

The image shows a vast, open landscape of a rich fen. The foreground and middle ground are filled with tall, green grass interspersed with numerous small, white, fluffy seed heads. Several small, dark green shrubs are scattered throughout the field. In the background, a dense forest of tall, dark green trees covers a rising slope under a bright, overcast sky.

Regional variation of rich fens in Poland and Slovakia

Lesław Wolejko

Contents

- What is a rich fen?
- Classification and distribution of rich fen in Slovakia and Poland

What is a rich fen?

- Alkaline fen
- Calcareous fen
- Subneutral fen
- Chalk mire
- Rich fen meadow
- Percolating mire
- Valleyhead mire
- Spring mire
- Soligenous mire
- Brown moss – small sedge vegetation
- Parvocaricetum

According to Interpretation Manual EUR25...

Alcaline fens are wetlands:

- covered with sedge-moss vegetation,
- able to accumulate peat or travertine,
- having continuously high water level,
- soligenic or topogenic supply of water, rich in bases.





General Topographic Map of Slovakia

- A = *Caricetum paniculatae* Wangerin ex v. Rochow 1951
 B = *Eleocharitetum pauciflorae* Lüdi 1921
 C = *Caricetum davallianae* Dutoit ex Koch 1928
 D = *Valeriano simplicifoliae*-*Caricetum flavae* Pawłowski et al. 1960
 E = *Alnetum incanae* Lüdi 1921

<i>Carex paniculata</i>	+	+	3	+	+		+	4			3	+
<i>Eleocharis quinquaeflora</i>						3		2b				
<i>Primula farinosa</i>		+		2b	2b	1	3		1	+		
<i>Carex davalliana</i>		1		3	5	5	4		3	2a		
<i>Drepanocladus cossoni</i>		4	5	3			2b		2a	4		
<i>Homalothecium nitens</i>	+	2a	2a	1	+		+		+	1		1
<i>Valeriana simplicifolia</i>				+	+	2a	1		+	+		
<i>Alnus incana</i>	3											3

