

State of the Parks in Finland

Finnish Protected Areas and Their Management from 2000 to 2005





Inspecting the nest of a golden eagle (*Aquila chrysaetos*). The total species population has slowly strengthened up to 400–430 pairs. Over 40% of them live within protected areas. (Photo: Olli-Pekka Karlin)

Comprehensive Overview of the Finnish Protected Areas

Finland's protected area (PA) system is today an important part of the nature conservation network of the boreal region, the Baltic Sea and the European Union. The Natural Heritage Services (NHS), the Finnish parks agency within the State enterprise Metsähallitus, manages a major part of the established protected areas and those reserved for conservation on State-owned land. Following the recommendation by the Management Effectiveness Evaluation of the PAs in Finland in 2005, Metsähallitus compiled the first State of the Parks report.

The report gives a comprehensive overview of the present state and the level of knowledge on Finland's PA network. A review of the state of and trends in biodiversity in each of the major ecosystems helps to understand, why PAs are so essential for conservation and why they are in need of good management. The State of the Parks report also identifies the ecological, cultural, social and economical benefits offered by national parks and other PAs.

The State of the Parks reporting helps to implement and reach the objectives of the CBD work programmes. The Management Effectiveness Evaluation framework developed by the IUCN World Commission on Protected Areas (WCPA), the rapid-assessment methodology of the WWF, the model for environmental monitoring used by the European Environment Agency (EEA), and the concept of 'adaptive management' of PAs were all used in the reporting.

State of the Parks reporting on Finnish PAs will be repeated in 2010. Monitoring of natural and cultural values and of PA management performance goes on continuously. The data is needed also for evaluation of the progress made in implementing Finland's biodiversity strategy 2006–2016.

Milestones in protection of nature in Finland

Finland's first national parks were established in the 1930's and the protected area network has been built since the 1970's. Seven national nature conservation programmes were carried out during the past decade. Private land has been acquired to the State for protection with 550 million euros. Government funding for PA acquisitions and management has increased from 63 million euros in 2001 to a total of 70 million euros in 2005. A major part, 54 million euros, was channelled through Metsähallitus.

About 500 protected areas are established on State lands, and another 1,500 are in a legal process towards formal PA designation. National parks, strict nature reserves and wilderness reserves form the backbone of the PA network, which is complemented by thousands of small nature reserves on State and privately-owned land. Protected areas cover 10% Finland's land area, in all about 32,267 km².

In Finland, over 1,800 sites have been included in the Natura 2000 network to protect rare and threatened habitats and species in Europe. These represent 15% of Finland's total area and make up 13% of the EU25 Natura 2000 network. Most sites have already been established as nature reserves or are set aside for conservation. Some 80% of the total area of the Natura 2000 network is State-owned.

Fell habitats of northern Finland are well-covered by the PA network. Likewise the major mire types, rocky outcrops and esker habitats as well as inland water habitats are quite adequately represented in the PA network. However, the bulk of the PA network lies in eastern and northern Finland, where PAs are large and their ecological integrity largely intact. In southern Finland the PA network is fragmented and PAs are small. Gaps remain in the protection of forests, wetlands and coastal areas, especially underwater habitats.

Future challenges include finalisation of land acquisitions of the nature conservation programmes and establishment of over 1,000 new nature reserves. In southern Finland the PA network will be supplemented by land use planning and voluntary forest protection and supported by modern forestry and land use practices taking biodiversity into account.

How are the Finnish protected areas managed?

Nature conservation tasks in Finland are directed by the Ministry of the Environment and administered by Metsähallitus NHS and the Regional Environment Centres with support of the Finnish Environment Institute. The nature conservation administration operates as a regional and national network to reach global targets by national objectives.

For efficient and effective management of protected areas we need to:

- define clearly, how we want to build the PA network and what are the goals of PA management;
- have the resources and means to reach those goals, to measure and assess performance and to adapt management in a changing environment;
- work with stakeholders and build partnerships;
- invest in our staff to ensure the best available knowledge, capacity and motivation.

