demand for Lanners. Falconers have spear-headed the conservation work on Sakers in Asia and part-funded various CITES conferences and meetings (www.savethesaker.com). We also called for and got a CITES Significant Trade Review for the Saker Range countries.

7. Invasive alien species

- 7.1. The use of alien or non-native plant and animal species is common throughout the world and indeed our entire civilisation depends on them. Many of them are beneficial or neutral in their effect. Where would we be without wheat, potatoes, pine trees, sheep or cattle? Nor is the 'Garden of Eden' concept a tenable one in a modern world; with global warming taking place faster than species can evolve, many argue that genetic diversity is a priority rather than the reverse (*Tompkins et al. 2006*). The USA for example, already hosts more than 2,000 species of imported plants, 2,000 species of insects and spiders, more than 140 land mammals, 70 species of fish, 90 terrestrial slugs and snails, and more than 200 microscopic plant pathogens. 29% of New England's plant species are introduced. In addition, many state wildlife agencies have for many years adopted an aggressive policy of releasing exotic game and fish species for sporting purposes (*Drake et al. 1989*). We do not therefore consider the subject of 'alien species' to be an issue in itself. For a wider discussion of this see McNeely (*2001*).
- 7.2. Falconry itself does not constitute a 'release' within the meaning of the Wildlife and Countryside Act 1981, or under the Convention on the Conservation of European Wildlife and Natural Habitats (*the 'Bern Convention'*) because the intention is not to release the animal but to get it back.

- 7.3. The issues of concern are: is a species invasive, and is it detrimental in some way?
- 7.4. In UK we have a number of invasive plants, such as Japanese Knotweed (*Fallopia japonica*). We also have a number of invasive vertebrates such as the Grey Squirrel (*Sciurus vulgaris*), the American Mink (*Mustela vison*) and the Domestic Cat (*Felis catus*), to name a few well-known examples. The schedule for invasive species is currently under review.
- 7.5. Amongst the raptors we have two potentially invasive species: the Little Owl (*Athene noctua*) which is long-established and the Eagle Owl (*Bubo bubo*) which has a few pairs breeding and is an extinct British species (Turk 2004).
- 7.6. Most falconry species are known to be non-invasive. For example the Saker falcon (*Falco cherrug*), Gyrfalcon (*F. rusticolus*), Lanner falcon (*F. biarmicus*), and Harris Hawk (*Parabuteo unicinctus*) have been flown in falconry in UK in huge numbers, some for over a thousand years. Of 771 international introductions recorded by Ebenhard 1988, none were of genera used in falconry (see also Long, 1981).
- 7.7. The only diurnal raptor used in UK which might be a cause for concern is the Red-tailed Hawk, (*Buteo jamaicensis*), which is capable of interbreeding with the Common Buzzard (*B. buteo*). However, despite an average of 12 Red-tails lost each year, no viable offspring have been known to occur and the Red-tail is falling out of use in favour of the Harris Hawk.
- 7.8. Falconers have been involved in the rearing, release and re-introduction of several native species, including the Goshawk, Red Kite and Peregrine. From these projects it is clear that the establishment of populations even of these native species is a difficult undertaking and that these species are not invasive even though they are indigenous and presumably pre-adapted.
- 7.9. About 187 exotic or hybrid raptors are lost in UK every year. Apart from Eagle Owls, none have ever been known to breed successfully in the wild. At the same time, most wild UK raptor populations have increased and there is no evidence that captive bred birds have any impact through competition or otherwise, with wild raptors. (See IUCN Guidelines for the prevention of biodiversity loss caused by alien invasive species.)
- 7.10. With one notable exception – the Goshawk – the vast majority of falconers’ birds do not survive long in the wild. Most fail to survive the sudden transition from pampered captivity to self-sufficiency in the wild and die within days. Where an abundant wild population exists, the released bird has a very slim chance of competing with residents and obtaining a breeding territory. Despite all the pure Peregrines lost in UK falconry, very, very few have managed to breed in the wild. Only in under-capacity situations, such as Scandinavia, is there a real chance for captive birds to breed in the wild. In such situations in Norway a wild Peregrine has even attempted to breed with a wild Gyrfalcon (Gjershaug et al. 1998).
- 7.11. Most of the hybrids attempting to breed in the wild in Europe have come from German hacking programmes, a form of ‘soft’ release.