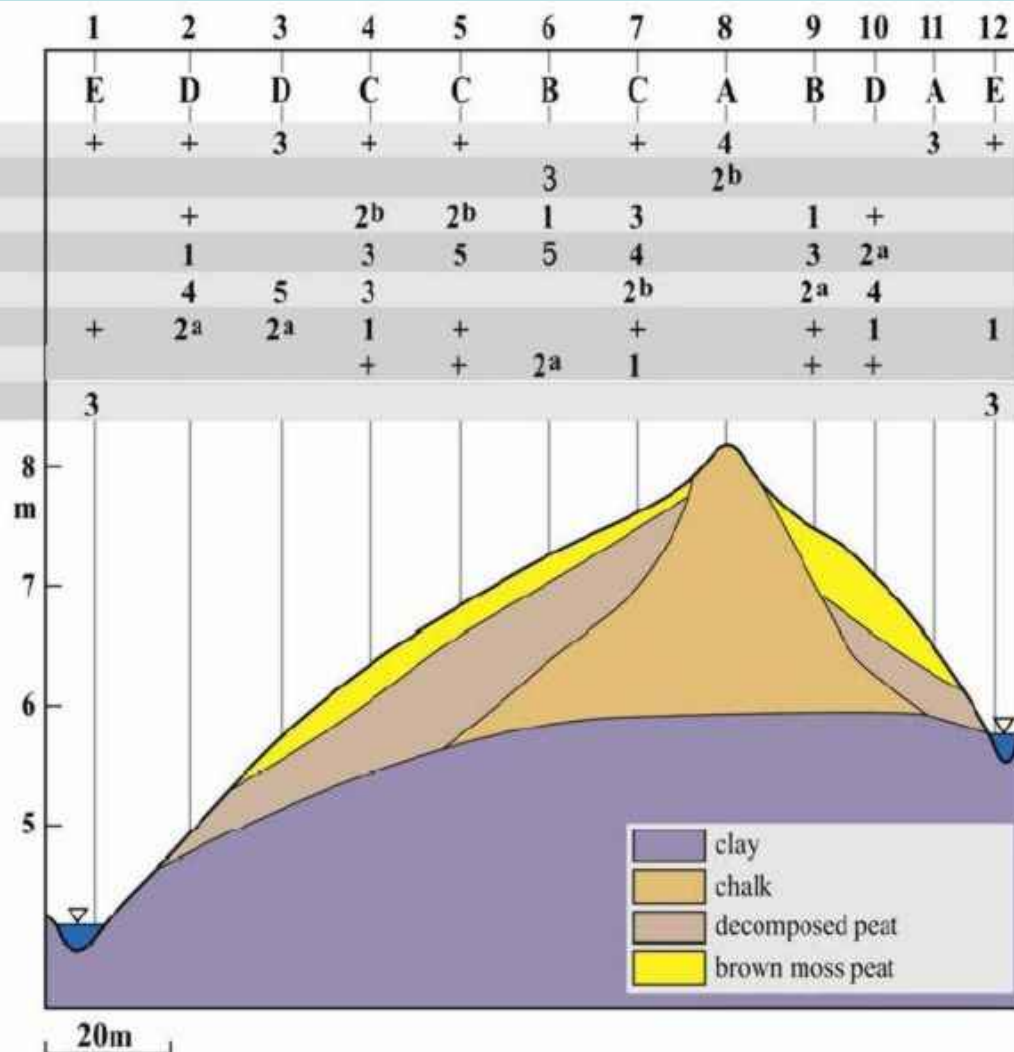




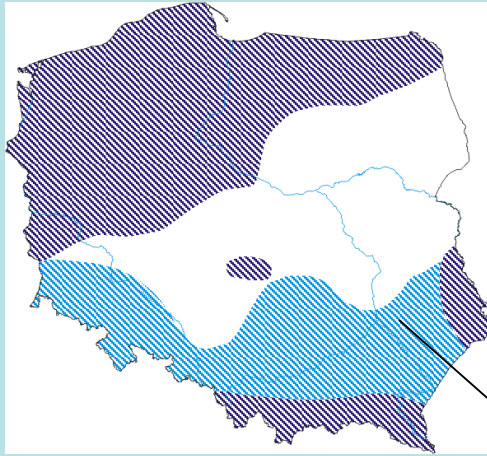


Fig. 11: Soil profile in the pool system of Štrba showing travertine deposition on top of the peat. At the right travertine deposition at the surface can be seen as well as precipitation of ironhydroxide. (Photo M. MADARAS)

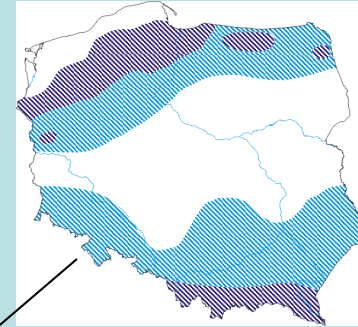
Latvia



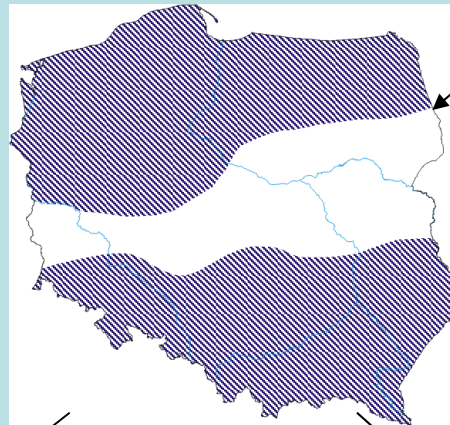
Calcareous wetlands of Natura 2000



Lake chalk mires *7210



Petrifying springs *7220



Aalcaline fens 7230



Intermediate mires 7140

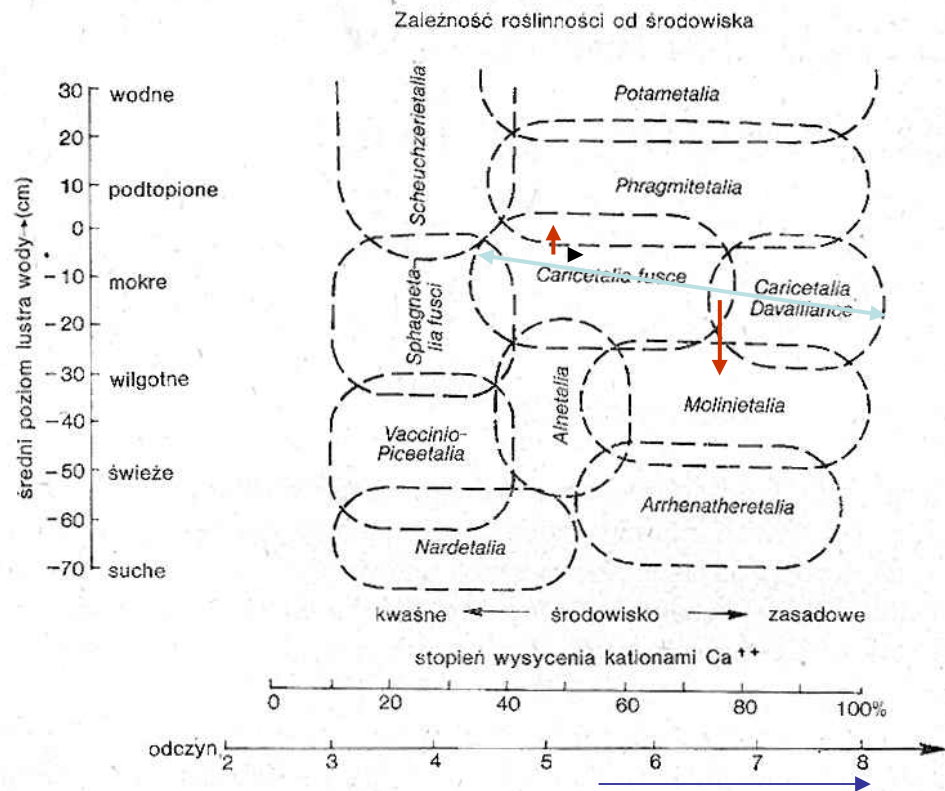
Molinion

Calthion

Other (e.g. forest)

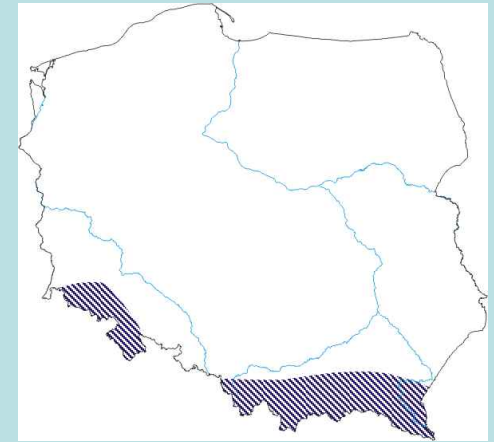
?

