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ETHNOBOTANICAL SURVEYS IN TRANSYLVANIA: PAST, PRESENT AND FUTURE

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Abstract: Traditional health systems consists of ethnobotanical data mostly in Romania. Since the 1960s, several ethnobotanical surveys were carried out and published in the isolated villages of the country. In our study, several Székler and Csángó regions were surveyed since 2007, collected data about the ethnomedicinal use of the plants by local healers and informants. Data concluded 9 preparation forms, more than 600 local name, known and unique use of the mentioned taxa. These documented data can provide new species for further laboratory analyses in the future, underlining the importance of home treatments and traditional knowledge about the medicinal plants in the country.

Key words: traditional knowledge, ethnomedicine, Széklers, Csángós

1. Introduction

Traditional ethnobotanical health systems represent а contact between the ethnography and the natural sciences, investigating the human-plant relationship [11]. Medicinal plants, used in the folk therapy, play an important role in the everyday life of the people in Transylvania, currently part of Romania. Based on several earlier works from the 16-17th century, new ethnobotanical surveys were carried out in the regions of Transylvania since the 1960s, inhabited mostly by the ethnic groups of Széklers and Csángós. With respect to these earlier data. ethnomedicinal surveys were documented among others in Bukovina [5],

Kalotaszeg [15][21][28], Harghita [26], Homoród [4][6][7][8], Moldova [9][10], Gyimes-valley [13][14][16][22][23][24] and in Kovászna [25].

Based on several other collection trips in the country, the valuable summary of Borza [1] and Butura [2] can be mentioned, as the main significant works of the local plant name and use. These works include the vernacular and scientific plant names, the plant parts and the application forms used in human and veterinary medicine, completed with the regions where these data were described. In addition to the botanical descriptions,

several studies were published about the isolated compounds and pharmacological

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effects of the ethnobotanically studied plants, screening and proving their therapeutical effect by various phytochemical methods [3][25].

Recently, the young people leave behind their archaic practices with plants in Transylvania, due to the change of lifestyle and culture, using mostly various phytotherapeutic sources.

The aim of this study was to collect ethnobotanical data from several villages inhabited by the ethnic groups Székler and Csángó in Transylvania, focusing on the indigenous human ethnomedicine and ethnoveterinary practices. We wanted to describe the present traditional plant usage and preparation forms with the significant role of the plants in the everyday life of the people in the selected regions.

2. Material and Methods

2.1. Study area

Field works and ethnobotanical collecting trips were carried out in various parts of Transylvania by our team in summers 2007-2012. The selected regions were the followings: Úz-valley and Lunca de Sus inhabited by Csángós, as well as Lueta, Bătanii Mari in Erdővidék and Crâciunel with Székler people.

Úz-valley with 300 inhabitants has nor medical and veterinary service neither own pharmacy in the villages Cinod and Egershec. This region is about 15 km from the big towns, and the farms are located geographically dispersed without telephone boots and signal for mobile phones. Based on their isolation, the people preserve an archaic ethnomedicinal knowledge.

Lunca de Sus with about 600 inhabitants is provided by own pharmacy and medical service too, similarly to Bătanii Mari with about 2000 people. In these settlements, people work mostly in agriculture, in agroforestry and in livestock farming.

In Lueta, the 3000 Széklers are provided by veterinary service and physicians from the neighbouring village Mereşti, and by an own pharmacy since 2008. By contrast, the people regularly known and use the plants from the environment in various home treatments.

The Unitarian village Crâciunel with 460 people possess no pharmacy, but a permanent medical service is also observed from Merești.

2.2. Data collection and documentation

Among the applied methods during the field works (Fig. 1.), semi-structured interviews, handwritten notes, preparing local vocabulary, herbaria, photos (Canon Ixy Digital) about the plants and informants, and recordings of the interviews with dictaphone (Olympus WS-110) can be mentioned. In addition, the origin of the medical knowledge (studied, heard or read data) also were described, to separate the elements of the inherited knowledge from the data originated from any written sources. People speak in Hungarian, facilitating the communication during the work.



Fig. 1. Field trip in Úz-valley (2009)

The following data were documented during the surveys: the vernacular plant

name, collecting time and method, used part, using form, administration and treated diseases completed by beliefs and peculiar magico-mythological role mostly in the Csángó villages. Plant taxa were identified as species with the identification key of Király [12]. Voucher specimens (Fig. 2.) with unique codes were deposited at the Department of Pharmacognosy of the University of Pécs.