8. Hybrids

- 8.1. This issue has already been examined in great depth by Fox and Sherrod (2004) and will therefore only be briefly summarised here.
- 8.2. Hybrids were originally bred in response to criticism that captive-bred Peregrines were actually being laundered from the wild. Prior to DNA testing, the only way to show that a falcon was genuinely bred in captivity was to cross it with another species.
- 8.3. Having bred such birds, trials showed that some had qualities which made them better suited for controlled falconry situations in a man-made environment than the wild cultivars. A similar process occurred with almost all species of plants and vertebrates bred in captivity.
- 8.4. Despite some extensive DNA studies, the taxonomy of the genus *Falco* remains undecided. The two groups of large falcons – Rhyncodon and Hierofalco - are both probably super-species rather than sub-genera, and the entire genus is probably capable of inter-breeding in captivity. Our knowledge nowadays of natural hybridisation in the wild has caused a revision of the old-fashioned species concept (McCarthy 2006); for example between the Greater Spotted (*Aquila clanga*) and Lesser Spotted Eagles (*Aquila pomarina*) in the Baltic countries (Vali, 2004; Vali, Lohmus, 2001; Vali, Lohmus, 2004) and the Long-legged Buzzard (*Buteo rufinus*) and Upland Buzzard (*Buteo hemilasius*) in the Central-Asian countries (Pfander, Schmigalew, 2001) or the accipiters (Yousef et al. 2001).
- 8.5. Falconers in UK for the most part, voluntarily follow the codes of practice on hybrids laid down by the International Association of Falconry and the Hawk Board (Appendix 6). This is in line with Recommendation 3 in the Government response to the Review of Non-native species policy (DEFRA 2003). The Hawk Board has also instigated a targeted educational programme, operated by LANTRA, which is in line with Recommendation 4.
- 8.6. Despite the thousands of hybrids flown in UK over the years there are no records of one breeding in the wild. We do not therefore consider this to be an issue in UK.

9. Detrimental impact

- 9.1. Apart from the few examples cited above, neither alien nor hybrid raptors are invasive in UK, which makes the question of detrimental impact irrelevant.
- 9.2. However, there are many examples of organisms that are invasive aliens with a severe detrimental impact, and the question arises, are governments effectively tackling these issues? (See Shine et al. 2000).

- 9.3. A prominent example is the Domestic Cat (*Felis catus*) which has now inter-bred with our Scottish Wild Cat (*Felis sylvestris grampia*) to the point that some authorities now consider them to be one species, which raises further issues in providing legal protection for the wild cat and does nothing to address the issue of gene flow (*Balharry and Daniels 1998*). There are about 2 million feral cats in UK, and there are even organisations that release cats in contravention of Section 14 of the Wildlife and Countryside Act. Further, the 9 million or so cats in UK are killing about 65-88 million birds, 136-164 million mammals and about 12 million reptiles and amphibians annually (*Churcher and Lawton 1987, Woods et al. 2003*).
- 9.4. This impact is in contravention of Article 8(1) of the Birds Directive on ‘large-scale or unselective killing’.
- 9.5. The UK government, despite following a consultation exercise on invasive alien species, has yet to implement effective action. When it does so, falconers as a minority group will be concerned to ensure that its measures are proportionate and non-discriminatory, according to EU law. At the moment the listing and effective over-protection of the Peregrine in UK is based on politics rather than science while the non-protection of the Scottish Wildcat and the non-protection of the bye-catch animals of Domestic Cats are also based on politics rather than science. These political decisions are not just the result of politicians currying favour with voters; they are also the outcome of lobbying of some NGOs who benefit financially from these positions, and who have made formal claims to DEFRA which, on being challenged by the Hawk Board, they have been obliged to withdraw.
- 9.6. One should also bear in mind that some native species, such as Ragwort (*Senecio jacobaea*), can also be both invasive and detrimental, in this example even having its own Control Act.

10. Selective hunting methods

- 10.1. When measured against other hunting methods, such as shooting, fishing and the use of dogs, cats, ferrets, traps or poisons, and when assessed by criteria such as bye-catches, non-target animals (*such as pests controlled to enhance harvests of game species*), catch-to-kill intervals and wounding rates, falconry outperforms all other methods easily (*Fox and Macdonald 1997, Fox et al. 2005*).
- 10.2. It also easily performs within the (*ISO*) International Humane Trapping Standards, which we note have not been enacted by most EU governments and which are also of limited benefit because they apply only to fur-bearing species.
- 10.3. Even the UK government is far behind on this. The common break-back mouse-trap does not meet the EU protocol on ISO trapping standards.
- 10.4. DEFRA, in its Assessment of Humaneness of Fully Approved Vertebrate Control

Agents (DEFRA 1997), notes: 'As severe discomfort, which can last for several days, occurs in a large proportion of all the reported studies, anti-coagulant rodenticides must be regarded as markedly inhumane.' It goes on to licence them, despite the known effects of secondary poisoning on birds of prey such as Red Kites.

10.5. Falconry is a low-impact, sustainable, welfare-friendly hunting method. It requires a very high level of skill, commitment and understanding of natural systems.

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Appendix 1:

Hawk Board Principles

We support:

The basic Human Right to harvest wildlife resources provided that:

- 1. consistent standards of acceptable welfare are met, and**
- 2. for uses other than pest control, the harvest is sustainable.**

Notes:

Human Right is an acknowledgement that our evolution has depended on the use of wildlife resources. To harvest such resources is a fundamental part of our biological psyche as hunter-gatherers, and is part of our cultural tradition.

Basic means a fundamental right, not a general right. Laws are used to control the times, places and manner in which this basic right can be exercised, but not to remove the basic right.

Harvest means to kill, gather, collect, bring into captivity, translocate.