Rich fen vegetation



Ryc. 121. Związek roślinności torfowisk i jezior z wysokością poziomu wody i jej właściwościami hydrochemicznymi (Horawski 1973)





„Mountain flushes” (7230-1)

Cl. *Scheuchzerio Caricetea-nigrae*

O. *Caricetalia davallianae*

All. *Caricion davallianae*

Valeriano-Caricetum flavae (= *Valeriano simplicifoliae-Caricetum flavae*) „eutroficzna” łąka górską

Caricetum davallianae zespół turzycy Davalla



Upland basiphilous mires of southern Poland (7210-2)

Cl. *Scheuchzerio Caricetea-nigrae*

O. *Caricetalia davallianae*

All. *Caricion davallianae*

Caricetum davallianae zespół turzycy Davalla

Ctenidio molluscae-Seslerietum uliginosae

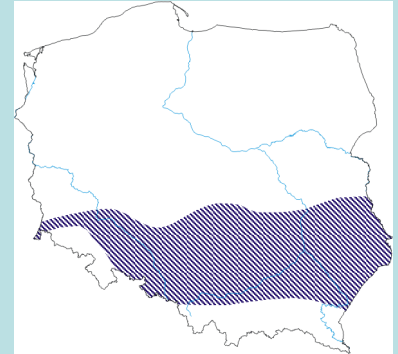
Eleocharitetum quinqueflorae zespół ponikła skąpokwiatowego

Caricetum paniceo-lepidocarpae

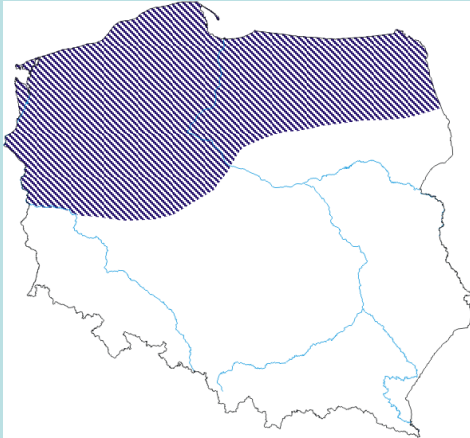
Juncetum subnodulosi zespół situ tępokwiatowego

Comm. ***Schoenus ferrugineus*** mechowisko złocieńcowe źródliskowe z marzycą

ruda



Spring- and percolating mires of northern Poland (7230-3)



Cl. *Scheuchzerio-Caricetea nigrae*

O. *Caricetalia davallianae*

All. *Caricion davallianae*

Orchido-Schoenetum nigricantis

(=*Schoenetum nigricantis*)

****Campylio-Caricetum dioicae***

****Eleocharitetum quinqueflorae***

****Juncetum subnodulosi***

Zbior. ***Schoenus ferrugineus***

*Zbior. z ***Carex buxbaumii***

All. *Sphagno warnstorffiani-Tomenthypnion

****Sphagno warnstorffiani-Eriophoretum latifolii***

O. *Caricetalia nigrae*

All. *Caricion nigrae*

****Menyantho trifoliatae-Sphagnetum teretis***

O. *Scheuchzerietalia palustris*

All. *Caricion lasiocarpae*

Caricetum lasiocarpae

Caricetum lasiocarpae campylietosum stellati

Caricetum diandrae

Caricetum diandrae paludelletosum

Caricetum diandrae scorpidietosum

? *comm. ***Helodinium blandowii-Carex acutiformis***

? *comm. ***Sphagnum teres-Cladium mariscus***

* not in Matuszkiewicz (2001)

Pałczyński, 1975 - Biebrza

- Cl. *Carici-Drepanocladetea*
 - O. *Caricetalia fuscae*
 - All. *Calamagrostion neglectae*
 - Caricetum caespitosae***
 - Calamagrostietum neglectae***
 - Stellario-Agrostietum caninae***
 - Peucedano-Caricetum paradoxae***
 - O. *Caricetalia davallianae*
 - All. *Caricion davallianae*
 - Schoenetum ferruginei***
 - All. *Caricion demissae*
 - Scorpidio-Caricetum Hudsonii***
 - Campylio-Trichophoretum alpini***
 - O. *Caricetalia diandrae*
 - All. *Caricion diandrae*
 - Caricetum limoso-diandrae***
 - Caricetum lasiocarpae***

Koska, 2004 – Mecklenburg-Vorpommern

- Cl. *Parvo-Caricetea*
 - SubCl. *Sphagno fallacis-Caricenea canescentis*
 - SubCl. *Drepanoclado revolvantis-Caricetum diandrae*



