Large Carnivore Initiative for Europe

IUCN/SSC Specialist Group

SSC
Species Survival Commission

# A manifesto for large carnivore conservation in Europe (ver. 20.06.2013)

## Prelude

Since its creation in 1995 the Large Carnivore Initiative for Europe (LCIE)[1] has worked towards the achievement of a vision "*To maintain and restore, in coexistence with people, viable populations of large carnivores as an integral part of ecosystems and landscapes across Europe*". Now we are firmly in the 21st century and the context of large carnivore conservation in Europe has developed considerably due to many expansions and some contractions in carnivore distributions and massive changes in social, economic and political situations across the continent. We therefore see a clear need to make the details of this vision more explicit. This builds on the series of policy support statements that have been made over the last 10 years, and the principles for population level management[2] that were developed in 2008, as well as other policies developed by other IUCN specialist groups such as the IUCN Policy on Sustainable Use of Wild Living Resources.

This is a manifesto of how the LCIE think large carnivore conservation could look in a European context. It is informed by our combined experience and knowledge coming from a diversity of professions and disciplines as well as motivated by our personal ethics of biodiversity conservation. It is intended to inspire, by outlining some long term objectives and stretch goals which will often go beyond the minimum standards required by international legal instruments. It states some principles and recommendations of the measures needed to achieve these objectives. Perhaps most importantly it is intended to explore in greater detail the potential relationship between people and large carnivores in the landscapes that they share. It is intended to be relevant for all European countries and five large European carnivore species: brown bear (*Ursus arctos*), wolf (*Canis lupus*), Eurasian lynx (*Lynx lynx*), Iberian lynx (*Lynx pardina*) and wolverine (*Gulo gulo*).

## Premises

There are three central sets of ethical premises underlying our vision.
The first premises concern a set of convictions and ethical standpoints concerning nature:

- Large carnivores have a right to inhabit the European continent.

[1] The Large Carnivore Initiative for Europe is currently a Thematic Specialist Group within the Species Survival Commission of the IUCN-International Union for Nature Conservation. See www.lcie.org for more details.

[2] Linnell, J., Salvatori, V. & Boitani, L. (2008) *Guidelines for population level management plans for large carnivores in Europe*. A Large Carnivore Initiative for Europe report prepared for the European Commission (contract 070501/2005/424162/MAR/B2).

- Europe is a better, richer, and more diverse place with large carnivores and the role they play in functional ecosystems.
- Future generations should be able to experience large carnivores as an integral part of our European natural heritage.

The second set of premises concern convictions concerning human societies and their relationship with nature:

- European societies have the right to use their natural resources in a sustainable manner.
- Human activity is often important for maintaining the natural and cultural values of some European landscapes.
- Decision-making concerning the conservation and use of biodiversity and natural resources should be conducted in an objective, transparent and democratic manner, should reflect respect for the interests of local people who live in close proximity to wildlife, and be based on the best available knowledge (scientific and experience).

This duality of premises – containing both natural and social elements – is clearly embedded in all the major international legal instruments that govern nature conservation in Europe today, e.g. Bern Convention, European Landscape Convention, Habitats Directive, and the Convention on Biological Diversity (including its associated Malawi and Addis Ababa principles). The content of this manifesto is intended to be generally compatible with existing international conservation instruments, but there may be some situations where our recommendations would require some adjustment of national legislation.

The third set of premises concerns the definition of the ecological setting for large carnivore conservation in Europe, and is based on the accumulated results of decades of research:

- Large carnivores occur at relatively low densities, have large home ranges, and are highly mobile.
- Although they are often treated as a functional group, wolves, brown bears, Eurasian lynx and wolverines have many species-specific differences with respect to their ecology, conservation needs, and interactions with humans that need to be considered.
- Wild areas without human land-use or activity on a scale meaningful for large carnivore populations are virtually non-existent in Europe.
- Much of the multi-use landscape of Europe with its mixture of agricultural land, forests, meadows and mountains represents suitable habitat for large carnivores from an ecological perspective. Large carnivores have shown a clear ability to live in human-dominated landscapes.
- Therefore, large carnivore conservation in Europe can only be successful if large carnivores are allowed to coexist in some shared multi-use landscapes where a diversity of human activities and land-uses are conducted.

## The challenge

Based on these three sets of premises, the challenge is to negotiate the coexistence relationship between large carnivores and humans (especially local people who live with and bear the costs of carnivores) in a manner that ensures that large carnivore populations are an integral and functional

part of the European landscape and respects and maintains the livelihoods of a diversity of human communities in shared landscapes. Because many aspects of this relationship are associated with conflicts, there is a need to achieve a certain degree of compromise and implement appropriate adaptation and mitigation measures. In order for large carnivore – human coexistence to be achievable and sustainable there is a need to recognize that solutions will be:

- Dynamic over time – responding to changing environmental and social conditions as well as responding to changes within the large carnivore populations.
- Variable in space – accounting for variation in environmental, social, economic and cultural conditions and interests.
- Species dependent – taking account of differences in ecology, in real or perceived conflict levels, and social and cultural conditions.