Wildlife resources means all life forms, including all vertebrates, invertebrates, and plants. It includes sea fisheries, and forestry.

Consistent means that standards of welfare should be applied evenly across the spectrum of similar species guided by current research into pain and consciousness, not by prejudice.

Standards means that welfare criteria should be identified as a means of assessing welfare on a quantifiable or on a comparative basis.

Acceptable means standards that are accepted by the majority as benchmarks when applied consistently across species.

Welfare means the actual experience of the organism and has no connection with the thoughts, emotions or intent of the person responsible for it.

For uses other than pest control means uses such as food, recreation or research. It includes the incidental harvesting of non-target organisms.

Pest control means depressing either the numbers or distribution of an unwanted species, before, during or after the damage has been caused, ideally to a level at which the damage becomes acceptable. It entails restricting a population or species, but not exterminating it.

Sustainable means that a similar harvest can be repeated indefinitely without reducing the source population. This implies that there is a 'harvestable surplus' which can be taken because it would die anyway due to natural limiting factors. Sustainable is used in its widest sense to include the habitat and resources on which the species depends, as well as any unintended impact on non-target organisms.

Appendix 2:

Code of welfare and husbandry of birds of prey and owls

COMMITMENT

A realisation of the time and costs involved in keeping, looking after, training or breeding birds of prey and owls is crucial; they cannot be a passing fancy. The time, facilities and funds available to the potential keeper should be carefully assessed before a bird is obtained. Research into how to house, keep, feed, handle and train a bird should be done prior to obtaining a bird. Housing, food and veterinary care should also all be organised prior to a bird arriving with a new keeper.

INFORMATION

The following codes and standards have been drawn up by a group of people highly experienced in working with birds of prey. In all cases the welfare of the birds has come first. The aim of this document is to assist any potential beginners to falconry or bird of prey or owl keeping; to remind and aid those already involved in falconry or diurnal or nocturnal bird of prey keeping; to inform anyone who might be interested in what guidelines we set ourselves in our care of birds; and to show to those who may not approve or understand the reasons for keeping birds of prey or owls, that we always have the birds' best welfare and husbandry in mind.

PEOPLE AND BIRDS OF PREY AND OWLS

There may well be occasional exceptions to the standards set here - however these must always be taken on their own individual merits.

1) How to begin in falconry or bird of prey/owl keeping

It is highly recommended that before acquiring a bird, a beginner should obtain some sort of personal "hands on" instruction in falconry and the needs of a bird of prey or owl.

The following suggestions are how to go about this. The Hawk Board ([www.hawkboard-off.org.uk](http://www.hawkboard-<u>off.org.uk</u>)) has lists of useful addresses, including Clubs, which may be obtained by sending a SAE to Mike Clowes, Hawk Board Co-ordinator, Le Moulin de L'Age, 86390 Lathus St Remy, France. Tel: 0033 54991 7930.

- a) Join a reputable falconry or bird of prey club or association which may well have an apprenticeship scheme for beginners.
- b) Go on a suitable good quality course.
- c) Seek out private assistance from an experienced or willing falconer, living within reasonable travelling distance.

d) Do your LANTRA Award for Beginners in Bird of Prey Management.

Some sort of personal experience of the species which the beginner is going to use is essential.

It is unlikely that sufficient understanding will be gained from videos or books; although these are a most valuable tool, they cannot substitute for hands on experience.

2) Suitable Quarters

These must be made available before the arrival of the bird. It is suggested that any individual quarters, either aviaries or weathering areas should be ideally a minimum width and length of double the wingspan of the species to be kept. Wherever possible more space should be allowed to give the bird maximum room and comfort. If an individual bird is showing physical signs of stress or damage, it should be obvious that the accommodation is not satisfactory, and should be altered.

As no bird can be flown continuously year in year out, any potential falconer or keeper of birds of prey or owls must have a suitable aviary for those times when the bird is not being flown, e.g. moulting and, therefore, should not be tethered.

It is crucial to have all weathering areas protected by a weld mesh front to keep birds safe from dogs, foxes, rats, mink, cats, badgers, unwanted humans and the like.

The smaller owls should not be tethered following the initial training period, but instead kept free lofted in a suitable pen.

All pens should have adequate protection from all weather conditions. They should be free from damp, fungal spores and easily disinfected. All parts of the pen should be viewable from the outside (if a seclusion pen, by means of spy-holes or mirrors).

Pens containing loose, untrained birds such as breeding pens or fat moulting birds should have a double door system to prevent escape. Windows, roof and fittings should be designed to prevent injury to the bird. Thin wire netting is not suitable.

A fresh, clean supply of water should be regularly available to all tethered birds and all those which are loose in pens.

3) Food

A suitable, varied, hygienically stored, continuous supply of food must be located before obtaining a bird and must be available to the owner at all times. Food should be healthy and free of lead shot.

4) Veterinary Care

Potential owners, or those already owning birds of prey and owls, should check with their local vet to see if he or she is prepared to take on exotic species (those other than dogs or cats etc.) or will take specialist advice when needed. If not, a suitable vet should be found that will do so, before any problems arise. Most falconry or bird of prey clubs have a list of suitable vets.

