



Habitat mapping of the Határ-menti-erdők (Sites of Community Importance (SCI))

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INTRODUCTION

The habitat mapping of the HUFH20013 Határ-menti-erdők Natura 2000 area was implemented with the support of the Vogelwarte Madárvárta 2 - Interreg V-A AT-HU Program.

Based on the data of the survey, it can be said that despite the large human impacts, we can still find habitats of good naturalness in the area. Preserving them is a common task of nature conservation and all of us. Natural communities are threatened to a greater extent by human influences and to a lesser extent by changes in environmental factors. Currently, the most serious damage to the natural values of the region is forestry, road construction, and the impact of agriculture is small. An important source of danger is overexploited wildlife. In addition to its natural damage, this is one of the obstacles to effective forest management.

KEYWORDS: HATÁR-MENTI-ERDŐK, HABITAT MAPPING, SITES OF COMMUNITY IMPORTANCE, NATURA 2000

MATERIALS AND METHODS

The research area is located in the administrative areas of Nagycenk, Pereszteg, Sopronkövesd, Und and Sopronhorpács. The N2000 area covers larger forest blocks along the Austrian-Hungarian border, which are partly connected.

Coverage: 2253.54 ha. It consists of 3 larger sub-areas. The studied areas are located in the micro-regions of the Ikva and Répce plains (Dövényi, 2010). The two most important waters in the area are the Kardos stream and the Csörgető stream. The studied area belongs partly to the Ikva and partly to the Répce river basin. In the past, waters may have had a significant impact on the area's forests.

During the survey, we followed the methodology given in the manual of the National Biodiversity Monitoring System (TAKÁCS G. & MOLNÁR ZS., 2009). We delimited the spots that can be considered homogeneous by visual interpretation on the infra aerial photograph which prepared in the framework of the Vogelwarte Madárvárta 2 project in 2017. During the field validation we made the characterization of the spots and then, if it was necessary, modified the delimitations.

We recorded the habitat type characteristic of the patch (Á-NÉR), its naturalness-degradation value, the characteristic species and possible endangerment factors, as well as other remarks. Habitat types were given based on the work of J. BÖLÖNI J., MOLNÁR ZS., KUN A. (ed.) (2011). The Németh-Seregélyes modified scale was used in the naturalness-degradation assessment.

RESULTS

During the 2017 mapping of the Határmenti-erdők, we recorded the occurrence of 458 habitat patches. The area is 2253.54 ha. 47.47% are covered by near-natural habitats, 48.71% by disturbed or secondary habitats and 3.82% by non-natural habitats.

Határ-menti erdők N2000 is basically forest area, about 80% of which are covered by forest habitats on more than 1,500 ha. Forests can be divided into five main categories, three of which have significant areas: Mesic deciduous forests (K2: 353,2 ha), Dry deciduous forests (L2a: 699,2 ha) and Forests and plantations dominated by non native tree species (S1, S3, S4, S5, S6: 75,4 ha).

The total area of habitats belonging to other tree-dominated habitats (scattered native trees or narrow tree lines, coniferous forests and plantations mixed with native deciduous trees, uncharacteristic or pioneer softwood and hardwood forests and plantations) is 391.2 ha.

The smallest areas are the extent of category J6 belonging to riverine and swamp forest with 12.5 ha. In addition, young stands occurs on 92.5 hectares, while clear cut areas cover 31.3 ha.

