# Forest and Nature **NEWSLETTER** winter 2005-2006

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# Forest and Nature in Northwest Russia

**Finnish-Russian Development Programme on Sustainable Forest Management and Conservation of Biological Diversity in Northwest Russia**

With the ”Forest & Nature Newsletter 2006” the Finnish Coordination units of the Sustainable Forest Management and Conservation of Biological Diversity in Northwest Russia (NWRDP) want to wish all our readers a Happy and Successful Year 2006!

In a nutshell, the Forestry Section of the program concentrates on developing education structures in forest management, whereas the Nature Conservation Section focuses on developing the network of protected areas in Northwest Russia.

The aim of the annual ”Forest & Nature Newsletter 2006” is to inform you about projects in the forest management and nature conservation cooperation. You can read about on-going projects, get acquainted with experts and potential new partners in NW Russia regions, and assess the results and plans for further cooperation.

After starting a new phase of the program in the year 2005, we have renewed the visual look and the homepage of the Newsletter. The editorial group welcomes all comments on the content and readability as valuable information for our future work.

Looking forward to good cooperation in 2006!

Author: V.A. Efimov, Project Manager, Ural branch of the Institute of Ecological Problems in the North (Russian Academy of Science)

# Inventories of the natural complexes, biodiversity and cultural heritage of Kozhozero Nature Park in Archangel Region

In the years 2003-2004, in the framework of the Finnish-Russian cooperation, the Ural branch of the Institute of Ecological Problems in the North (Russian Academy of Science), according to the agreement with Finnish Environment Institute, carried out a project called ”Inventories of the natural complexes, biodiversity and cultural heritage of Kozhozero Nature Park in Archangel Region”.

The project was a part of the nature conservation projects of the Finnish-Russian Development Project on Sustainable Forest Management and Conservation of Biological Diversity in Northwest Russia, bilateral cooperation in developing the network of protected areas between the administration of Archangel Region and the Finnish Ministry of Environment, protection of biodiversity and following the recommendations of the International ecological expedition to Kozhozero in August 1999.

Lake Kozhorero (Photo: A.N. Tretyakov)

The Kozhozero Nature Park (of regional status) is situated in the Northwest parts of Archangel. The area of the Nature Park is 201 600 ha.

The area presents a special scientific interest since the area is mainly unstudied. The project was carried out by the researchers of the Ural branch of the Institute of Ecological Problems in the North (Russian Academy of Science), Karelian Research Centre (Russian Academy of Science), Pomore State Pedagogical University, and the specialist of Archangel Forest Expedition. Information about the biota, natural complexes and cultural heritage of Kozhozero was gathered with the help of scientific literature and field studies.

Geographically, the area of the Nature Park is situated in the junction of the Russian plain and Fennoscandia. As a consequence, landscapes are varied, natural complexes are mosaic-like, ecosystems and biotopes are diverse, and the biodivertity rate is high. The area is unique for studies on Precambrian geography. Due to their geological, geomorphological and aesthetic characteristics, 9 natural objects, worth the status of nature reserve and in need of protection and research, were selected: Padun Rapids on the river Kozha, Verhnekolozero Canyons, Lopsky Peninsula, Hozero Hills, Scheleinyi Bor Hills, Olenyi Rog Rapids on the river Podlomka, dwelling sites of Venda people on the river Nikodimka, chain of lakes ”Krivoi Poyas” and Ruman-Gora Hills.

The forests of the Nature Park, with the area of 190 000 ha, are of special importance to the area. Due to the complex relief and well-developed water system, the forest massif forms a rich mosaic of different kind of forests. More than 51% of the forests are well-preserved old-growth forests that have been formed during the last 400-600 years. These unique forests protect the biodiversity and biological reserves and promote sustainability of the biosphere. Most of the forests (58 %) are spruce forests, characterised by continuous decomposition, large amount of dead wood and regeneration. Together with the low-production pine forests of the Vodlozero National Park, the forests of Kozhozero (dominated by spruce) form a valuable forest massif (about 700 000 ha) in Eastern Fennoscandia, contributing to its biodiversity. The forest massif have all the characteristics of well-preserved old-growth forests as well as forest management, hence playing an important role in describing the natural history of Northern Europe.

Mires, an important part of the landscape, occupy about 30 % of the territory of the Nature Park. There are about 10 different types of mires in the Nature Park, including relatively common aapa mires of Onega-Pechora and Karelian types (the latter being the first type described in Archangel Region). The most Western habitats in the Northwest Russia of the Western species *Molinia caerulia* are found in the territory of the Nature Park. The waterlogged aapa mires, consisting of rare communities with dominating species *Phragmites australis* and *Scorpidium scorpioides*, are found in Archangel Region only on the islands of the archipelago of Solovetsk.