5) Furniture/Equipment

High quality, suitable furniture/equipment should be on hand for the new bird. Particular emphasis should be placed on comfort as well as safety. Regular inspection and overhaul of furniture is essential.

6) Source of Bird

Ensure that the legal requirements are met before obtaining a bird (contact Wildlife Licensing Department at DEFRA in Bristol Tel: 0117 372 8691 or 8168 or e-mail wildlife.licensing@defra.gsi.gov.uk). Proof of breeding of all birds is only sensible – without it the onus to prove origin is with the keeper. Schedule 4 birds should be ringed and registered in accordance with the Wildlife & Countryside Act 1981 and should have the appropriate registration document. Annex A birds should have the correct rings and CITES permits. The pitfalls are numerous and the potential new keeper must find out what is required prior to obtaining a bird

Those who may take on injured wild birds from their vet, either for eventual release or permanent homing, must have written authentication of the source of the bird, and the vet, if the source is not a vet, giving injuries sustained and the prognosis for future release if any.

If a bird is being obtained from a breeder, it is suggested that a short guarantee will give the new owner time to have a bird checked. However, any bird that does not come up to the required standard must be returned in the same physical condition as when received, before a full refund can be expected.

It is sensible to find a recommended breeder and pay special attention to the quality of the bird rather than to the price.

7) Transport of a bird

At any stage in a bird's life it may need to be transported, either on collection of a new bird or to visit the vet. Therefore it is advisable to have a well-constructed box at hand.

The box should be of suitable size such that the bird can stand up in a relaxed manner without touching any sides or the top. The box should be constructed so that it is dark; this will keep the bird calm, but with ventilation holes towards the bottom of the box to prevent bating (jumping upwards) upwards, and with a firm footing such as clean, open-weave carpet or clean astroturf.

The door to the box should be well secured. Cardboard boxes should only be used in emergencies.

During periods of warm weather it is advisable to travel birds early, or late, avoiding the heat of the day. No bird in transit should be left in a position where it can overheat.

For birds being sent unsupervised there should be clear indication on the positioning of the box. Addresses and phone numbers should be well marked.

Be aware that all birds are particularly susceptible to fumes - car exhaust fumes can easily leak imperceptibly into vehicles and kill birds in minutes. Birds should not be transported in the boot.

Untrained birds are better transported unfed; fat, nervous birds are more easily stressed.

For the more nervous birds veterinary advice should be sought prior to travelling.

8) Training methods

This is probably the most stressful period in a bird of prey or owl's life. It is removed from surroundings that it knows, transported, often jessed and tethered and handled immediately.

Stress in training should be minimised; for example - aspergillosis is a stress-related condition known to affect Golden Eagles, Red-tailed Hawks, Merlins, Gyr Falcons and Goshawks, also Great Grey Owls and Snowy Owls – to name but a few. In this particular disease, incidence is almost invariably within a month of taking up a bird from an aviary to fly, or subsequent to some other major stress factor such as transport.

The danger of early tethering of young, immature birds whose bones are not fully formed must be understood and avoided.

To reduce stress a cooling-off period for a new bird can help. Do not immediately start to train a young bird, but give it a settling-in period before handling.

There are many good books that give training methods, but as has been stated earlier, beginners to bird of prey or owl keeping should acquire experience of the training methods before attempting these on their own bird e.g. undertaking an appropriate course, accompanying an experienced falconer etc.

9) Perches and Weathering

Diurnal (*day flying*) birds of prey should not be tethered except when flown daily, in genuine training or under veterinary treatment.

Once trained, small owls should not be tethered. They can be flown very successfully outside whilst being kept loose in aviaries at all other times.

No tethered birds should be left unsheltered from heat or inclement weather or unprotected from stress, or possible predators including man, or left without water for long periods.

Perches should be checked for signs of wear and tear, and cleaned and disinfected regularly.

Bumble Foot is a disease of the feet that if left unattended can kill. In most cases it is caused by poor perches.

10) General Health

The first principle for keeping healthy birds is the recognition of good health, so that even a slight variation from the norm is rapidly detected and acted upon.

All birds must be properly inspected daily.

Aviary design should be such that food contamination by droppings is minimised; keepers should be aware of the dangers of birds eating old or decaying food.

11) Field Etiquette

Permission from the landowner or tenant must always be acquired before a bird is flown.

All birds flown free must be adequately trained. Particular care should be taken when flying un-entered birds free in case they are lost and unable to fend for themselves.

Every effort should be made to ensure that birds are flown only at quarry which may be legally taken. Quarry should be of a size that will be rapidly overpowered by the bird, so that no undue suffering should occur to the prey species. Valid game licenses must be obtained and the game seasons must be respected.

Every falconer in the field should be competent in despatching quarry immediately and effectively should the need arise.

A simple first aid kit can be carried in the falconer's bag so that immediate treatment can be implemented should injury occur to bird or falconer

If birds are flown in company, adequate precautions must be taken when one bird is flown in the proximity of others, e.g. only one bird should be slipped at a time.