Rospuda





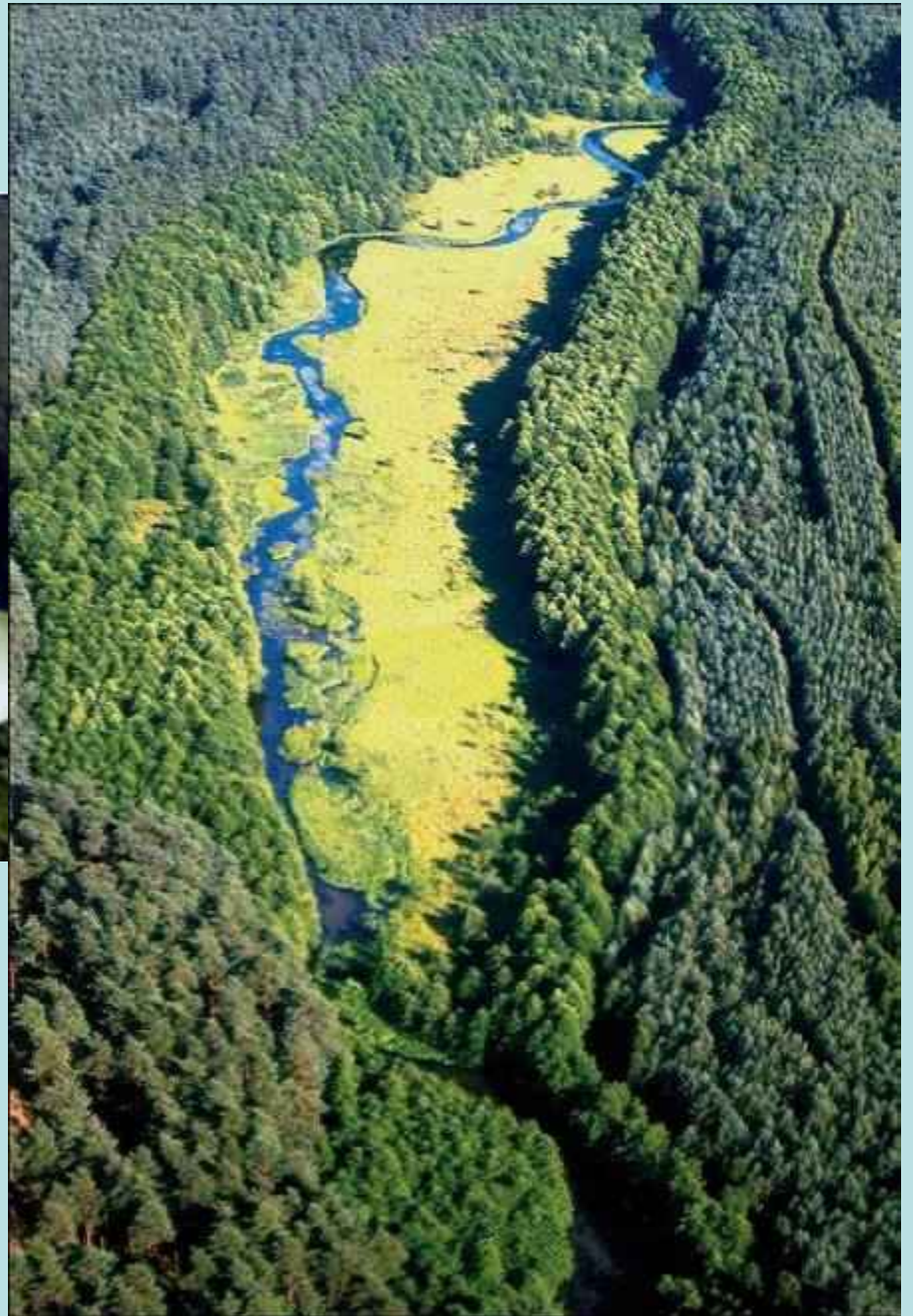
Dolina Dobrzyńki







Dolina Rurzycy



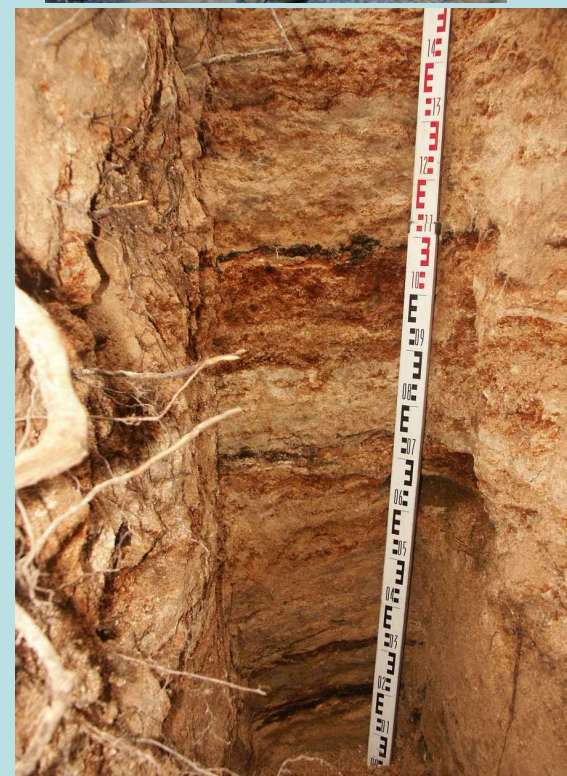
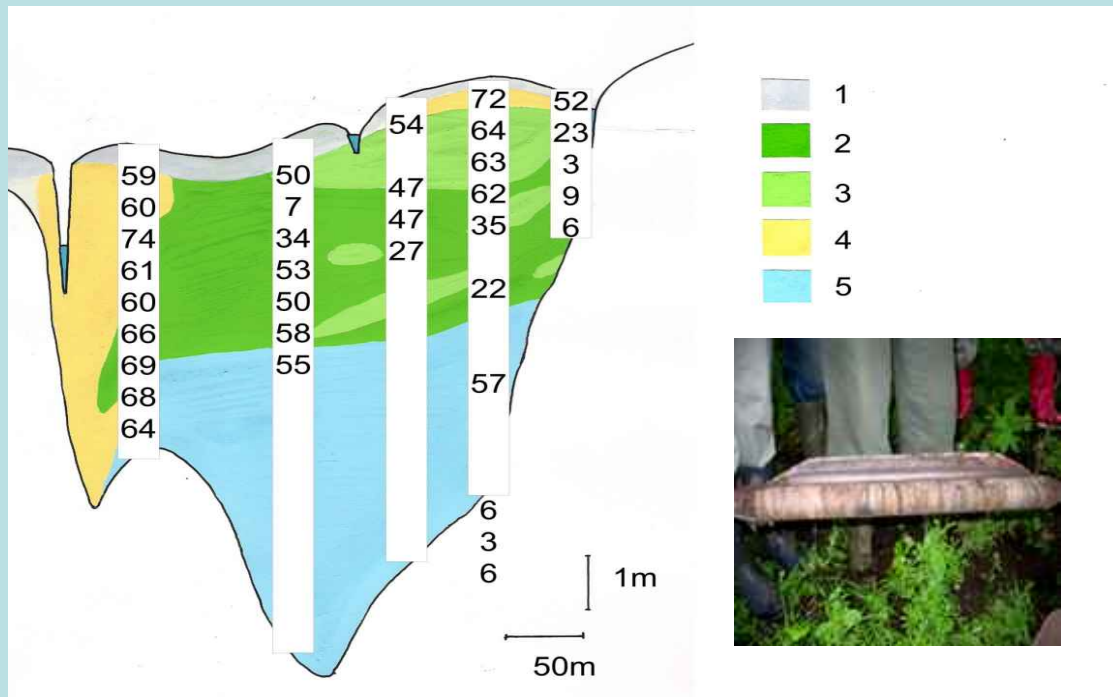