**The nature of coexistence**

Although coexistence is our stated objective for the relationship between large carnivores and humans in Europe, many questions remain as to how coexistence actually looks. Based on the experience of the last 30 years of conservation activity one thing is clear – there likely will never be a day when all stakeholders and individuals agree on how large carnivores should be managed and when everybody welcomes their conservation. In this respect, large carnivore management is no different from any other policy area. We view a successful coexistence as containing the following elements:

- Coexistence should be viewed as a dynamic and co-adaptive process where people and large carnivores are viewed as integral parts of the landscape.
- Although coexistence does not require all stakeholders to agree on all aspects of large carnivore conservation, it does require tolerance of the presence of large carnivores and the legitimate interests of a diversity of stakeholders with divergent opinions.
- The opinions and perspectives of local communities and groups that are directly influenced by, and have an influence on, large carnivore conservation require particular weight and importance.
- The negotiation of different points of view should be conducted through channels which are legal.
- Coexistence will inevitably involve a tolerance for compromises, the nature of which will vary with time and space.

**A future status for large carnivores**

Because of their low densities and high mobility, securing short to medium term viability of large carnivore populations will require them to occupy much larger parts of the European continent. When long term viability, especially including genetic aspects, is considered there is a need to further ensure a high degree of connectivity between the existing populations. While bearing in mind throughout the need to build social support for large carnivore conservation, the LCIE vision therefore aims for:

- In the short term current large carnivore populations should be recovered to the extent that they are considered to be demographically viable.
- If they are already above the threshold of demographic viability they should be maintained at, or over, their current levels unless there are dramatic changes to the region's carrying capacity.
- The long term goal for European large carnivore conservation should be that all the existing populations of large carnivores are allowed to recover to the extent that they are functionally connected to each other. Only in cases where this degree of connectivity is impossible to restore due to irreversible habitat modification should continuous assisted connection (through translocations) be used to maintain viability.
- The default position should be that large carnivores are allowed to expand and colonize new areas within their potential ranges.
- Large carnivores should be able to live as functional, interactive and dynamic components of European ecosystems. However, restoring ecological functionality has to consider the perceptions, livelihoods and activities of local communities. Therefore, achieving wide-ranging distributions is a more important goal than achieving locally high densities.

**Understanding conflict**

Conflicts between humans and large carnivores have always been common throughout history. During recent years, our understanding of conflicts has developed to the extent that we can now recognize that these conflicts can be very diverse and species-specific. They include:

- A range of economic conflicts that include depredation on domestic animals, protected wildlife, damage to beehives, trees and crops, real and perceived competition for shared prey, and destruction of property, and regulatory restrictions on socio-economic activities due to real or perceived negative impacts on large carnivore populations.
- Conflicts with hunters through competition for game and the killing of hunting dogs.
- Taking the needs of large carnivores into account may impose significant opportunity costs and limitations on rural development activities.
- The fear for personal safety is present among some human communities and should be recognized as a concern.
- There are a wide range of social conflicts where large carnivores are regarded of being symbolic of wider political issues, including modernization and urban-rural tensions. In such cases, the large carnivores are often instrumentalised as surrogates for wider conflict issues.
- A proportion of society, especially in rural areas, may be in fundamental opposition to the values that underlie large carnivore conservation. A proportion of society, especially in urban areas, may be in fundamental opposition to the values that underlie sustainable game management and hunting activities in rural areas where large carnivores occur.
- Conflicts over knowledge, for example differences between scientific and lay knowledge, may be a major part of some large carnivore related conflicts.

- While the mass media often has a crucial role in communication there is an unfortunate tendency for media to enhance conflict through biased and / or polarized reporting and sensationalisation of issues.

**Responding to conflict**

Recognizing the potential severity and diversity of conflicts is a first step towards mounting a response. Many conflicts, especially the material and economic conflicts, can be mitigated.

