## SCIENCE IN NATIONAL PARKS

Summary

Life and environment in national parks have been the object of scientific interest and research since their foundation. Nowadays, we witness the renaissance of interest in taxonomic and inventory approach and the increasing needs of Polish and foreign researchers to perform research in our protected areas, that remained relatively unchanged as compared to similar ecosystems in western Europe. Research in national parks has to be, however, subjected to certain regulations and constraints that should be imposed to prevent the destruction of natural values of the park. Favored should be the projects that are aimed to: (i) depict biology and ecology of species, populations and communities inhabiting the area of national park, (ii) indicate the major threats to local species and habitats and propose actions to reduce or eliminate them, (iii) offer the scientific basis for the practice of species protection and restitution or reconstruction of destroyed habitats and (iv) set the limits for tourism and recreation in national parks. Above all, national parks should serve as "live laboratories" for basic research, e. g. to investigate biology, ecology, behavior and species interactions in relatively undisturbed habitats. The procedure of selection of research projects should be performed basing on these postulates, and allowed should be only those that: (i) can significantly contribute to the particular research area, (ii) will leave the nature of the park undisturbed and (iii) are prepared by scientists whose curricula guarantee the high level of research.

The research laboratories exist only in a few of 23 Polish national parks. The number of scientists currently employed in Polish national parks equals 44 people. The debate on the necessity of installing laboratories and researchers in all national parks lasts for a long time, with some clear conclusions but with no action stemming out. It is postulated that, in near future, laboratories conducting both — research and education programs, should be created in all national parks, to serve local and guest scientists. Each laboratory should develop its specific profile and expertise so

that it could perform certain analyses (like e. g. soil or water analyses, heavy metals content, monitoring of pest insects etc.) for remaining parks. Minimum four scientists should be employed in each national park. Their professional background should harmonize with the main protection profile and goals of the park. Young scientists employed in national parks should have their tutors in the nearest Universities or other reputable scientific units. Besides research, they should be involved in the education and scientific exchange. They should make efforts at overcoming the ever lasting problem of limited finances of the park by applying continuously for grants. Their progress in scientific research, as well as their overall contribution to the park activity, should be regularly evaluated. Scientists employed in national parks should cooperate on regular basis, e.g. forming the working teams to realize particular projects. On the other hand, they should have the same social and financial status as other park employees do have, like, above all, the right to rent an apartment (for the term of employment) at no or at low costs.

Besides the clear need of expanding the network of park laboratories and researchers, the systematic coordination of their work and of outside research conducted in national parks is necessary, and these functions should be fulfilled by the Board of Polish National Parks (KZPN). Research coordinator (in future possibly 2 or 3 people) should (i) influence the politics of employing scientists in national parks and creating the park-specific scientific profile of the team, (ii) establish the system of periodical evaluation of scientists, (iii) assure tutoring for young scientists and permanent scientific consultation for others, (iv) assist them in the procedure of grant applications, (v) contribute in organizing their regular meetings, workshops and conferences, (vi) facilitate their contacts with scientists in Poland and abroad.

Concluding, the reform of science and scientific politics in national parks should be treated as one of the priority tasks for the near future.