The flora of the aapa mires and eutrophic (flat) mires is diverse, including more than 20 rare plant species. The mires are dominated by grasses mosses, and they are formed in places of exposures of ground water.

The flora of the Nature Park consists of 484 species of vascular plants from 83 families and 234 genera. In the different Red Data Books, 60 species are mentioned: 7 in the Red Data Book of Russia, 41 in the Red Data Book of Archangel Region and 38 in the Red Data Book of Fennoscandia. Only two of the

►

species, *Epipogium aphyllum* and *Carex tenuiflora*, need special protection and monitoring of the population in the territory of the Nature Park. 13 types of key habitats have been described for the protection of the vascular plants. The most endangered habitats mires, dominated by grasses and *Hypnum* mosses.

The preliminary results from the Nature Park show that there are 183 species of mosses from 31 families and 76 genera, 14 of which were new to Archangel Region and 24 were found for the first time in the Southern floristic region.

In the studies, 196 lichen species and sub-species from 42 families and 76 genera were found. The majority of the lichens are boreal species (52 %). Most of the species are epiphytic macrolichens or lichens that grow on bare soil, i.e. typical species for well-preserved boreal forest ecosystems. Also, two species included in the Red Data Book of Russia (*Bryoria fremontii* and *Lobaria pulmonaria*) and 14 species included in the Red Data Book of Eastern Fennoscandia were found.

157 species of basidiomycetes were found on the territory of Kozhozero Nature Park, including rare species: *Amylocorticium subincarnatum, Haploporus odarus, Ischnoderma benzoinum* and *Parmastomyces mollissimus*. 96 of the species were found for the first time in Archangel Region. The valuable and unique forests of the Nature Park are characterized by 30 indicator species for well-preserved forests. *Hericium coralloides* is a red-listed species in the Red Data Book of the Former Soviet Union and *Hydnum repandum* is in the Red data Book of the Republic of Karelia.

The fish fauna of the water systems has 20 species from 5 groups and 9 families. The fish belong to three fauna complexes: Fauna of boreal plains, fauna of boreal areas close to the mountains, and fauna of Arctic fresh-waters. Arctic salmon and pink salmon are migrants, and whitefish is a semi-migrant. The rest of the species are typical fresh-water species.

Peatland in the Kozhozero Nature Park (Photo: V.N. Mamontov)

According to the results of the ornithological studies, there are 164 species, 125 of which are nesting, in the territory of the Nature Park. The average sum of the density of birds is 91-124 pairs/km2. The occurrence of birds is not evenly distributed, especially in the borderlands.

33 species of birds included in the Red Data Book of Russia and Red Data Books of the areas in the Northwest boreal forests nest in the territory of the Nature Park. On the basis of the ornithological criteria, Kozhozero Nature Park should be included in the list of key ornithological areas of international importance. The area is an important reserve for endangered, native boreal forest species, and also an important breeding ground for aquatic birds, and birds habitating waterfronts and wetlands.

The mammal fauna consists of 36 species, mostly native species for well-preserved boreal forests in Europe. The Nature Park is an important habitat for the wild forest reindeer and wolverine, a predator rare in most of the areas. The inexplicable and catastrophic decline in the number of the wild forest reindeer is especially alarming.

Rocks in Kozhozero Nature park (Photo: A. N. Tretyakova)

The studies conducted lead to the preliminary results on the main components of the biota of Eastern Fennoscandia. The biota of Kozhozero Nature Park can be characterised as typical diverse and well-preserved old-growth forests.

The cultural and historical heritage of the Nature Park is rich owing to the Kozhozersky Monastery that dates back to the 16th Century. The Kozhozersky Monastery is the only monastery in the European parts of Russia where the tradition of hermitary continues.

Due to it's rich and well-preserved cultural and natural heritage, Kozhozero Nature Park should be given the status of International Nature Reserve. Unfortunately, for un-know reasons Kozhozero Nature Park was reorganised as Kozhozero State Landscape Reserve by a decree number 218 (December 29th) from the administration of Archangel Region, which worsened the status of the protected area. At the moment, a collection of scientific articles is being prepared on the basis of the collected material in Kozhozero, planned to be published in 2006. ■