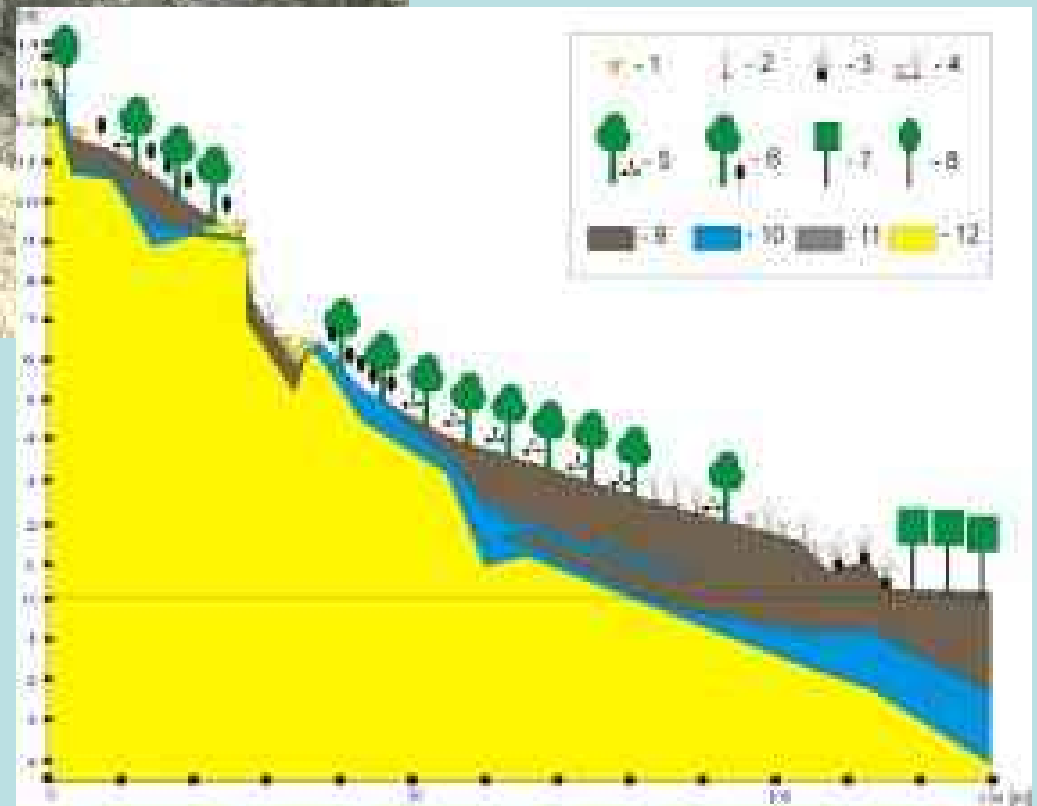




Dolina Płoni koło Barlinka





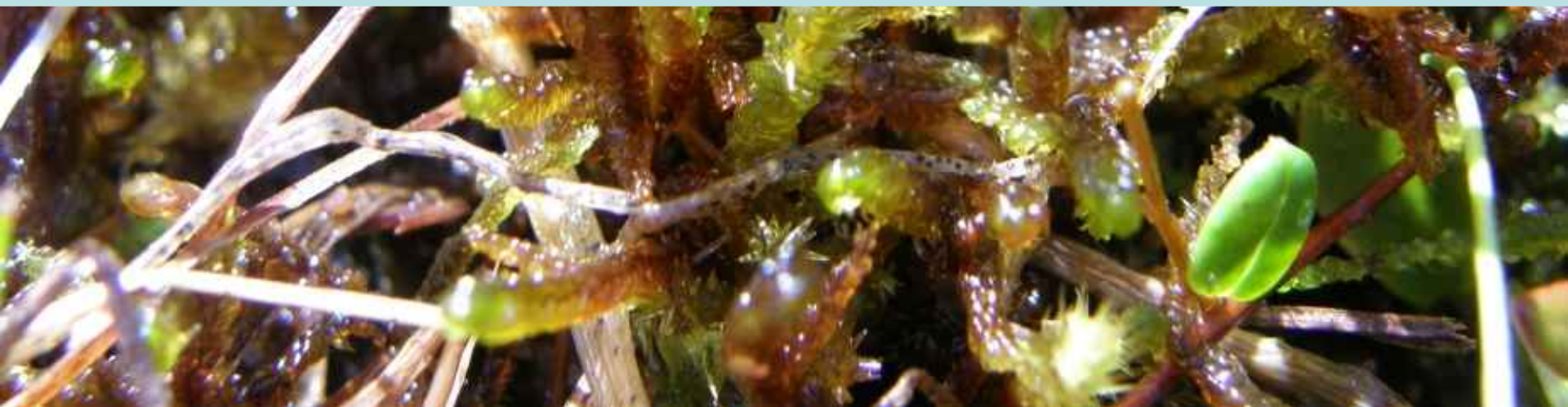


Questions?