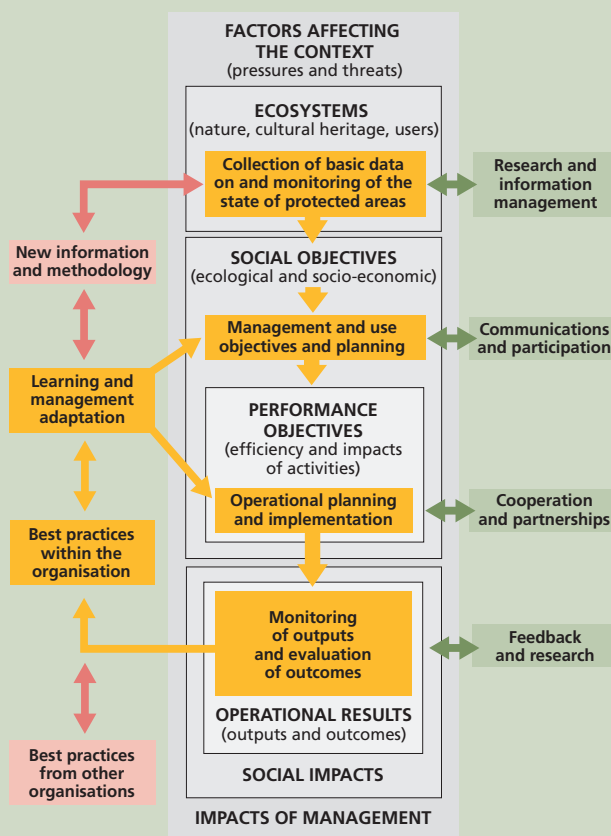
Management of protected areas is based on comprehensive data and best available scientific information, starting from conservation values and the pressures and threats affecting them. Planning takes into account the social objectives assigned to PAs at the time of establishment. Management performance is continuously improved using wide-ranging ways of external feedback, monitoring and evaluation.

Getting to know the values and users of protected areas

Basic data is collected on natural, cultural and recreational values of protected areas as well as their use and users. Terrestrial habitat types have been mapped thoroughly in almost 90% of established PAs and data on designated areas is continuously updated and supplemented. Underwater inventories were started in 2003 on Finland's southern and western coast as part



The VELMU Inventory Programme for the Underwater Marine Environment covers the entire Finnish coast and will continue until 2014. (Photo: Metsähallitus)



The cycle of adaptive planning and management of protected areas operates within a wider social context.

of the Baltic Sea Protection Programme. Habitat types considered important by the European Union in the Habitats Directive cover nearly half of forests and mires and a third of fell areas within the established PAs.

Altogether 12,000 sites of threatened species found on land administered by Metsähallitus have been registered. Metsähallitus has national responsibility for a few dozen species. Best known flag-ship species are the Saimaa ringed seal, the golden eagle and the white-backed woodpecker, but the populations of many threatened vascular plants are also monitored and their habitats are actively managed.

Surveys of landscape and built cultural heritage in PAs were increased and antiquities registered by the National Board of Antiquities are now available to management planners through our information systems. An action plan has been drafted to enhance cultural heritage management in the PAs.

Baseline information for PA management will be reinforced by inventories of natural and cultural values and by regular visitor surveys. To support PA management and monitoring, common efforts will be made together with the environment administration to further improve the overall information management systems. Cooperation with scientists and research bodies will also be boosted.

Management planning is progressing

Management plans outline management actions in protected areas, integrate different uses and direct or restrict utilisation so that conservation values will not be jeopardized. Plans are drafted for a decade and their realisation is monitored and evaluated every five years.

Metsähallitus recently revised and unified management planning methods. New natural resource plans cover State-owned land almost entirely. Landscape ecological planning has increased connectivity of the PA network by developing ecological corridors and buffers in commercially-managed lands. PA management planning is now more target-oriented and the planning process more efficient than before. The total planning effort and stakeholder participation has also been increased, especially in Lapland.

Over 60% of statutory management plans have been approved, including those of most national parks and national hiking areas and a third of the wilderness reserves. In order to implement the Natura 2000 network several hundred new management plans are to be drafted. The NHS aims at having management plans ready for all the most important PAs by 2012. Planning processes will be developed to encompass larger planning areas than today and clusters of small PAs using the ecosystem approach.