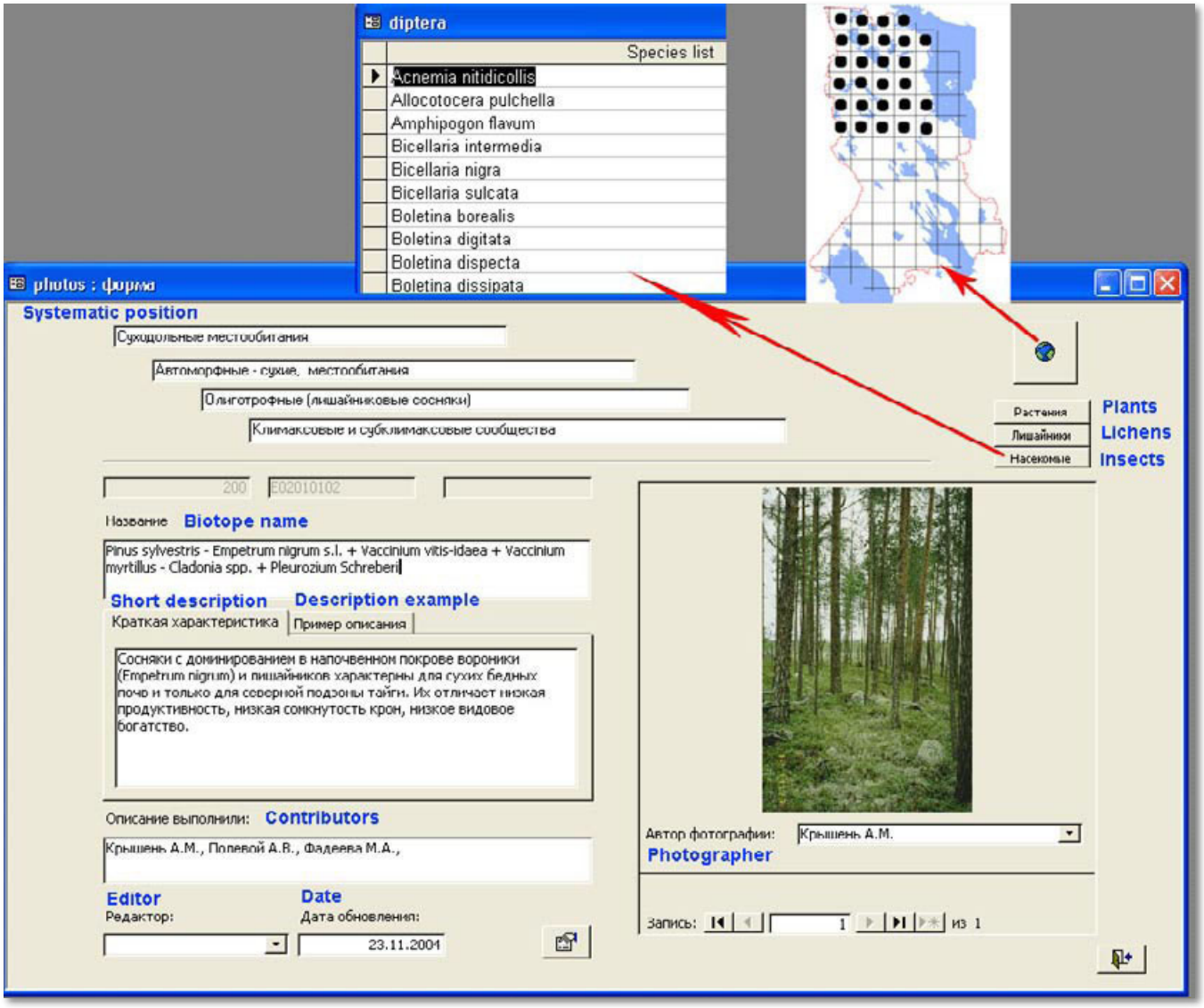
Authors: Alexander Kryshen, Project Coordinator (left) and Alexei Polevoi, Leading Expert (right)
Forest Institute of the Karelian Research Centre (Russian Academy of Science)

# Database “Habitats of East Fennoscandia” for virtual collections and nature conservation planning

The term habitat is defined as an area of land or water inhabited by an organism, group of individuals of a species or a biocenosis, and possessing all the conditions necessary to maintain their existence (climate, topography, soil, food, etc.).

In the 1990s, Karelian territory was included in the “CORINE-biotopes” project, within which an inventory of habitats existing in Karelia was done following the pattern suggested by ”CORINE”. The experience of using the resulting database has demonstrated that ”CORINE-biotope” approaches do not ”work” in Karelia, and the database itself hardly covers a half of the existing habitats. On the other hand, the idea of creating a habitat cadastre as such proved to be quite good, given that the recently compiled floral and faunal databases lack a plain and logical habitat scheme permitting easy systematic placement of the sampling site or location of the find of a rare species. Standard labels of biological specimens now comprise: the geographical position (easily formalised by stating the coordinates or the nearest geographical object appearing in the map, district, etc.), date when gathered (formalised by definition), the person who gathered and identified the specimen (formalised), and the ecological settings (habitat). Thus, it is only the habitat conditions that have not been formalised yet. Thus one of the main purposes of the project is to develop logical and easy to use habitat classification.

