

USING THE KNOWLEDGE OF WRITTEN SOURCES FOR NATURE CONSERVATION AND RECREATION IN THE FORESTS OF THE DRAHANY HIGHLANDS

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Abstract

Drahany Highlands is a landscape with underground caves, dry valleys, depressions and plateaux. This area, inhabited since prehistoric times, has been used economically since the 13th century. Based on the analysis of a wide range of archival sources, the paper presents the historical economic activity of humans in the forests of the Drahany Highlands at three selected sites. The majority of economic activity involved the extraction of timber and other raw materials; for a certain period of time in the Middle Ages the landscape was deforested and used for agriculture. In addition to export, wood was in demand for the processing of other raw materials – glassworks, lime works, iron mills, etc. Information about these, supplemented by knowledge of the boundary stones, ethnographic material, and the everyday life of the local inhabitants, will be used in other fields and will increase the interest of the general public in visiting the sites of former human economic activity. The archival sources testify also to the transformation of the local original diversity of forest species (mainly beeches, oaks, hornbeams, birches, poplars, and firs) into unsuitable 19th century spruce monocultures. This offers an alternative to the return of the original species composition of the Drahany Highlands forests.

Key words: Restoration of the original species diversity of forests, economic and recreational potential of the landscape, anthropogenic activities, leisure activities

Introduction

The recreationally attractive Drahany Highlands, including the Moravian Karst, most of which was declared a protected landscape area in 1956, with its underground caves, dry valleys, forests, sinkholes and plateaus, was one of the first areas in Central Europe to be popularised for tourist and recreational use since the 17th century. However, evidence of human settlement in the area is much older. Humans first reached the area in prehistoric times. From the 13th century, the landscape was exploited on a larger scale, sometimes, unfortunately, turning into insensitive, intensive exploitation and even devastation. Mapping the cultural heritage of human economic activity in the forests of the Drahany Highlands has become the subject of interdisciplinary research under the NAKI II project No. DG20P02OVV017, whose beneficiary since 2020 is Mendel University in Brno (MAHOLE 2022).

Material and methods

The research was carried out in three selected localities, designated as SOUTH (near Pozoříce), WEST (southeast of Blansko near Klepačov and Olomučany) and NORTH (near Sloup and Holštejn). The sites in question were chosen with regard to their different natural conditions and historical development. Archival sources also served as an important source of information for the research, which is the focus of the present paper.

Archival materials are still a rather neglected, albeit very valuable and inspiring source of knowledge for the history of our forests. They provide, among other things, knowledge that can be used for various aspects of the past of forests, nature conservation and recreation. Although there is the methodology for the processing of archival material on the historical use of forest estates (SUČÁNKOVÁ et al. 2021), working with traditionally used types of archival documents (e.g. deeds, land registers, cadastres, forest management plans, and maps), its use in the above-mentioned NAKI II project No. DG20P02OVV017 quickly showed its limitations and neglected a number of important sources, such as municipal and school chronicles (MARÁZ 2022). Within the framework of the NAKI II project DG20P02OVV017, a broadly conceived heuristic of written and map sources, extended also by research in domestic archival funds primarily unrelated to the issue (e.g. ZAOO, Vs Ruda nad Moravou, inv. No. 734 *Belehnungs-Protokoll über die beim Dorf Ollomutschan im Betrieb stehenden Grubenfeldmaassen*), in the funds of the National Heritage Institute, the regional office in Brno and Kroměříž (map funds), and in foreign archives (Hausarchiv der regierenden Fürsten von und zu Liechtenstein in Vienna or Kriegsarchiv and Haus- Hof- und Staatsarchiv Österreichisches Staatsarchiv in Vienna). A wide and varied range of documentary and map sources were thus analysed, providing valuable insights.

Results and Discussion

It may be surprising at first sight that the study of often centuries-old archival historical documents can provide insights for the field of recreation and landscape conservation. However, not only is this the case, but it is also happening to an even greater extent than one might expect, as this paper seeks to demonstrate.

The beginnings of intensive human economic activity in the landscape of the Drahany Highlands date back to the 13th century. At that time, as part of the process of colonisation associated with the establishment of new settlements were completely deforested. Subsequently, villages were founded on these sites, whose inhabitants were engaged in agricultural activities. It is clear, however, that the landscape and climate here cannot provide ideal conditions for agriculture, so many villages disappeared again after about two centuries of existence, not by force but simply because agriculture was not sufficient to support the people. In the localities we surveyed, these are the extinct villages of Bohdalůvka (site NORTH) and Polom (site CENTRE). Their cadastre was then reforested.