An awareness of other users of the land, such as the public walking dogs, particularly small ones is important. Harris Hawks particularly can be difficult with unknown dogs.

Jesses

Flying birds should either wear field jesses, e.g. slitless straps, or if traditional jesses are used, the slits should be covered in such a way that they cannot catch in anything.

Birds that get soaked or exhausted while being flown must be attended to immediately. Welfare of the birds must come before sporting aspirations.

At the end of a day's hunting the bird's welfare should come first and they should be fed, dried if necessary and put away safe and secure before attending to other livestock, or lastly oneself.

Dogs

If dogs or ferrets are used with birds of prey they must be well-trained. Their welfare is as important as the birds, and suitable provision for their well being should be made at all times.

12) Breeding Birds of Prey and Owls in Captivity

Breeding birds should be kept in well-sheltered, clean, secure aviaries. These should be of a suitable size so as to house not only the breeding pair but also any subsequent young without causing stress.

Birds should be easily viewed, as should eggs and young. Aviaries should be designed so that they can be kept clean and hygienic with the minimum amount of stress to the birds.

It is the responsibility of any breeder to be aware of the requirements of the market and not produce large quantities of unneeded or unwanted birds.

Breeders should make every effort to produce sound birds of quality.

Except in exceptional circumstances close in-breeding is not recommended.

Financial gain must not override the production of sound, quality and stable progeny.

Lastly and most importantly, breeders should make sure that prospective owners are suitably prepared and experienced to handle their new bird. It is a legal requirement to ensure that intended recipients of Annex B birds must be vetted for suitability and that this is the responsibility of the original keeper (*Article 9.4 of EU Regulation 338/97 refers*). Equally for an annex A specimen this may require the prior approval of the Management Authority (*Article 9.1 of EU Regulation 338/97 refers*).

13) Demonstrations

The Countryside Alliance, in conjunction with the Hawk Board, has produced guidelines (*see Appendix 3*) for both demonstrations and shows.

This document has attempted to give broad outlines on the care and welfare of birds of prey and owls for those people keeping, flying or breeding them. Obviously a great deal more detail could have been given; however it was thought that there is much in the way of literature and establishments open to the public that can give the newcomer any further information required.

There are many Acts of Parliament which affect the keeping, feeding, travelling and hunting of birds of prey. The onus on knowing about and understanding these laws lies with the owner or keeper of the birds. Ignorance of the law is not an acceptable excuse for breaking it. So potential keepers of birds of prey and owls should make sure they know which laws apply to them at all times.

Appendix 3: Countryside Alliance and Hawk Board Guidelines to Demonstration Givers (*free flying*)

1. Birds should be accustomed to giving demonstrations and be tame and fit, with good plumage. Birds used for hunting, in general do not make good display birds. The welfare of the birds must be kept under consideration at all times.
2. A flying display should include a static display so that the public can get near to the birds to view and ask questions - not necessarily- some main rings don't want one.

3. It is recommended that Owls, other than Eagle and Horned Owls, should not be displayed.
4. Hawks showing signs of agitation or distress should be removed from the display. Hoods should not be left on hawks for any length of time.
5. It is recommended that no more than six birds should be brought to the shows. Generally more than one vehicle is required if more than six birds are to travel in safety & comfort.
6. A suitable shelter is required for a static display. Signs, giving the species, should be visible and legible - shade, a solid back & sides & a dog proof, child proof fence are minimum requirements.
7. At no time should the static display be left unattended. At no time should birds be left on field caddges or perches in or adjoining the flying area in view of the flying birds, even if attended. All birds except the birds being flown at the time should be either in the vehicle, well out of view, or on the sheltered weathering lawn with an attendant.
8. Perches, baths & equipment should be in good order. Full bathing facilities should be available to all tethered birds of prey throughout the day except for those about to be flown.
9. Article 10's are required for all appropriate Annex A birds on display. No wild disabled birds to be put on display to the public.
10. It is advised that children are to be discouraged from taking part in displays. Flying of the birds should be by traditional falconry methods; the flying of hawks to alight on the head, face or any part of the body except the gloved fist is absolutely not acceptable. At no time should the public handle the birds.
11. If possible, there should be two people to demonstrate.
12. Birds should be flown with telemetry and field jesses, whenever possible.
13. The Demonstrating Team should wear country dress and behave properly at all times and avoid undue sensationalism in act or statement. Any music linked to the demonstration must not give the impression of a circus act. Falconry must not be brought into disrepute.
14. The Demonstration Team should have Public Liability Insurance for at least one million pounds.

Guidelines to Demonstration Givers (static displays)

1. Birds should be accustomed to giving demonstrations and be tame and fit, with good plumage. Birds used for hunting, in general do not make good display birds. The welfare of the birds must be kept under consideration at all times.
2. A Static Display is intended to enable the public to view the hawks at close quarters. If the public has any questions qualified falconers may answer them. The distance from

the public to the tethered hawks should be outside stress or interference distance, but close enough to permit photography.