There currently co-exist several classifications of plant communities of Karelia and adjacent regions (e.g., F. Yakovlev’s, V. Voronova’s classification of forests, M. Ramenskaya’s classification of meadows, O. Kuznetsov’s classification of mires, etc.) They were all designed for individual types of communities and cannot be integrated because of the difference in the classification methods. ►




Database layout, including information about the habitats

# Database "Habitats of East Fennoscandia" for virtual collections and nature conservation planning

The key idea of proposed classification is as follows: habitats are grouped according to biotope and vegetation features; in addition, the anthropogenic and zoogenic impacts are taken into account. Habitat types are arranged hierarchically, the top unit being the habitat class. Six habitat classes are distinguished: 1) sea and sea coast; 2) lakes and shore habitats; 3) rivers, streams and riparian habitats; 4) terrestrial habitats; 5) mires and paludified land; 6) anthropogenic habitats (exposed to constant human impact).

The basic unit of the classification (habitat type) is named according to the dominant species or one-two characteristic species, in polydominant communities. We used the most comprehensible community notation, clear even to laymen in geobotany: the dominants are stated for each layer, layers are separated by a hyphen; if a layer has several dominants, they are stated and separated by the "+" symbol. E.g.: *Pinus sylvestris + Picea abies – Vaccinium myrtillus – Pleurozium schreberi + Hylocomium splendens* indicates that the tree layer is dominated by pine and spruce, bilberry prevails in the herb-dwarf shrub layer, and *Pleurozium scheberi* and *Hylocomium splendens* – in the moss-lichen layer.

Three more categories are distinguished between the habitat class and habitat type. There are no common criteria for identification of intermediate categories (subclasses), except that they should be understandable and physiognomically distinguishable in the nature. For some categories these may be ecotope features (sea depth, bedrock outcrops and composition, etc.), for others – human impact categories (quarries, village, residential area, hay meadow, etc.), or indication of the succession stage (climax or subclimax communities, cutovers, young stands). E.g.: Sea and sea coast – Supralittoral – Cliffs – Vegetated – *Rhodiola rosea* (community dominated by the golden root on supralitoral cliffs of the sea coast).

For now development of the classification scheme is completed and new data are constantly appended. Database management system realised in MS ACCESS environment. The database is searchable by hierarchy, key words (species) and illustrations. The plans for the future are to include data on fungi, mosses, various groups of animals, as well as to add geographical referencing of the habitats. By cross-linking the checklists, we will get a database providing a detailed description of the Karelian biota, permitting identification of rare biotopes, as well as habitats of rare plant and animal species.

Project is financed by the Finnish Ministry of Environment and additionally supported by Russian Foundation for Basic Research and the Russian Academy of Science programs. ■

Authors: A.V. Palanov, Coordinator (picture) and A.B. Chhubadche, Senior Expert, Vologda State Pedagogical University

# Species Diversity and Biodiversity of the Protected Areas in Vologda Region

The organization responsible for the project in Russia is the Vologda State Pedagogical University.

In the year 2005, the landscape reserves of ”Unzhenski les” and ”Sysoevski bor”, representing key areas in the Southern boreal forests were studied. The before-mentioned landscape reserves were selected as key areas in studying the forest biotopes by the following criteria:

**”Unizhenski les”** (established as a protected area in 1985)

- large forested areas of the Verhne-Unzhenski landscape with a diversity of geological and geo-morphological conditions
- diversity in biotopes, characteristic of the Southern boreal forests in the Vologda Region
- native and almost native plant communities of the Southern boreal forests
- rare plant species in typical plant communities of the Southern boreal forests
- small human impact on the valleys of River Unzhi

**”Sysoevski bor”** (established as a protected area in 1993)

- large forested area on the Galichkaya Hills in the watershed area
- diversity in pine and spruce forests, formed as a result of relatively intensive forest management during the past 100 years
- rare plant species in typical plant communities of the Southern boreal forests
- rare plant species
- relatively high pressure from the regional centre nearby

The results of the project can be summarized as follows: Extensive field work has been carried out in the areas of ”Unzhenski les” and ”Sysoevski bor”. In the key areas, 141 geobotanical surveys were made. The characteristics of the landscape, soil type, plant community, tree crown density, dominating species in the ground vegetation, rare species and number of plant species were defined on each site. Also, the structure of the landscape was described. The diversity of the forest and the species content of rare plants were defined. Finally, a preliminary list of the flora was written, with 190 species in ”Unizhenski les” and 230 species in ”Sysoevski bor”. Mosses and wood-sorrel *(Oxalis acetosella)* dominate in both of the areas. The data were transferred to electronic form for fur-ther studies on the diversity of the biotopes. ■

River Unzha, demarcating the border of the ”Unzha landscape reserve”

Forest dominated by spruce and pine in ”Sysoevski bor” landscape reserve

Author: O.L. Kuznetsov, Head of Wetland Ecosystems Laboratory
Institute of Biology of the Karelian Research Centre of the Russian Academy of Science