The forest has always played an important role in the economy of our ancestors in the Drahany Highlands. Especially in times of great demand for wood, which was used not only as a building material for export (e.g. for shipbuilding as far away as Hamburg or for the production of telegraph poles and formwork for mines), as a raw material for the production of paper pulp (Molenburk, p. 13), but also as a basic raw material for the production of charcoal in the mills, which were widespread in the Drahany Highlands in the past. In 1680-1684, for example, the consumption of firewood was so great that whole areas of the forests around Olomučany succumbed to it. Charcoal and wood found their outlets as fuel in the surrounding machine mills, steam sawmills (e.g. in Adamov), glassworks (e.g. in Olomučany), limeworks (around Sloup), hammers, and ironworks (e.g. Nové Hradky, Blansko) (Olomučany, p. 386).

The mentioned data also testify to the rich mining and quarrying activity, when limestone, alum and iron ore were quarried in the forests of the Drahany Highlands (Klepačův, p. 10; Olomučany, p. 386), as evidenced, among others, by mining and cutting plans (MZA, D 16, inv. No. 363 and 565). In addition to these, we also have valuable written sources for the mining and processing of minerals, especially for the lime industry in the NORTH site. The municipal chronicles have left us with valuable knowledge about production processes, lime prices, but also about export routes, customs and songs of the local lime farmers, which is a welcome source of information for the study of their everyday life, ethnography and musicology, among other things. The local lime production was directed to Prostějov and Tovačov, Konice and Jevíček or Olešnice and Kunštát and their surroundings. The work was carried out in such a way that the limestone was brought to the kilns in winter. The working period started before St. Joseph's Day and ended at the Martin feast with a break for hay and harvest. The lime trade was traditionally carried out by peasants from selected farms in individual villages. There were a considerable number of limekilns, and in Molenburg alone, there were 12 kilns at the end of 1923; previously there had been more, perhaps 15 (Molenburg, pp. 14-17).

The high consumption of wood caused the mass clearing of the original species-rich forests and their replacement by spruce monocultures, which offered faster wood production. However, they are much more susceptible to bark beetle calamities and logging. The beginnings of the transformation of the original species-rich forests into spruce monocultures can be traced in our forests from the end of Maria Theresa's reign. The transformation of the species-rich forest into spruce monocultures in the Drahany Highlands is also well documented in archival sources. In our three study, there is a valuable comparison provided for the NORTH, CENTRE and SOUTH sites and concerning written and map sources from domestic archives and the Hausarchiv der regierenden Fürsten von und zu Liechtenstein in Vienna in a continuous time series of the 18th – 20th centuries. They show that in the 1860s the local forests were mixed with a predominance of deciduous trees (oaks predominated in most of the area, supplemented by hornbeams, birches, aspens, poplars, and firs), and around 1830 they were beech-fir in character (MZA, F 82, inv. No. 1172; Vienna, HRFL, HA 1370). According to the Mollenburk chronicler, fir trees still dominated most of the local forests in the 1890s (Mollenburk, p. 13), but spruce trees were increasingly planted, and pine trees can still be found among the conifers, although less frequently than spruce. At the end of the 19th century, spruce monocultures dominated the Drahany Highlands as well, and they have persisted to the present day (Molenburk, p. 13; MZA, F 31 No.5857). The unfortunate consequence of these monocultures consists in various calamities, especially the bark beetle, which our forests have been struggling with especially in the last two decades. And what is the solution to this situation today? By capturing the original rich diversity of the more suitable mixed forest with a predominance of broadleaved trees, which has irretrievably disappeared, the archives offer us a suitable alternative for replanting for the future in order to prevent further bark beetle calamities.

It should be mentioned, however, that it is not only the rich original diversity of trees that has disappeared and has been preserved only in archival sources. The archival sources also contain evidence, including pictures, of boundary stones that were placed in the forests of the Pozořice estate when its boundaries were redrawn in 1830. They bore an inscription in the abbreviated form *H:P:F:v:L: 1830 N. 1-37* (always indicating the serial number of the stone from 1 to 37), executed in a stylised capital, with a painting of the princely crown, all of which alludes to the Liechtensteins, the owners of the estate, more precisely to John II of Liechtenstein, under whom the demarcation was realised (Vienna, HRFL, S 188, unfoliated). Today, these boundary stones are no longer found in the landscape, but they are visually attractive objects that could be used, for example, on the information boards of today's hiking trails.