- The primary responsibility should be to adapt approaches and activities in order to take into account and reconcile the needs both of humans and large carnivores. Governments, NGOs and scientists should facilitate this adaptation through providing knowledge, technical assistance and appropriate economic support to ensure that costs and benefits are more evenly distributed between the affected and unaffected publics.
- It must be recognized that the density of carnivores that rural communities are willing to live with may often be lower than the potential ecological carrying capacity of the region. Reaction to conflict through lethal control actions directed at specific problem individuals can be a part of integrated conflict management, but should be used with caution and after consideration of other non-lethal approaches.
- Legalised, well regulated hunting of large carnivores at sustainable levels can be a useful tool in responding to conflict, through slowing their increase to socially acceptable levels, engaging local populations in management, increasing their perceived local value, and decreasing illegal killing. However, whether hunting has these benefits is very context-specific and depends on many factors, including the conservation ethic of the hunters.
- It is also important to explore and visualize the potential benefits that large carnivores can bring to rural economies and to the structure and function of ecosystems.
- Payment of ex-post facto compensation without conditions of effective mitigation does not usually contribute much to decrease conflicts and may actually enhance them. Paying for prevention measures and providing other positive incentives for large carnivore presence should be preferred in situations where economic instruments are needed.
- Experienced rapid response teams, with a local basis where possible, are necessary for reacting to certain types of conflict.
- Social conflicts are best dealt with through improved institutional arrangements that promote mutual respect and understanding, broad participation, and dialogue among stakeholders.
- The active engagement of a diversity of stakeholders in generating, interpreting and communicating knowledge is desirable as a measure to reduce conflicts over knowledge.
- Large carnivore conservation, management and prevention measures should be based on reliable and, where possible, quantitative information. This requirement underlines the importance of sound and reliable monitoring systems and development of trusted databases.

**Management of habitat and prey**

Large carnivores are very flexible species and have persisted for millennia in the presence of many human activities. However, they do have some basic requirements for food / prey and habitat and some limits to what they can tolerate. The different species may well have different tolerance levels. Furthermore, while they have shown an ability to persist in the presence of many traditional human land-uses, they face a far greater threat from many of the new uses of the landscapes, especially those associated with infrastructure (energy production, transport, recreation) development.

- Outdoor recreation, hunting, harvesting wild fruits and plants and forestry should be conducted in a manner which is sustainable, provides incentives for maintenance of wildlife areas where possible, and takes into account the legitimate use of these shared resources by large carnivores. In areas of large carnivore populations, the prey base and supply of wild foods should therefore be maintained at levels that permit large carnivore presence.
- Hunting of wild ungulates should consider the need to balance food requirements of natural predators.
- Human modification of large carnivore habitats should ensure that enough areas of suitable and connected habitat exist to achieve conservation goals. It is particularly important to ensure that infrastructure development adopts appropriate mitigation measures to minimize mortality and ensure permeability on a landscape scale.
- Landscape-level planning needs to be conducted at both large (population) and local (home-range) scales for large carnivores, and environmental impact assessments for new development should consider both individual and cumulative impacts from the full range of developments and land-uses.

**Management of large carnivore populations**

When recognizing the highly modified nature of the European landscape and the high human densities with which large carnivores must coexist it is important to recognize that large carnivores cannot be conserved simply through a hands-off process. This may require some degree of population regulation to the extent that legal frameworks permit. There are also populations that are unlikely to survive in the short term without active conservation measures. Therefore, large carnivore conservation is likely to require an ongoing degree of active intervention using a range of locally and context specific tools.

- On a scale that is meaningful for large carnivores there is no part of Europe which can be currently regarded as a wilderness, and this has been the situation for many centuries. The persistence of large carnivores in Europe has therefore been based on a constantly evolving co-adaptive interaction between large carnivores and rural communities. This is one of the specific features that unifies natural and cultural heritage in Europe, and should be considered as a key value to conserve in the future.
- The non-consumptive use of large carnivores, for example in ecotourism, should be promoted. However, it must be conducted according to clear guidelines to minimize potentially negative impacts such as disturbance and unintentional effects of using baits.

- The remaining genetic diversity of European large carnivores should be conserved as much as possible to allow the potential for evolutionary adaptation. However, there should be no active effort to prevent natural expansion and the resulting mixture of currently distinct genetic units. Maintaining genetic representation, rather than distinctiveness, should be the goal. On the other hand, where inbreeding is identified as a conservation concern, measures may be needed to increase genetic diversity.
- Where possible the expansion of range and restoration of connectivity should be facilitated by natural recovery. However, given the different dispersal abilities of the five species and the pattern of past population extinction it has to be understood that lynx and bears have a relatively limited potential for natural recolonisation in fragmented landscapes and may require assisted dispersal.
- Translocation, reintroduction and population reinforcement may be important in some specific situations (e.g. wolves in Sweden), but should only be conducted under carefully planned operations, preferably using wild caught individuals and following IUCN guidelines.
- The release of individuals either born in captivity or held in captivity for prolonged periods should be avoided; especially for bears because of the higher risks of habituation and conflicts with humans, and is only acceptable for lynx, wolverines, and to a lesser extent for wolves, in very specific and carefully planned situations.
- Hybridization between wolves and dogs represents a threat to wolf conservation for a variety of reasons related to their ecological impacts, the public perception of the risks from hybrids, and other issues related to practical management. Actions should be taken to reduce the risk of this happening by controlling feral and free-ranging dogs and when managing wolf hunting. Responsible authorities should implement measures to remove any detectable hybrids from the wild.