# International symposium from August 30th to September 2nd in Petrozavodsk on "Mire Ecosystems in Northern Europe: Diversity, Dynamics, Carbon Cycle, Resources and Conservation"

Institute of Biology of the Karelian Research Centre of the Russian Academy of Science, together with Finnish Environment Institute organized an international symposium on "Mire Ecosystems in Northern Europe: Diversity, Dynamics, Carbon Cycle, Resources and Conservation" from August 30th to September 2nd 2005 in Petrozavodsk. The symposium was carried out within the Finnish-Russian Development Programme on Sustainable Forest Management and Conservation of Biological Diversity in Northwest Russia. The Finnish Russian Development Programme has drawn attention to the research, protection and rational use of mires in Northern Russia, especially in the republic of Karelia. The participants of the symposium consisted of about 70 researches from academic institutes and universities in Finland, Norway and Russia (Petrozavodsk, Moscow, St. Petersburg, Tver, Vologda, Syktyvkar, Izherska and Chelyabinsk). The Finnish participants consisted of specialists from Finnish Environment Institute, Helsinki and Joensuu Universities, Geological Survey of Finland, Russian-Finnish Friendship Park and Metsähallitus.

Surface of a mire (Photo: Tapio Lindholm)

Kimmo Tolonen and Seppo Eurola admiring mosses (Photo: Raimo Heikkilä)

In the course of the two-day symposium, 22 presentations and 20 posters concentrating on the topics of the symposium were presented and discussed both by leading specialists and students. Also, results from the joint projects of the Finnish-Russian Development Programme were presented. It is worth mentioning that the participants represented three generations of researchers: internationally acclaimed specialists on mires and paleoecology, such as the Finnish professors Rauno Ruuhijärvi, Seppo Eurola, Yrjö Vasari and Kimmo Tolonen, member of the Russian Academy S.E. Vomperski, academics T.K. Yurkovskaya (PhD), G.A. Elina (PhD), S.M. Novikov (PhD), active 40 to 50 years old researchers, and a group of young researchers and post-graduate students. Professor Ruuhijärvi and the academic Tatyana Yurkovskaya, both born on the 4th September, received heartfelt congratulations from the other participants in the evening gathering of the symposium. The symposium served as a place for establishing professional contacts for the future, too.

On September 1th there was a field excursion to an interesting forested mesoeutrofic mire that is situated 30 km West from Petrozavodsk, in the vicinity of the motorway from Murmansk to St. Petersburg. The mire, developed on the shore of a large lake, is exposed to exposures of ground water with high iron contents which affects the flora, vegetation and statigraphy of the mire. The maximum thickness of the peat layer is about 6 meters, and there are several layers of mineralized peat in the peat layer. The flora of the mire is characterized by a series of rare and endangered plant species (*Saxifraga hirsulus, Rubus humulifolius, Epipactis palustris, Stellaria crassifolia, Poa alpigena* etc.) The participants of the symposium received a guidebook on the mire with prescriptions of the mire and its statigraphy, as well as a list of vascular plants and mosses in the mire. Several questions about mires and ecology were discussed in small groups during the field excursion. On September 2nd part of the participants visited the Kizhi museum and the grass-dominated lakeside mires of the Kizhi island.

All the participants agreed that the symposium had been successful. Similar big meetings of Russian and Northern European specialists on mires have not been organized before. ■

Author: Minna Hartikainen, Project Assistent, Finnish Environment Institute

# International Habitat Contact Forum

Jan-Petter Huberth Hansen conquering the Urals (Photo: Bjørn Frantzen)

The fourth international Habitat Contact Forum in Syktyvkar, Komi Republic, from September 19th to 25th 2005, gathered more than 140 participants from scientific institutes, environmental administration, private sector and NGOs from Russia, Finland, Norway, Sweden, Holland, Germany and Estonia to discuss nature protection, environmental administration and different scientific topics in the Barents region.

The fourth international HCF meeting consisted of a three day seminar followed by excursions to Mondi Business Paper, biological station of the Institute of Biology of the Komi Science Centre in Lyali, model forest ”Priluzhe” of Silver Taiga Foundation or Yugyd-va national park on the Ural mountains. The meeting concentrated on protection of old-growth forests, protected areas network in the Barents region, monitoring and conservation strategies and social and cultural aspects of environmental protection.

The final resolution of the meeting was delivered to the ministers of environment in the Barents region in a ministerial meeting in Rovaniemi, Finland, in October 2005. The participants emphasized the importance of creating a representative network of protected areas and underlined the necessity of strengthening effective managements of the protected areas. The Barents Euro-Arctic Council is asked to support the development of protected areas and the cooperation between protected areas, and the Green Belt of Fennoscandia.