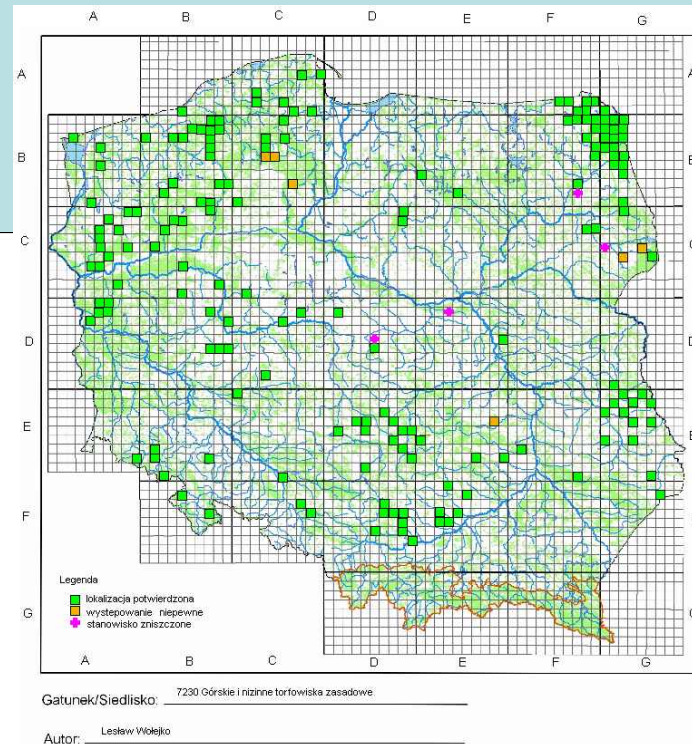
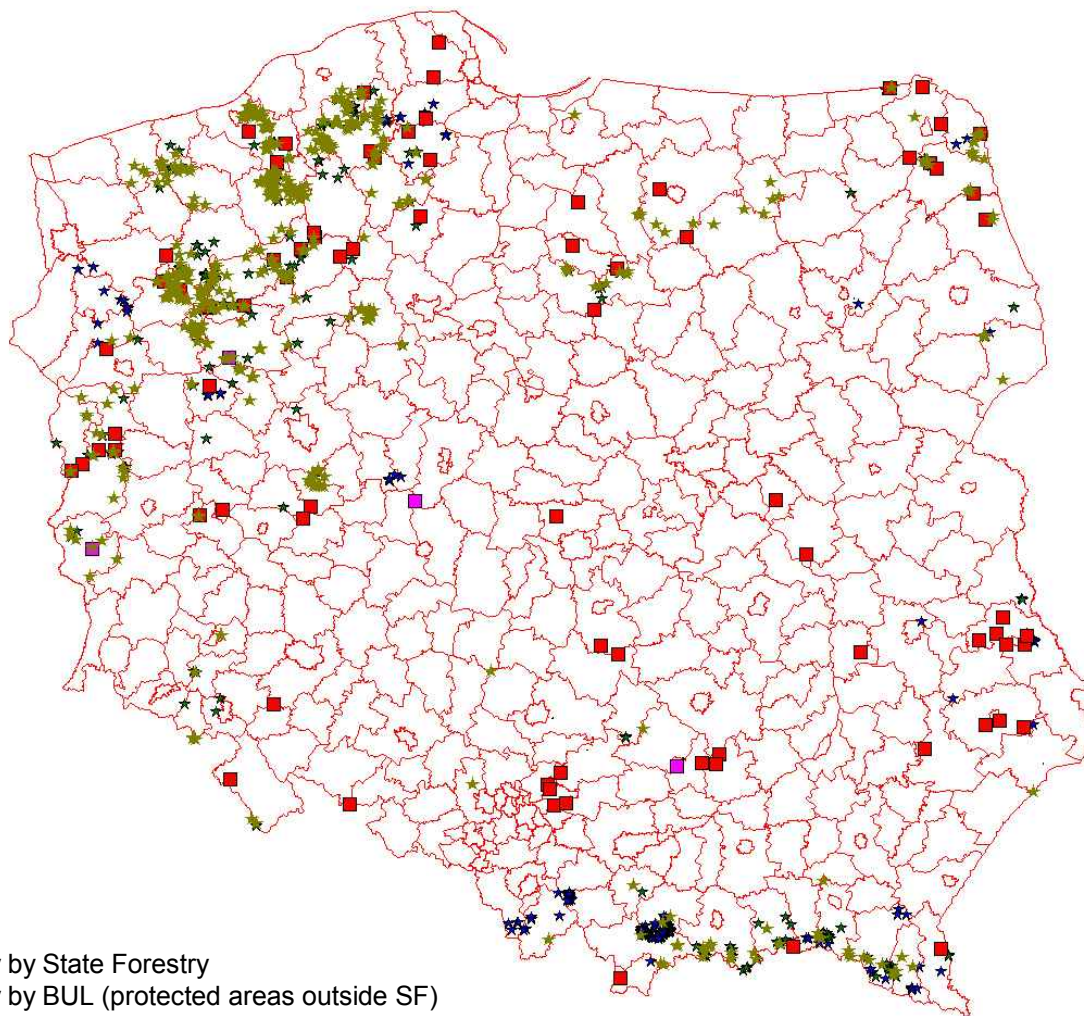