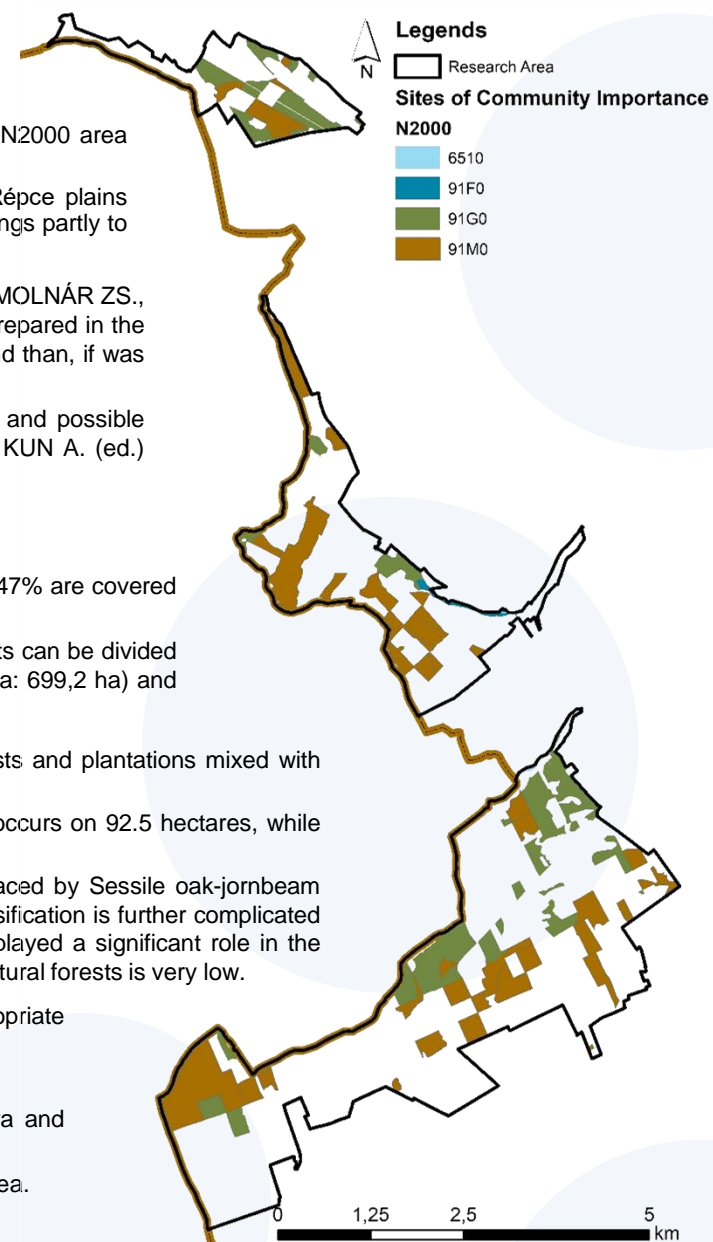
On the higher plateaus and on the southern sides we find *Quercus cerris*-*Quercus petraea* forests (L2a), which are mainly replaced by Sessile oak-jornbeam forests (K2) in northern exposure. These include a number of patches with transient properties that are difficult to classify. The classification is further complicated by the fact that there was a significant previous human impact in the area, which partly transformed the undergrowth, but also played a significant role in the formation of the tree species stock. Both categories are dominated by medium and good natural forests, but the proportion of high natural forests is very low.

Forests that are currently in the non-characteristic forest category could achieve a better state of naturalness as a result of appropriate management, as is the case for young stands.

The size of the grasslands is minimal.

Agricultural habitats occur in an area of 71.15 ha, mainly outside the forest area, mainly on the border of the villages of Zsira and Sopronkövesd.

Categories belonging to other habitats, such as inhabited areas, roads, railway network, occurs in 0.66% (14.94 ha) of the studied area.



Distribution of Sites of Community Importance

We identified 4 community habitats in the area. Area is 1100.45 ha. Within habitats of Sites of Community Importance, the proportion of Pannonic woods with *Quercus petraea* and *Carpinus betulus* (91G0) and Pannonian-Balkan turkey oak –sessile oak forests (91M0) reaches almost 100% (98.7%). Most Natura 2000 habitats can be classified as medium and good based on naturalness. The condition of habitats of poor naturalness can be improved by appropriate forestry management. The protection of areas with good and excellent naturalness is of paramount importance for nature conservation. If they are preserved and converted into ecological „islands” it could function as an area of refuge and become a center of diversity.

Code	N2000 HABITATS	Area (ha)	%
6510	Lowland hay meadows (<i>Alopecurus pratensis</i> , <i>Sanguisorba officinalis</i>)	1,40	0,13
91F0	Riparian mixed forests of <i>Quercus robur</i> , <i>Ulmus laevis</i> and <i>Ulmus minor</i> , <i>Fraxinus excelsior</i> or <i>Fraxinus angustifolia</i> , along the great rivers (<i>Ulmion minoris</i>)	12,46	1,13
91G0	Pannonic woods with <i>Quercus petraea</i> and <i>Carpinus betulus</i>	366,21	33,28
91M0	Pannonian-Balkan turkey oak –sessile oak forests	720,38	65,46
Total		1100,45	100

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DISTRIBUTION BY MAIN CATEGORIES OF Á-NÉR	Area (ha)	%
Agricultural habitats	71,15	3,16
Shrub	2,34	0,10
Mesic hay meadows, pastures and dry heaths	0,96	0,04
Other habitats	14,94	0,66
Other tree-dominated habitats	516,34	22,91
Other treeless habitats	5,96	0,26
Dry deciduous forests	699,23	31,03
Forests and plantations dominated by non native tree species	575,39	25,53
Riverine and swamp forest	12,46	0,55
Mesic deciduous forests	353,21	15,67
Water bodies	1,56	0,07
Total	2253,54	100,00