The Finnish participants of the HCF meeting participated in the excursions to the biological station of the Institute of Biology, to the model forest ”Priluzhe” and to Yugyd-va national park.

The excursion to the model forest showed clear indications to the interest and professionalism in sustainable forestry in Komi Republic. The project ”Silvertaiga” has proved that ecological aims and forestry can be combined if there is constructive dialogue between forestry and nature conservation. The project of ”Silvertaiga” and its partners could serve as a model to forestry projects in other parts of North-West Russia, too.

The excursion to the Yugyd-va national park took the participants to the largest area of pristine forest in the boreal forest zone of Europe. The helicopter ride provided a general overview of the oil fields, meandering rivers, endless peatlands, mountain valleys and snow-topped hills of the Urals. In the cabin of Gazprom, ”the hills were alive with the sound of music”.

The arrangements of the fourth HCF meeting were carried out with enthusiasm and interest in the cooperation in the Barents region by the Institute of Biology of Komi Science Centre, local people and administration of Komi Republic. The head of the republic invited the participants to a coctail party at the city hall, and the participants were entertained by the performance of the folk song and dance company ”Asya Kya” at the Komi Philharmonics. The meeting was concluded by wining and dining in the best restaurant of Syktyvkar.

The schedule of the meeting was tight – listening to 50 presentations is enlightening, but a lot of work, too! However, to prevent the HCF meeting from developing to a scientific meeting where the interaction between nature conservation and environmental administration is neglected, it is necessary to reassess the role of the meeting as a contact forum, a meeting point to scientists, nature conservationists and environmental administrators in the Barents region. ■

Riitta Nykänen, Jan-Petter Huberth Hansen, Ellen Arnberg and Riitta Hemmi in the spirit of the International Habitat Contact Forum (Photo: Timo Hokkanen)

Juri Pautov presenting the Silvertaiga model forest (Photo: Timo Hokkanen).

Author: Tatyana Kovaleva, Director, Directorate for Protected Areas of the City of St. Petersburg

## Photograph Album

# ”Nature in the Protected Areas of St. Petersburg”


Cover of the photograph album ”Nature in the Protected Areas of St. Petersburg” (Photo: GeoPhoto)

Photograph album ”Nature in the protected areas of St. Petersburg” is written and published with the intention of protecting the biodiversity and landscapes in a city, attracting public attention to problems related to the protection of nature areas, and informing the citizens about the natural heritage of St. Petersburg.

The publication is dedicated to six protected areas, nature reserves and natural monuments in the territory of the city of St. Petersburg, covering an area of more than 2,000 hectares. All of the protected areas represent well-preserved and valuable natural complexes, as well as rich cultural and historical heritage. The natural monuments of ”Sergievka Park” and ”Dudergof Heights” are included in the list of UNESCO World Heritage sites as a part of the historical centre of St. Petersburg and its surroundings.

The project was lead by the Directorate of protected areas in St. Petersburg and the Committee of land use of the government of St. Petersburg, and the publication was edited by geographist D.A. Golubeva (PhD). The photograph album reveals the high cultural, historical and natural values of the protected areas in St. Petersburg, and the diversity and richness of its natural complexes and objects. The six chapters, written in Russian, are dedicated to the history of the protected areas. The chapters begin with short Russian and English descriptions of the natural complexes, and the flora and fauna of the protected areas.

The illustration plays an important role in the publication: there are over 300 artistically and technically skilful colour photographs in the publication. Professional photographers from ”Geophoto” that specialises in nature photography captured all the seasons in their photo sessions in the protected areas. The aesthetic approach of the book is strengthened by the poems of well-known Russian poets.

The photographic album was commissioned by the Committee of land use, nature conservation and ecological safety of the government of St. Petersburg. The preparations for the publication were financed by the Finnish Ministry of Environment.

The album ”Nature in the Protected Areas of St. Petersburg” was printed in a quality printing house called ”Ivan Fedorov”. The edition was 2,000 books. ■

Strelna coast nature monument in St. Petersburg (Photo: GeoPhoto)

Yuntolovski nature reserve in St. Petersburg (Photo: GeoPhoto)

# Development of the Normative Basis of Sustainable Forest Management at Region Level (Leningrad Oblast')

## Background

At present, there is an intensive process on developing of a new forest policy in Russia, including the new Forest Code and related forest norms as part of a wider development process. Renewal of forest administration as a part of reorganization of forestry sector is starting. Leningrad region has been selected as a pilot region, followed by other regions in the Northwest Russia.

Unsatisfactory results of forest regeneration, low annual cut from thinnings, problems with saving key biotopes and valuable nature objects in forestry operations, absence of involvement of local people to forest planning process call to revise norms/rules for the intensive model of forest management meeting ecological, social and economic requirements. Trained personnel, familiar with a sustainable and intensive model of forest management in both Regional Forest Agency and wood procurement companies, will be needed for application of developed norms/rules into practice and dissemination in Northwest Russia.