Management programs
for alkaline fens (7230) and four fen species
in Poland

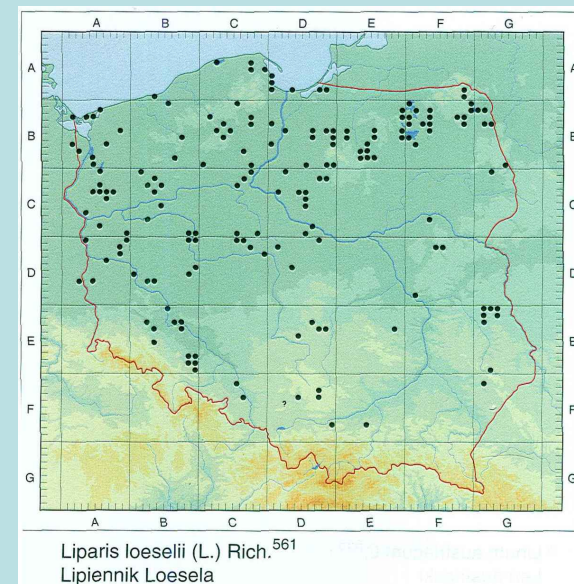
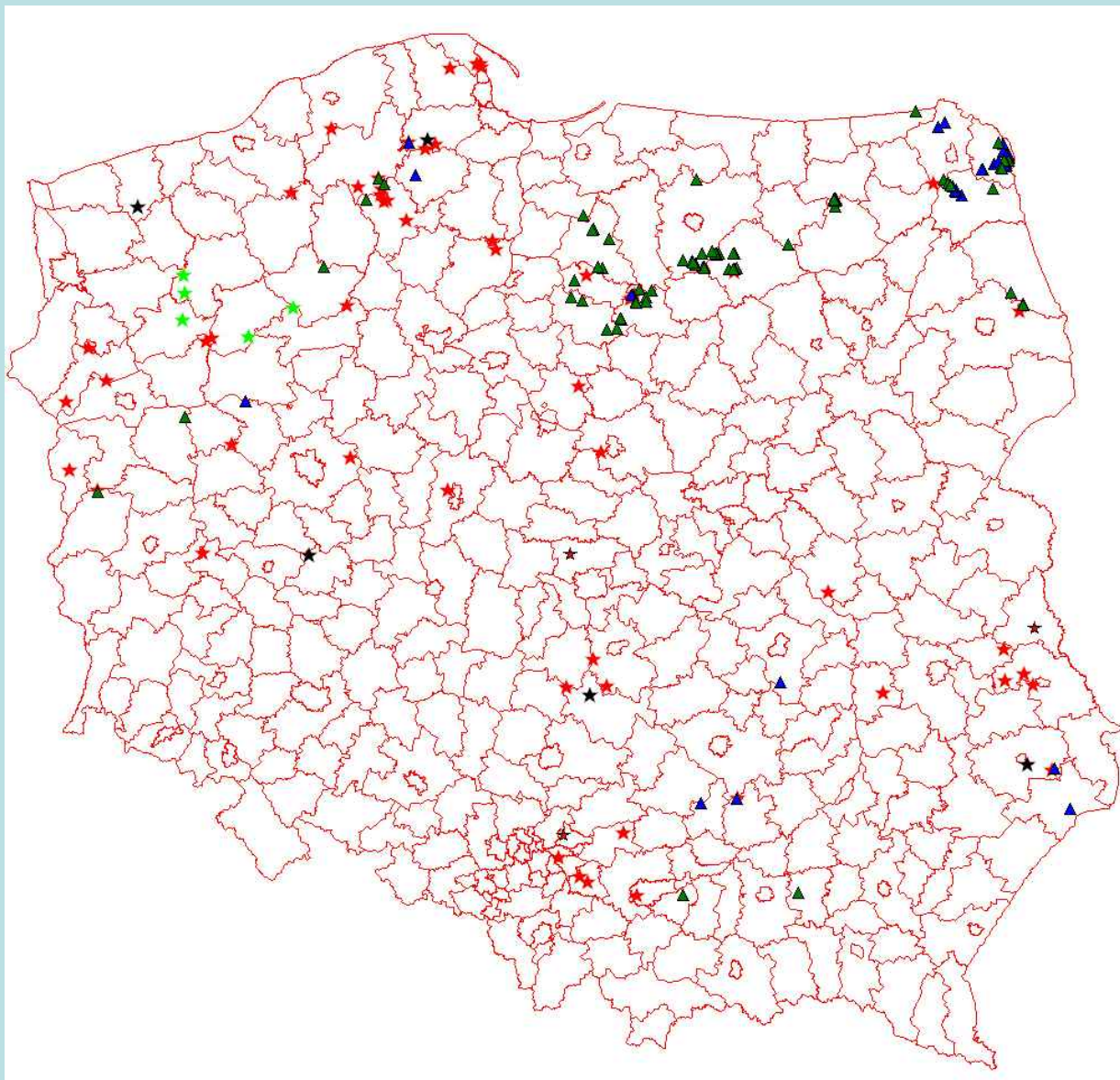