Native bird communities recovered in the Archipelago National Park after elimination of an alien invader, the American mink (*Mustela vison*), from outer islands. (Photo: Seppo Keränen)

Challenges in nature conservation and management

The majority of Finland's protected areas are in good condition. They are faced with few significant threats. Developments in the surrounding environment are continuously kept in check and efforts made to control pressures and mitigate threats. Action is taken also to restore and preserve natural values.



Research shows that controlled burning rapidly improves the ecological structure of forests that were formerly in commercial use and helps to restore and retain native flora and fauna in protected areas. (Photo: Jari Kostet)

In densely-populated southern Finland, the ecology of small nature reserves is affected by earlier land use, forestry in particular, and continuing pressures and threats from outside the PAs, as well as increasing infrastructure development. Biodiversity in aquatic environments is burdened with pollution load and eutrophication. Native species are hindered by alien invasive species, such as the American mink, which destroys bird communities in the archipelagos and wetlands.

In northern Finland, impacts of reindeer grazing in PAs are very wide-spread and effects of off-road traffic are locally significant. Climate change is seen as a long-term threat, especially in vulnerable fell habitats.

Nearly 24,000 ha of forests and mires in PAs have been ecologically restored. Some 1,400 ha of traditional agricultural biotopes in the PAs of southern Finland are under permanent biodiversity-promoting management. Ecological impacts of the management measures are followed systematically.

With some exceptions, the conservation status of Finland's 132 animal and plant species and 69 habitat types included in the appendices of the EU Habitats Directive is favourable, stable or recovering. Also most of the species populations, nationally assigned to Metsähallitus, have generally remained stable or recovered. A significant portion of the populations are found within the PAs. Active conservation measures focus mainly on species in need of urgent action.

National strategies and action plans will be drafted in the near future to encounter the spread of alien invasive species and to adapt to climate change, particularly taking into account the need to develop connectivity and ecological integrity of the PA network.

Keeping cultural heritage alive

Protected areas encompass a wide range of cultural heritage: landscapes shaped by nature and man, built cultural environments and immovable ancient relics. Selected landscapes are managed traditionally by mowing, grazing and slash-and-burn farming. A number of heritage farms keep alive old breeds of livestock and traditional working methods. Valuable buildings are being repaired, renovated and managed under direction of the National Board of Antiquities. New touristic uses for culturally valuable old buildings are sought to keep them up.

Metsähallitus is in charge of preserving the preconditions of sustainable traditional local cultures in PAs, particularly in the archipelagos and the homeland area of the indigenous Sámi in Lapland. Local people have rights to subsistence hunting and to practice traditional livelihoods in these areas. Reindeer husbandry is practiced in almost all wilderness and nature reserves of Northern Finland. The NHS offers its services also in languages of the Sámi and Swedish-speaking minorities.

In the future, the NHS aims to systematically assess the cultural values of PAs. Together with local actors, the NHS seeks to find solutions to PA management and use guaranteeing preservation of natural and cultural values and local livelihoods. Innovative ways are sought to preserve built heritage, and cultural sites are further developed as tourist attractions in protected areas.

Sustainable nature recreation and tourism

Protected areas receive more than 1.7 million visits yearly, most of which are concentrated in national parks located near tourism centres with other attractions, such as ski resorts. Other PAs with facilities serve local recreation. State waters and hunting grounds in the North are much used for pastime and livelihoods.

Nature tourism in most popular PAs is planned on the basis of regular visitor counts and surveys. Visitor monitoring is active in all national parks, hiking areas and other popular PAs. Visits to national parks have escalated for a decade and an estimated growth of 3-5% will continue. Over 90% of the growth is in parks close to major tourism centres. Nature tourism inputs and impact monitoring are focused on these PAs and actions planned in cooperation with local communities.

Special emphasis is placed on the ecological and socioeconomic sustainability of PA recreational use. The principles of sustainable nature tourism have been adopted by the NHS and its partners and impact meas-

ures have been developed on the basis of the principles. Hunting and fishing quotas are based on scientific data and efficient information management systems to ensure that use of these natural resources is sustainable and does not endanger conservation values of the PAs, in case such activities are legally allowed. Off-road traffic is guided to tracks and routes, preferably outside PAs. Land use pressures are controlled by permits and access to PAs is supervised.

Also in the future, facilities will be built on demand and maintained systematically. Impact monitoring and reporting of recreational use will be further developed. The aim of the NHS is to establish monitoring of ecological sustainability as a regular part of tourist area activity.