# Development of the Normative Basis of Sustainable Forest Management at Region Level (Leningrad Oblast')

## Objectives

The project purpose is to develop a system of forest management norms for a more intensive model of forest utilization in the Leningrad region.

Prototype of the intensive forest management model will be developed together with draft guidelines for forest regeneration, final cutting, commercial thinning, tending of young stands, environmental planning management. Tense cooperation between project beneficiaries, project partners and other stakeholders is crucial in all stages of the project.

## Results

The main results of the project will be the following:

1. Technical report I – Results and lessons learnt from the similar projects implemented earlier
2. Technical report II – Analysis of existing logging and regeneration techniques and technologies used in the Leningrad region and Finland
3. Technical report III – Review of rules and regulations effective in Russia and Finland
4. Survey of models of intensive forest management developed in Russia
5. Normative basis developed for intensive model of forest management in the Leningrad region
6. Training material produced on the base of developed normative documents
7. Training of target groups on the organized seminars and continuation of training after the project has secured
8. Project results disseminated to the other regions in Northwest Russia

## Partners

The expert team from the Finnish side consists of experts from the Finnish Forest Research Institute (FFRI), research units in Joensuu, Vantaa, Kannus and Suonenjoki, Continuing Education Centre of the University of Joensuu, and Kuru Institute of Forestry and its sub-unit International Forest Machine Operator Training Centre in the Leningrad region. From the Russian side, project partners represent forest administration, forest research and training, forest management planning as well as the forest industry of the Leningrad region. ■

## Forest Sector Capacity Building Program, Project 2

# Improved educational structure and training delivery system in the forest sector at the regional level

**The tasks of project nr. 2 are:**

Ensuring sufficient further training for forest sector stakeholders in Northwest Russia requires the development of relevant training delivery systems; i.e. clear definition of the roles and responsibilities of the training institutions depending on target groups and subjects of training. Therefore, the Programme will support the process of clarifying and further developing the training delivery systems. The training delivery system will be first studied in the Arkhangelsk Region, and a replicable model will be developed for the other regions based on the findings. Concretely, this Programme Component will include the following:

- Training need's assessment of forest sector managers, experts and workers was carried out in 2001. As the first step, this training needs' assessment will be updated through a) quantifying the training needs per main target groups and subjects, and b) deepening the analysis content based on the qualitative interviews among clients and other stakeholders in the region.
- Analysis of the potential training providers in the Arkhangelsk Region; training institutions and their potential for various subjects and target groups,
- Elaboration of a strategy plan for the training delivery system in the Arkhangelsk Region; clarification of the roles and division of work of academic and professional educational institutions, identification of the main development needs,
- Development of a generalised model for training delivery in the regions of the Northwest Russia.

As the first step Silveco ltd and a group of local experts carried out the study of training delivery systems in Archangelsk region during winter 2004-2005. The report from Archangelsk region includes among others an analysis of both qualitative and quantitative training needs, analysis of existing continuous training and several proposals and recommendations to improve the training capacities and skills in continuous training of forest sector. Similar studies will be accomplished in the regions of Murmansk and Leningrad and in Karelian republic before the end of year 2005.

To give a picture of the problem area met during the studies, there is following a swot-analysis of existing continuous training in the forest sector in Archangelsk region. It is fair to assume that the problems/results are of similar type also in other regions of Northwest Russia. ■

### SWOT-analysis of existing continuous training in the forest sector in Archangelsk region

**S (Strengths)**

- Existing organizations
- Permanent staff
- Suitable location
- Training capacities (equipment, classes)
- Connection with the state structures

**W (Weaknesses)**

- Low provision of continuous training
- Mixed responsibilities among the training institutes
- Training is too theoretical compared to the needs of working life
- Lack of or outdated working experience among permanent teachers
- Weak or insufficient contacts with the working life
- Supply doesn't meet demand
- Poor knowledge of the English language
- Poor marketing of training services
- Lack of training motivation among the companies' personnel

**O (Opportunities)**

- Increasing cooperation between the training institutions
- Active marketing of training services
- Increasing demand for training services
- Use of international experience
- Reasonable combination of the various forms of training
- Development of tutors' system

**T (Threats)**

- Danger of formal training implementation
- Forest sector's enterprises organize training activities by themselves

# Training Programme for the Top-Management of State Forestry and for the Managers and Specialists

In September 2005 Savcor Indufor Oy signed an Agreement on implementation of the projects ”Training program for the Top-Management of state forests” and ”Training for managers and specialists” within Forest Sector Building Programme in Finnish-Russian Development Programme on Sustainable Forest Management and Conservation of Biological Diversity in Northwest Russia (NWRDP III). The main aim of the whole Project is to organize a training Programme for the Top-Management of State Forestry and for the Managers and Specialists.