3. It is recommended that Owls, other than Eagle and Horned Owls, should not be displayed.
4. Hawks showing signs of agitation or distress should be removed from the display. Hoods should not be left on hawks for any length of time.
5. It is recommended that no more than six birds should be brought to the shows. Generally more than one vehicle is required if more than six birds are to travel in safety & comfort.
6. A suitable shelter is required for a static display. Signs giving the species should be visible and legible. A solid back & sides, shade & dog & childproof fencing are a minimum requirement.
7. At no time should the static display be left unattended.
8. Perches, baths & equipment should be in good order. Full bathing facilities should be available to all tethered birds of prey throughout the day.
9. Article 10 certificates are required for all appropriate birds on display. No wild disabled birds to be put on display to the public.
10. It is advisable for children to be discouraged from taking part in displays. If members of the public are to touch or stroke a bird, you should only permit this having had regard to the safety and welfare of the public and bird. Repeated handling can seriously damage the waterproofing of plumage.

Falconry

Falconry is the sport of taking wild quarry in its natural state and habitat by means of trained hawks. Any publicity involving birds of prey has a potential for benefit and harm. Benefit comes from increasing appreciation of birds of prey and the art of falconry. Harm comes from stimulating a desire to possess hawks in those who lack the time and expertise to look after them or who may try to obtain them illegally: or by showing birds in a condition that is detrimental to the birds and possibly to the viewing public.

Displays of hawks on perches (*static displays*) are best undertaken in conjunction with demonstrations of birds in flight. Generally, static displays without a flying demonstration are misleading as no birds are seen untethered or flying free. Therefore those giving static displays must be prepared to explain that the hawks are hunted/flown free on a regular basis.

Display Objectives

The object of any display of birds of prey should be to educate the watching public with strong emphasis on the need for bird conservation. This can be achieved by clearly stating the

role, which birds of prey play in the ecology of the countryside. This should be supported by suitable leaflets at all times, e.g. from Countryside Alliance, Defra, etc.

The Law and Insurance

It is illegal to take from the wild in Britain or import from abroad any species of birds of prey unless approved by the D.E.T.R. Show organisers must, therefore, ensure that anyone giving a demonstration has the necessary licences or can account for the origin of the birds. Show Organisers need to take particular care that Display Givers are not collecting funds illegally or claiming charitable status fraudulently. Both the Organiser and the Demonstrator must check that Display Teams have adequate public liability insurance and are keeping within the law. Handling birds without gloves or encouraging birds to land on people's heads may make insurance policies void.

Appendix 4: Hawk Board Policy on controls of wild raptors

- The Hawk Board accepts that many UK species of raptors have now recovered in the wild to such an extent that in places they are being illegally persecuted because of their effects on game birds or racing pigeons.
- The Hawk Board opposes any form of illegal persecution of birds of prey.
- The Hawk Board urges interested parties, such as Defra, JNCC, GCT and RSPB, to define population targets for each species above which their conservation status would no longer merit blanket protection and in which some controls would be appropriate.
- In the event that some controls are agreed, the Hawk Board would prefer non-lethal means of reducing the predation pressure.
- The Hawk Board has no current plans, nor does it encourage individuals to seek licences to take raptors from the wild for their own purposes.

In the event that other parties, such as land-owners, obtain permits to take raptors from the wild as part of an ongoing management programme, the Hawk Board would encourage any steps to promote the survival and well-being of those raptors, including if necessary, using them for falconry or captive breeding.

Appendix 5: DEFRA data on Schedule 4 raptors bred in captivity

TOTAL NUMBERS OF BIRDS BRED 2000 - 2005						
SPECIES	2000	2001	2002	2003	2004	2005
Barbary Falcon	27	24	19	32	29	34
Barbary Hybrid	5	2				
Barbary x Lanner Falcon						
Barbary x Lugger Falcon	1					
Barbary x Merlin		1			1	
Barbary x Peregrine Falcon						1
Barbary x Prairie Falcon			1			3
Barbary x Saker Falcon		2	3		3	4
Barbary/Gyr x Peregrine/Lanner Falcon						
Barbary/Gyr x Saker Falcon			7			
Black Kite x Red Kite					4	1
Golden Eagle	1	8	4	6	6	17
Golden Eagle x Steppe Eagle	1	3	5	3	2	5
Goshawk	153	189	171	215	234	324
Gyr Falcon	37	56	59	75	88	100
Gyr Hybrid		4			2	
Gyr x Barbary Falcon	3	11	17	35	40	44
Gyr x Barbary/Peregrine			1	3	1	
Gyr x (Gyr x Gyr/Saker)				3	11	20
Gyr x (Gyr x (Gyr/Saker x Saker))			5	10		13
Gyr x Gyr/Saker Falcon	29	29	39	58	137	151
Gyr x (Gyr/Saker x Saker Falcon)	17		24	29	31	18
Gyr (Gyr/Saker) x (Gyr/Saker) Saker			5	1		
Gyr (Gyr/Saker x Saker) x Gyr/Saker			3			
(Gyr x Gyr/Saker) x Gyr/Saker Falcon		8	15	22	27	58
(Gyr x Gyr/Saker) x (Gyr/Saker x Gyr)						10
(Gyr x Gyr/Saker) x Saker				6		
Gyr x Lanner Falcon		8	1		3	5
(Gyr x Lanner) x (Gyr x Saker)					1	
Gyr x Lugger Falcon	4	5	2		3	
Gyr x Merlin	2	3	1	6	5	9