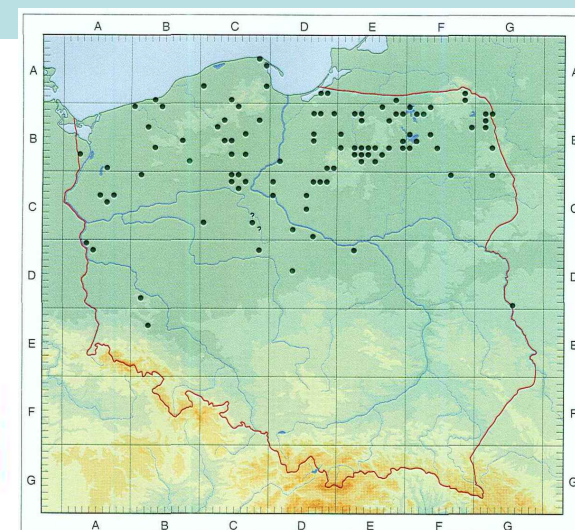
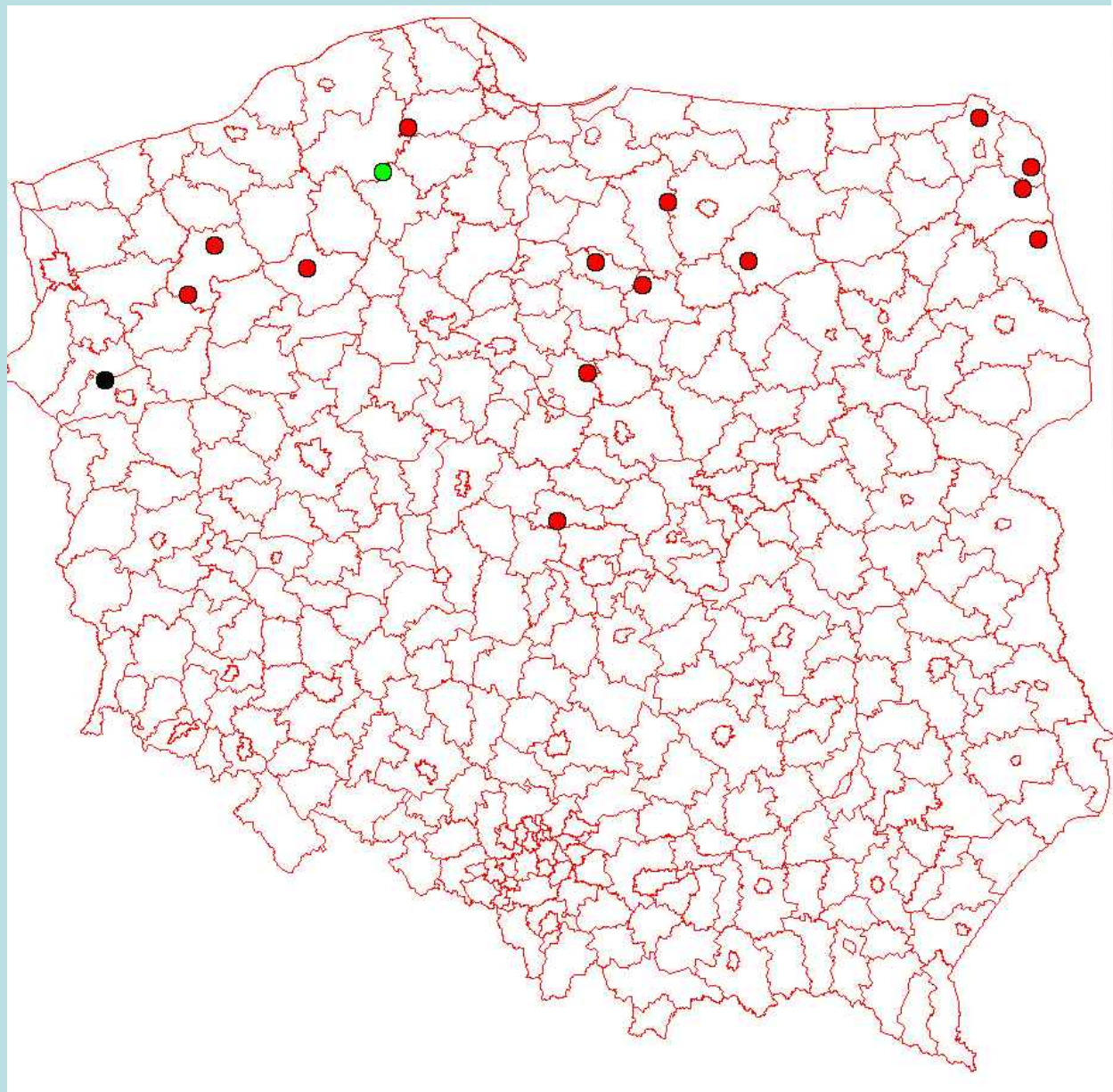
7230 synthesis - current knowledge



Objectives :
1000 objects
15000 ha
Species:
Liparis loeselii
Saxifraga hirculus
Stellaria crassifolia
Herminium monorchis

Inventory by State Forestry
Inventory by BUL (protected areas outside SF)
Publications
Other (e.g. SDF)





Stellaria crassifolia Ehrh.⁸⁹¹
Gwiazdnica grubolistna

Stellaria crassifolia

Thank you!