The whole project is divided into two subprojects. ”Training program for the Top-Management of state forestry” project purpose is to provide support to the development of stable market relations in forestry through training high-qualified managers enabling them to carry out business activities in forestry particularly in state forestry.

The aim of the project ”Training for managers and specialists” will be to provide training for managers and experts, which will enable them to execute successful business activities in forestry. This will occur by making available further training courses for managers and specialists, testing and piloting them and developing them further including the preparation of relevant educational material.

The whole project is going successfully forward as planned. Project coordinators from Savcor Indufor Oy visited Pushkino´s (Moscow) All-Russian Institute of Continuous Education in Forestry (ARICEF) and agreed about participation of Finnish experts in training program for the first group of top-managers. Also two weeks Study tour to Finland in January 2006 was discussed. During the visit Russian trainers got the information concerning the whole project and its subprojects. Russian trainers asked plenty of questions about Finnish Forestry and Finnish Forest and Park Service’s activities. Also the question of private Forest ownership was of great interest.

In October the experts of Finnish Forest and Park Service and Forelia visited Pushkino. They gave lectures for the Russian trainers about Finnish forestry and silviculture. This visit helped also to plan the program of forthcoming Study Tour in January 2006. The main topics to be studied during the Study Tour to Finland are going to be:

- Forest management planning
- Financial Planning and income generation
- Role of Forestry Centers
- Forestry techniques and technologies
- Use of contractors, agreements prices

The members of specialist group of Savcor Indufor Oy, Finnish Forest and Park Service, Forelia and Tapio have had several meetings. Their goal is to develop and improve the activities within the Project. Savcor Indufor Oy tries to coordinate activities with the World Bank and Sida in view of their ongoing forestry projects in Russia (WB Sustainable Forestry Pilot Project and the Russian-Swedish Forest Sector Cooperation Programme), to make a concerted effort for the best results. ■

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# Useful links

### About Finland:

Finnish-Russian Development Programme on Sustainable Forest Management and Conservation of Biodiversity in Northwest Russia:
Nature Conservation Projects
Forestry Projects

Finnish Environmental Administration :
Finnish Ministry of the Environment,
Finnish Environment Institute,
Regional Environment Centres
Arctic Centre
Biosphere Reserve in Northern Karelia

Finnish-Russian Nature Conservation Cooperation
IN FINNISH
IN ENGLISH
IN RUSSIAN

Ministry of Agriculture and Forestry
Internet service for Russian forestry

Forest Research Institute (METLA)
Metsähallitus (Forest and Park Service)
Game and Fisheries Research Institute
European Forest Institute

Finland's National Forest Programme 2010

METSO – Forest Biodiversity Programme of Southern Finland 2003-2007

Transboundary Cooperation

Finnish Association of Nature Conservation
WWF Finland
Greenpeace Finland
The Finnish Nature League

### About Russia:

Ministry of Natural Resources of Russian Federation
Rosprirodnadzor

Republic of Karelia
Murmansk region
Arkhangelsk region
Vologda Region
Leningrad Region
St. Petersburg City

Karelian Research Centre of Russian Academy of Sciences
St. Petersburg State University
Kola Science Centre
Vologda State Pedagogical University
Komi Science Centre, Institute of Biology
Institute of Ecological Problems in the North

WWF Russia
Greenpeace Russia
Russian NGOs Forest Club
Atlas of Russia's Intact Forest Landscapes
Biodiversity Conservation Centre (BCC)
Web-bulletin "Nature Reserves and National Parks"

SPOK
- Karelian Regional Public Nature Conservation Organisation
TEIA - Transboundary Environmental Information Agency
Baltic Fund for Nature

Biodiversity in Russia
State of the Environment in NW Russia

Protected Areas in Russia
Association of National Parks and Zapovedniks in Northwest Russia
Vodlozoro National Park
Paanajärvi National Park
Kostamus Strict Nature Reserve
Lapland Strict Nature Reserve
Russki Sever National Park

EU cooperation with Russia

Aleksanteri Institute
The Bank of Finland Institute for Economies in Transition (BOFIT)

### About Barents region:

Barents Info
Barents Euro-Arctic Counsil
Regional Working Group on Environment of the Barents Euro-Arctic Council
Karelian Barents Information Centre
Arkhangelsk Barents Information Centre
Murmansk Barents Information Centre
Barents 2010 project

Norwegian Directorate for Nature Management
Svanhovd Environment Centre in Norway
Norwegian Polar Insitute
Västerbotten County in Sweden

The Baltic Local Agenda 21
ECORA-project

Swedish Environmental Protection Agency

### International nature conservation sites:

Conservation International

The World Conservation Union (IUCN)
IUCN Red List of Threatened Species

# Archive


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