Gyr x New Zealand Falcon	1	1				
Gyr x Peregrine Falcon	90	122	184	251	287	358
Gyr x Peregrine Hybrid					2	
Gyr x Peregrine/Barbary Falcon		6	6	12	12	10
Gyr x Peregrine/Saker Falcon	1					
Gyr x (Peregrine x Peregrine/Barbary)			3	1		
Gyr x (Peregrine/Barbary x Peregrine Falcon)	1			1		
Gyr x Prairie Falcon	4	5	9	21	25	33
Gyr x Red-Napped Shaheen		3				
Gyr x Saker Hybrid		125	8		6	
Gyr x Saker Falcon	144	124	156	153	117	141
Gyr x Saker x Gyr x Saker						8
Gyr x Saker/Gyr			2	6	10	2
Gyr/Peregrine x Barbary Falcon						2
Gyr/Peregrine x Gyr Falcon		1	3	2	6	7
Gyr/Peregrine x Gyr/Saker Falcon					4	7
Gyr/Peregrine x Lanner Falcon				1		1
Gyr/Peregrine x Luggar Falcon	1					
Gyr/Peregrine x Merlin		2		2		
Gyr/Peregrine x Peregrine Falcon	4	4		2	6	
Gyr/Peregrine x Peregrine/Gyr						1
Gyr/Peregrine x (Peregrine x Pere/Saker)			2			
Gyr/Peregrine x Prairie Falcon		10	4			
Gyr/Peregrine x Saker Falcon	2	6	7	23	8	6
Gyr/Peregrine x Saker/Gyr			2			
(Gyr/Peregrine x Saker) x Saker			1			
Gyr/Prairie x Saker Falcon	4			11	2	
Gyr/Saker Hybrid					17	22
Gyr/Saker x (Gyr x Gyr X Saker)					5	
Gyr/Saker x (Gyr/Saker x Saker Falcon)	9		37	33	30	29
Gyr/Saker x ((Gyr/Saker x Gyr) Saker)			4	2		
Gyr/Saker x Gyr Falcon	13	11	19	16	11	15
Gyr/Saker x Gyr/Saker Falcon	31		7	24	62	86
Gyr/Saker x Merlin			1			
Gyr/Saker x Peregrine Falcon	3	5	18	6	11	13
Gyr/Saker x Prairie Falcon		2	7			
Gyr/Saker x Saker Falcon	69		55	57	37	36

SPECIES	2000	2001	2002	2003	2004	2005
Gyr/Saker x Saker/Gyr						5
Gyr/Saker x (Saker x Gyr/Saker)						2
(Gyr/Saker) Saker x (Gyr/Saker) Saker			1			
(Gyr/Saker x Gyr) x Gyr/Saker			2	9	13	13
(Gyr/Saker x Gyr) x (Gyr x Gyr/Saker)						13
(Gyr/Saker x Gyr) x Peregrine			2	1		
(Gyr/Saker x Prairie) x Saker					3	2
(Gyr/Saker x Saker) x Gyr/Saker					6	
(Gyr/Saker x Saker) x Saker Falcon			6	6	11	3
Hobby	5	1	2	2	6	
Lesser Kestrel						11
Lanner Hybrid		2				
Lanner x Gyr Falcon						1
Lanner x (Gyr x Lanner)					2	
Merlin	92	98	71	65	49	67
Merlin Hybrid			2		2	
Peregrine Falcon	394	383	366	307	360	335
Peregrine Hybrid	12	11	22	5	5	
Peregrine x Barbary Falcon	4	6	7	16	2	3
Peregrine x Barbary/Peregrine Falcon	1	2	2			
Peregrine x Barbary/Saker Falcon					1	
((Pere x Barb) x Pere) x Lanner) x Pere						2
Pere x ((Per/BarbxPer)x Per)					8	14
(Pere x (PerexBarb)) x Saker					8	
((Peregrine/Barbary x Pere) x Pere) x Pere	1			1		
(Peregrine x Peregrine/Barbary) x Pere			6	9	2	11
(Peregrine/Barbary x Peregrine) x Pere	2		3			
(Peregrine/Barbary x Peregrine) x Saker	3		6	9		
((Peregrine/Barbary x Pere) x Pere) x Pere	1			1	5	1
(Peregrine/Barbary x Pere) x Pere Falcon	2		3			
(Peregrine/Barbary x Pere) x Saker Falcon	3		6	9		
Peregrine/Barbary Hybrid			1		6	12
Peregrine/Barbary x Peregrine Falcon	1		3	7		
Peregrine x ((Pere/Barbary x Pere)x Pere)			3	3		
Peregrine x Gyr Falcon	3		5	4	4	3

