

Slovak Karst Biosphere Reserve

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Key Messages/Lessons learnt

- Ensuring the continuation of scientific research in important ornithological localities
- Suppression of succession of nesting habitats and conservation of endangered and occurring bird species
- Establishing the cooperation with local landowners and users in the protection of habitats and species
- Increasing the environmental awareness of schoolchildren, the local population and visitors of the area

Biosphere Reserve description

The Slovak Karst is the largest karst area of the plateau type in Central Europe located in the south-eastern part of Slovakia, at the border with Hungary. It is a significant territory in terms of the occurrence of geological, geomorphological phenomena and groundwater resources in terms of the occurrence of unique species of fauna and flora. This territory (landscape) was declared as a protected landscape area in 1973 and since 2002 the category of protected area changed to national park. In 1977 the Slovak Karst was registered in the World Network of Biosphere reserves under UNESCO's Man and Biosphere Programme. The total area of the Slovak Karst Biosphere Reserve is 74,500 ha. Its borders have been marked concurrently with the boundaries of the protection landscape area and its protection zone. In the process of territory zonation in 1988, the geomorphological character of the Slovak Karst played an important role. The area of the core area is 8 857 ha, the buffer zone is 23 395 ha and transition zone is 42 248 ha. There are 1300 caves known in the Slovak Karst, which since 1995, together with the caves of the adjacent Aggtelek Karst in Hungary, have been included in the UNESCO World Cultural and Natural Heritage List.

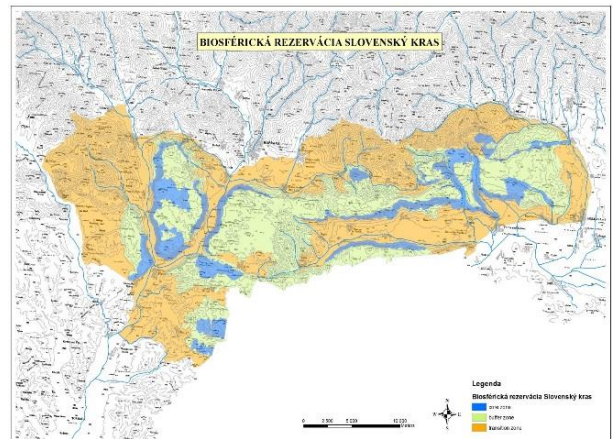


Figure 1: Map of the Biosphere Reserve Slovak Karst



Photo 2: Hrhovské rybníky fish ponds and Horný vrch plateau

BR challenges

Biosphere reserves represent an important basis for the development of science and education of the local population. Concurrently they are one of the important tools of the biodiversity and environment protection at the national and local level. Various long-term and short-term partnerships are being set up to ensure these goals. The research carried out so far cannot be considered as sufficient, especially in terms of a comprehensive view of natural processes. In this regard, we must state that regular systematic research in the area is absent. Therefore, in order to maintain continuity, priority tasks are performed from various sources.

The current environmental awareness is at a various level. The main reason is the bad economic and social situation of inhabitants in the region; people are solving important existential problems. It is necessary to constantly increase the level of ongoing activities in the field of environmental education at schools in the Slovak Karst BR and supplement them with modern elements and current topics. These activities cannot be realized without active cooperation with representatives of local governments, land owners and users. There is also a need for international cooperation with a border partner in the territory of Hungary, which is an equally protected area and at the same time it is a biosphere reserve.

Initiatives/Actions on SDG

The Biosphere Reserve thus contributes to the goals of SDG:

GOAL 4. Ensure inclusive and equitable quality education and promote lifelong learning opportunities for all

4.A Build and upgrade education facilities that are child, disability and gender sensitive and provide safe, non-violent, inclusive and effective learning environments for all

GOAL 15. Protect, restore and promote sustainable use of terrestrial ecosystems, sustainably manage forests, combat desertification, and halt and reverse land degradation and halt biodiversity loss

15.1 By 2020, ensure the conservation, restoration and sustainable use of terrestrial and inland freshwater ecosystems and their services, in particular forests, wetlands, mountains and drylands, in line with obligations under international agreements

15.A Mobilize and significantly increase financial resources from all sources to conserve and sustainably use biodiversity and ecosystems

GOAL 17. Strengthen the means of implementation and revitalize the Global Partnership for Sustainable Development



Photo 3: Information boards

Practical Outcomes/Achievements

To fulfill the challenges, the Slovak Karst National Park and BR in cooperation with the partner Aggtelek National Park (ANPI) and BR implemented the project “Birds without Borders” (Bird of paradise) financed from the INTERREG V-A Slovak Republic-Hungary Cooperation Program 2014 - 2020. Ornithologists at the Drienovec locality have been systematically doing a research on bird migration, population and seasonal trends since 2006 by marking birds with ornithological circles. Spring and autumn migration are monitored. A similar activity is carried out at the Hungarian partner in Szalonna. The sites are only 24 km apart.

This project ensured the continuation of the research and at the same time the bird ringing stations were equipped with the necessary field work material. The mainstay of the project is the cooperation and mutual exchange of the experiences of both national parks and biosphere reserves and highlighting the uniqueness of this area as a protected bird area on both sides of the border. In addition to the significant contribution to increasing the number of visitors to the region, the project also contributes to the protection of the birds and their habitats.



Photo 4: Meeting of ornithologists in Drienovec

A "Green Trail" with an information board was built at the bird ringing stations in Drienovec, as well as an adventure educational trail at the the bird ringing stations in Szalonna, Hungary. Thanks to the ensuring of a continuous professional and teaching service for visitors during the migration season, the provision of better equipment for mist-netting and observation and the reconstruction of the access road, the offer of both ornithological camps for the professionals and also for public has expanded.

The pioneering tree species have been removed and permanent care of the restored sites will be ensured by regular mowing of saplings.

Two bird watching towers were built near the Hrhovské ponds. The one is on the east side

of the pond and another one higher is on the west side of the pond. The constructions were carried out with the consent of the users of the ponds and the support of the local government. In Hungary, a similar tower was built at the Rakaca reservoir.

The leaflets about the project and a leaflet presenting the most interesting places for bird watching, as well as a brochure presenting the birds of the border karst area were published to increase public awareness. To promote the environmental awareness of children, coloring books "Paint your beauty" and workbooks "Bird's Paradise" were published in Slovak and Hungarian. The excursions and many other activities and competitions focusing on interesting facts from the world of birds and bird watching are being realized by both partners.

The most innovative element of the project is the mobile environmental classroom. It will help us to significantly shift the spread of education in nature protection and increase knowledge about the natural values of the area and to encourage schoolchildren to learn directly in nature.



Photo 5: "Mobile classroom" with students

The development of a Hungarian-Slovak interactive web-map is being prepared with the presentation of important sites for bird watching, tourist attractions such as caves, nature trails, various cultural monuments and important nature conservation areas for

easier orientation of visitors in this cross-border karst area.



Photo 6: Practical example of mist-netting



Photo 7: Bird watching tower at Hrhovské rybníky fish ponds



Photo 8: Green Trail, Drienovec

References

1. Rozložník, M., Karasová, E.: CHKO – BR Slovenský kras, 1991
2. Action plan BR Slovenský kras
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