## Animal welfare considerations in large carnivore conservation

The primary focus of this manifesto is to ensure the long term persistence of populations of large carnivores. However, we recognize the importance of welfare considerations concerning individual carnivores. Therefore, we

- Accept the value of rescue, rehabilitation and release of individual large carnivores provided they have not been kept in captivity in a way that they become habituated to humans and may therefore pose an increased risk of causing conflict or endangering human safety.
- Believe that management actions such as euthanasia, hunting and research directed at individual free-living large carnivores should be conducted in a manner which is as humane as possible.

## Institutional arrangements

Large carnivore conservation in shared landscapes is a challenging activity and requires that responsible institutions have a high capacity and well established procedures. When developing such institutions it is important to consider the following:

- Because of the spatial scale at which large carnivore conservation occurs there is a definite need for intra-national and international cooperation across administrative borders. There should be a clear coordination from larger scale authorities when decentralization and delegation of management authority to smaller administrative units occurs.
- Decision making should be democratic, involve appropriate devolution of decision-making, be guided by state of the art research concerning both natural and social sciences, and the recognition that all countries have to cooperate with each other to achieve large carnivore conservation.
- Policy options are limited by the biology and ecology of large carnivores.
- Institutional arrangements should be designed in a way that they are efficient and sustainable, both socially and ecologically, with clear, transparent, and predictable procedures.
- Large carnivore management plans should be conducted within an adaptive management framework, regularly updated, adapted to local situations, and responsive to local level influences and needs.
- Because large carnivore conservation is a long term activity, clear efforts should be made to preserve institutional memory. Relevant staff should have access to constant education and capacity building training.
- Population level management plans should involve all administrative units and affected stakeholders that share biologically meaningful populations.
- Because of the diversity of human interests with which large carnivores interact there is a need for a high degree of cross-sectorial cooperation and policy coordination. The most important sectors are environment, law enforcement, agriculture, forestry, wildlife management and hunting, transport, landscape planning, rural development, and tourism.
- There should be formal channels for bridging the science-policy interface, that facilitate the integration of the latest scientific results into management structures, and that allow managers to commission priority research activities from researchers.
- Management institutions need to have well established routines for engagement with the full range of relevant stakeholders to facilitate communication and provide a real scope for consultation and influence.
- Institutions should integrate stakeholders as active partners in large carnivore management.
- Illegal persecution of large carnivores must be treated as a serious crime. Known cases must be followed up through the legal system.

**Knowledge needs and uses**

There is a widespread acceptance that policy should be supported by the best available knowledge. However, there is also a widespread awareness that knowledge is a diverse concept and that multiple forms of knowledge exist, both coming from multiple disciplines within science and from other knowledge systems beyond formal science. All of these have a role to play in informing policy

and management, the challenge lies in identifying the strengths, weaknesses and limitations of each knowledge form.

- Large carnivore management policy needs to be informed by contributions from multiple research disciplines including the natural and social sciences and the humanities.
- The most urgent need is for science based, robust, but sustainable forms of census and monitoring of the status of large carnivore populations. The frequency of survey and required precision will depend on context, with small populations and those subject to high harvest rates needing more frequent and more precise data than other populations. Methodology needs to become more standardized, reliable, consistent and transparent, and should permit population level assessments.
- Large carnivore conservation goals should be quantified (at population level), set on the basis of sound population data, and credibly monitored.
- Increased cooperation between researchers and other actors in large carnivore conservation is needed. Improved routines for data sharing are an urgent requirement.
- Multiple forms of knowledge should be utilized where possible, with a strong need to integrate a wide public in data gathering exercises. Existing and established monitoring systems which use civil society groups, such as hunters, should be encouraged whenever they provide useful data. Citizen science frameworks can be useful at uniting lay and experience based knowledge forms with formal scientific knowledge. However, it is crucial that data quality is high, and that data should be verifiable.

**Final words**

The manifesto describes our vision for the place of large carnivores within the European landscape. It relies on the premise that sustainable conservation in Europe needs to embrace the whole landscape including, but extending far beyond, protected areas to a whole landscape scale where human land-use and conservation coexist in shared landscapes. It describes a vision of an active and dynamic relationship between humans and large carnivores, based on interactions and coadaptation. It is a vision based on education, patience, tolerance, compromise and flexibility. It is a vision that hopes to see interconnected viable populations spread over as large parts of the continent as possible and managed in such a way that they are viewed as normal and valued parts of the fauna of the wider countryside.