Fig. 2. Plant collection in Lunca de Sus (2009)

3. Results and Discussion

In our work, 105 plant taxa were described in Cinod and Egershec, but in Lueta more than 200 plant taxa were summarized including 143 species used in the Székler folk therapy. Altogether 115 plants were documented and ethnobotanically evaluated among the Csángós in Lunca de Sus, 169 taxa in the region of Erdővidék and 92 species in Crâciunel by the Székler informants.

According to our previous works [17][18][19][20], more variation was observed in the local name of the taxa in each settlement, related to the habitat (e.g. *vízipuji* as water plant = *Veronica*

beccabunga), or to the morphological characters (e.g. 1. *békaláb* as leg of frog, or *medvebajusz* as moustache of bear = *Equisetum arvense*, 2. *üvegszárúfű* as herb with glassy stem = *Impatiens noli-tangere*, 3. *Jézus szíve* as heart of Jesus = *Capsella bursa-pastoris*).

Related to the traditional use, e.g. the name forrasztófű (herb for sealing = Symphytum officinale), ótvarburján (herb for impetigo = Galium mollugo), epefű (herb for gall = Gentiana cruciata), torokgyíkburján (herb for diphteria = Parnassia palustris), tüdőfű (herb for pneumonia = Agrimonia eupatoria), or gyomorfogó (herb for diarrhoea = Echium vulgare).

Several vernacular names come as loanwords from the Romanian plant terminology, e.g. burusztuj (Arctium lappa), menisora (Vaccinium vitis-idaea), árdé (Capsicum annuum), vinete (Solanum melongena), álivor or árió (Euphorbia amygdaloides), and buretura (Chamaenerion angustifolium).

Based on the colour analogy, the colour of the plant parts used connects to the application, e.g. *sárgagyüké*r (yellow root) in case of *Gentiana asclepiadea*, referring to the yellow root of the species used for liver diseases, or the *fehérboglár* with the white flower of *Trifolium repens* used for leucorrhoea.

Related to the name analogy, the traditional name of the used plant parts or the treated diseases were found in the local terminology, e.g. in the *vérburján* (bloody plant = *Hypericum perforatum*) used for internal bleeding as tea.

Among the application forms, tea, syrup, tincture (Fig. 3.), vinegar, gargle, rinse, bath, cataplasm, cream and liniment were described and sporadically mentioned with unique healing methods by special healers of the villages. These home products were applied for various diseases, among others for example for pneumonia, liver, kidney, gall and stomach disorders, wounds,

circulatory problems, headache and toothache.



Fig. 3. Tincture of root of *Urtica dioica* (Egershec, 2009)

In addition to the herbaceous taxa, some trees were also described in our study, associated with tree sap of *Acer, Betula, Tilia, Fraxinus, Sorbus* and *Populus* species. The sap of *Betula pendula* called *virics* was mentioned as a fresh beverage and medicine for different diseases, e.g. for headache, kidney problems and as diuretics, focused on the curiosity of this disappearing phenomenon (= drainage, Fig. 4.) in the country [27].



Fig. 4. Drainage of birch sap (Lueta, 2012)

Several difficulties were observed during the field trips, for example the use of various books and other sources, which influence the traditional knowledge of the people in each village. The local names often cover other plant species in the official Hungarian plant terminology, highlighting the necessity of the correct botanical identification applied living or dried plants.

Based on our records, some taxa were selected for further laboratorical analyses, which are used in the Transylvanian ethnomedicine for a long time. Presently, they can not be found in the official therapy, therefore serious evaluation and proving phytochemical and pharmacological studies are required in the future.

4. Conclusions

The collected ethnobotanical data are based on traditional observations and experience of the studied ethnic groups, presenting a cultural and linguistic island of the Székler and Csángó people in the Transylvanian ethnomedicine nowadays. In addition to these archaic elements. significant change was documented in the ethnobotanical knowledge of the selected rural populations, affected by various phytotherapeutical and media sources, as well as by several environmental and social factors, too. The collected data highlight the dramatic reduction of the plants' use nowadays, due to the transformation of the landscape, to the erosion of the traditional knowledge of the people, and to the migration to cities and abroad among the young people. Underlining the importance of the home treatments and of the possible plant

sources for the recent phytotherapy, the ethnobotanical works highlight the necessity of the preservation of the disappearing medical practices among the indigenous people in Transylvania in the future.

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