Sustainable nature tourism means that the environmental impacts of recreational services and preservation of local cultures are taken into account. (Photo: Pia Arvola)

Protected areas are part of society

In Finland, protected area networks are constructed by broad-based cooperation. Land owners get full financial compensation for conservation of their land and are able to participate in the planning and management of the sites. Local communities participate in PA management planning on State areas. The Sámi Parliament has a statutory right to influence all land use decisions concerning the Sámi homeland area. Every citizen is also given an opportunity to express his opinion on PA management.

Protected area management involves multilevel cooperation with authorities, stakeholders and NGOs on an everyday basis. The NHS also formed a multitude of partnerships in over 60 EU-funded projects in 2001–2005. Activities included habitat restoration and species conservation, coastal PA management planning, enhancement of nature tourism, environmental education and development of PAs in rural and transboundary areas. Especially significant is the long-term



Nature becomes familiar by close observation in the middle of Siikalahti Nature Reserve. Visitor centres offer exhibitions, ready-made programmes and materials for schools. (Photo: Jouni Koskela)

twin-park cooperation in the border zones with Russia, Norway and Sweden.

The PAs offer society many kinds of ecological, cultural, social and economic benefits, i.e. ecosystem services. The PAs have a vital role in the wellbeing of remote communities, especially in eastern and northern Finland. The regional socioeconomic impacts of nature tourism around the most popular PAs amount to an annual total of 250–300 million euros and employment of 3,500 man-years.

PAs have an important role in nature education and awareness-raising of citizens as well as in scientific research. One third of the 26 NHS visitor centres near national parks are run in collaboration with local partners. Some 800,000 visits to these centres are registered annually and 60,000 visitors take interpretation tours. Visitor satisfaction has stayed at a high level. Motives bringing visitors to parks are well surveyed, but very little is yet known about the impacts of nature experiences, in terms of attitudes towards PAs or nature conservation in general.

In the future, the NHS will further develop ways of partnering, stakeholder participation and measuring of visitor impacts. The aim is to show by monitoring and research the societal impacts of protected areas on local communities and to increase interest toward the PAs and support to their management.

A capable and motivated staff

State-owned protected areas are managed by 340 permanent and some 700 seasonal employees in the Metsähallitus NHS, working an annual total of about 600 man-years. Valuable contributions are made also by employment programmes particularly in northern Finland and by volunteer workers especially in protection of species. Of the total work input, one fifth is nature conservation, and nearly half is related to recreational services. Management planning as well as fishing and hunting tasks together make up a tenth of the total input.

According to the regular personnel surveys, NHS staff is committed and motivated. Leadership and well-being of workers are valued and satisfaction on the job has long remained fairly good. Each employee is entitled to proper guidance and opportunity to develop skills. Personal goals are linked to those of working teams and regional units.

The level of education is high and practical training is systematic. Best practices gained by experience are systematically distributed within the organisation. In the future the NHS will increase staff skills in property management, care of cultural heritage, management of wetlands and waters, marketing of recreational services and skills involved in international cooperation.

Publications are available in electronic format:

Heinonen, M. (ed) 2007: State of the Parks in Finland. Finnish Protected Areas and Their Management from 2000 to 2005. Nature Protection Publications of Metsähallitus. Series A 160.

• www.metsa.fi/sop

Gilligan, B., Dudley, N., Fernandez de Tejada, A. and Toivonen, H. 2005: Management Effectiveness Evaluation of Finland's Protected Areas. Nature Protection Publications of Metsähallitus. Series A 147.

• www.metsa.fi/mee

Hildén, M., Auvinen, A.-P. and Primmer, E. (eds.) 2005: Evaluation of the National Action Plan for Biodiversity in Finland 1997–2005. Finnish Environment 770. In Finnish with English summary.

• www.ymparisto.fi

Cover: Autumn hikers in the Pallas-Yllästunturi National Park. The park was extended and re-established in 2005. Today it is one of the largest and, with over 300,000 annual visitors, also one of the most popular of the Finnish national parks. (Photo: Paavo Hamunen)

Text: Mervi Heinonen © Metsähallitus 2007
1,000 copies — Lönnberg Print, Helsinki 2007