Peregrine x Gyr/Saker Falcon		4	12	9	5	6
Peregrine x (Gyr x Gyr/Saker Falcon)			2			
Peregrine x (Gyr/Saker x Saker Falcon)			2	10	9	
Peregrine x Lanner Falcon	34	12	20	22	26	26
Peregrine x Lugger Falcon		1	5	5	4	2
Peregrine x Merlin	17	11	19	31	14	21
Peregrine x New Zealand Falcon	1	1				
Peregrine x Peregrine/Barbary Falcon	6		6		9	7
Peregrine x (Peregrine x Pere/Barbary)			5	6	3	8
Peregrine x (Pere/Barbary x Pere Falcon)	1		3	4	5	
Peregrine x Peregrine/Saker Falcon	3	2	2	1	3	1
Peregrine x Prairie Falcon	7	18	22	23	31	23
Peregrine x Saker Falcon	98	108	135	135	103	112
Peregrine x Saker Hybrid			1			
Peregrine x Saker/Peregrine			1			
Peregrine/Gyr x Lanner			7			
Peregrine/Gyr x Lugger			2			
Peregrine/Gyr x (Pere x Barbary/Pere)			1			
Peregrine/Gyr x Peregrine Falcon			2		2	2
(Per (Gyr x Per)) x Per						1
Peregrine/Gyr x Prairie Falcon				1		
Peregrine/Gyr x Saker Falcon	1		3			
Peregrine/Lanner x Lanner				2	1	3
Peregrine/Lanner x Peregrine			3	2	2	1
Peregrine/Merlin x Merlin			1			
Peregrine/Saker x Peregrine				1		
Peregrine/Saker x Saker Falcon	1					
Prairie Hybrid	5		1	1	6	
Red Kite	3		2	6	4	1
Saker hybrid	38	40	24	11	8	4
Saker x Gyr Falcon						
Saker x Gyr/Saker Falcon				3	3	6
Saker x Peregrine Falcon		1	1	2		2
Saker x Prairie Falcon		1				
White Tailed Eagle					1	2
TOTAL	1,396	1,482	1,718	1,858	2,019	2,320

Appendix 6:

Hybrids or non-indigenous species

The International Association for Falconry Policy on Hybrids

IAF recommends as a minimum that:

1. Hybrids are fostered if possible by a parent that does not occur locally in the wild.
2. Hybrids are only hacked in large conditioning pens.
3. Hybrids are only flown with reliable telemetry equipment.
4. Maximum efforts are made to recover any hybrid that is lost.
5. Hybrids should never deliberately be released.

Hawk Board Policy on flying non-indigenous or hybrid birds of prey either as trained birds or at hack (currently under review):

1. All raptors flown at liberty should carry a telephone number or contact details of the person responsible for them.
2. All raptors, except trained Harris Hawks, should carry transmitters capable of functioning for the duration of the period at liberty.
3. All raptors should be re-captured within a maximum of 30 days of liberty flying at hack.
4. The area surrounding the hack site should be attended by staff at all hours of daylight. Hybrids should be imprinted if possible on a parent species that does not occur locally in the wild.
5. Maximum efforts should be made to recover any exotic or hybrid that is lost.
6. Exotics or hybrids should never deliberately be released permanently to the wild.
7. These restrictions do not apply to pure-bred indigenous species of the local sub-species, but do apply to sub-species from elsewhere.

Falconry is the sport of taking wild prey (or quarry) in its natural state and habitat by means of trained hawks.

However, it is acknowledged that in the 21st century bird of prey keeping encompasses much more than this bare definition.

This extraordinary audit of falconry in the United Kingdom, which has never before been carried out with such an eye for detail, gives further substance to the above definition. The content provides an essential study of all the issues and history that predicate bird of prey ownership in Britain today. Previous audits have been speculative and based on membership of falconry clubs alone, despite their representing less than 10% of the total.

Some staggering statistics are revealed. In a single year, it is assessed that:

- **25,000 people keep birds of prey**
- **5,000 are falconers**
- **2,000 are breeders**
- **12 million school children are advised about falconry**
- **400,000 people enjoy experience days**
- **5 million people go on corporate days that include contact with birds of prey**
- **45 million attend an event or venue that includes a bird of prey display**
- **3000 full time equivalent jobs and 300 businesses are based around birds of prey**
- **70,000 raptors are estimated as currently in legal captivity**
- **Creating an annual turnover of £8.5 to £10 million**

The Hawk Board is the only representative body for falconers and bird of prey keepers throughout the United Kingdom. It is recognised by government, the police, other field sports bodies, and conservation and pressure groups as the first point of contact concerning raptors. It is to the Hawk Board that the Department of Environment, Food and Rural Affairs (Defra) refers all consultation documents that may impact on or otherwise affect the right to keep, breed, fly and hunt with birds of prey. The board meets four times a year, more frequently through its many working groups. In addition to the fourteen individual club representatives, there are six elected specialists whose expert knowledge is central to the defence of falconry. Specialists serve for a term of three years from the last election year (2007). The Campaign for Falconry is an independent committee with particular responsibility for fund raising, public events and education.