In addition to industry, i.e. the aforementioned production of charcoal, iron, glass and quicklime, the forest was also of economic importance to the ordinary humans. Again, mainly village and school chronicles tell us of domestic animals grazing in the wood, raking leaves, needles and twigs for bedding, collecting boxwood, and harvesting grass in it. The specific feature of the forest in the Moravian Karst is undoubtedly the underground caves. Even their stalactite wealth, now admired by visitors, has unfortunately become the subject of exploitation, or rather unimaginable devastation. Both the owners of the estate and the ordinary inhabitants of the surrounding villages have been involved in it. There are numerous examples from sources and literature of stalactites being sold on pilgrimages, and during the Baroque reconstruction of the Lednice Castle in 1686, a so-called grotto was created – an artificial stalactite cave in the castle basement with stucco decoration of artificial stalactites, in which original stalactites brought from the Moravian Karst were also planted. In the Sloupské Caves, in 1775, two narrow stone blocks were cut from a large stalactite formation, which after polishing found use as stone slabs set into wooden tables, which are part of the furniture of the Rájec Chateau, or in the 19th century, stalactites from the Moravian Karst served as a source of limestone for the fountain in Rájec nad Svitavou. A great plundering of stalactites took place in the Sloupské Caves in 1878. At the end of the 19th century, the caves were also plundered for relics of prehistoric animal bones, which were sold by cave diggers. In order to prevent further devastation, the mayor of Sloup had a new official entrance to the caves built and the older “wildly” created ones were filled in. Subsequently, the caves could only be visited in an organised manner for a fee with a guide (Sloup, esp. pp. 5, 7, 10-11; BALÁK, 2019, pp. 87 and 89).

Conclusion

The presented findings can be used in the protection of the landscape of the Drahany Highlands and the gradual return to the restoration of the biodiversity of trees in their forests, which would prevent further bark beetle calamities in the future. At the same time, the greater species diversity of the local forests with a higher proportion of deciduous trees would certainly be a greater attraction for tourists than the current spruce monocultures. A number of other information mentioned above could also be used for tourism and recreation. This could be in the form of information boards with texts about the former human management in the local forests, supplemented by interdisciplinary research on relics of anthropogenic activity, especially mill sites, lime kilns, glass and ironworks, relics of former shafts or vanished medieval villages. These boards should be supplemented with pictorial material in the form of maps, depictions of former boundary stones, entries in economic books and their iconographic decoration (e.g. miners in period ceremonial mining uniforms and depictions of period work in the mines in ZAOO, Vs Ruda nad Moravou, inv. No. 734). This would enrich the relaxing leisure activities of visitors to the forests of the Drahany Highlands with unpretentious and interesting educational content. This would also be helped by the fact that the local relics of anthropogenic activity have the advantage of their close proximity to the current forest hiking trails. It would certainly be worth considering, for example, the creation of a new nature trail aimed at documenting the traces of the vanished world of old relics of anthropogenic activity in the forests of the Drahany Highlands.

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Abbreviations

MZA = Moravský zemský archiv v Brně:

D 16 = Baňské ředitelství Brno.

F 31 = F 31 Lichtenštejnská lesní zařizovací kancelář.

F 82 = F 82 Velkostatek Pozoříce.

SOkA Blansko = Státní okresní archiv Blansko:

Klepačov = Archiv obce Klepačov, Kronika obce, inv. No. 80.

Molenburk = Archiv obce Molenburk [now Vysočany], Kronika obce, unprocessed.

Olomučany = Archiv obce Olomučany, Kronika obce, inv. No. 51.

Sloup = Archiv obce Sloup, Kronika obce, inv. No. 119.

Vienna, HRFL = Hausarchiv der regierenden Fürsten von und zu Liechtenstein in Wien:

S 188 = Waldregulierung Im Bereich der Herrschaften Plumenau, Eisenberg und Posoritz, Inv.-Nr.: S 188.

HA 1370 = Wirtschaftsstatus der Herrschaft Posoritz, Inv.-Nr.: HA 1370.

ZA00 = Zemský archiv v Opavě, pobočka Olomouc:

Vs Ruda nad Moravou = Velkostatek Ruda nad Moravou.

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Souhrn

Článek pojednává o reliktech hospodářské činnosti člověka v lesích Dražanské vrchoviny ve světle archivních pramenů projektu NAKI II č. DG20P02OVV017.

Zabývá se produkcí dřevěného uhlí v milířích, skla, vápna a železa, zmiňuje exploataci lesů Dražanské vrchoviny od 13. století, mnohdy vedoucí k devastaci porostů i krápníkových jeskyní. Pozornost je věnována zániku původního lesa a vysazování smrkových monokultur, náchylných ke kůrovcovým kalamitám.

Poznatky naleznou využití v environmentálním vzdělávání, obnově lesní biodiverzity a mohou přispět k edukativnímu rozměru turistických tras.

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