ACTA MYCOLOGICA
Vol. 29 (1): 95-98
1994

New localities of some rare species of *Uredinales* in Poland

AGATA WOŁCZAŃSKA

Maria Curie-Skłodowska University, Institute of Biology, Department of Botany, Akademicka 19, 20-033 Lublin, Poland

Wołczańska A.: *New localities of some rare species of Uredinales in Poland.* Acta Mycol. 29 (1): 95-98, 1994.

The paper presents new localities of some rare species of *Uredinales*. They were collected in south-eastern part of Poland.

Since 1990 investigations on the occurrence of microscope fitopathogenic fungi have been undertaken in Doły Jasielsko-Sanockie and in Beskid Niski mountains. A great many herbarium specimens have been collected, which are now being identified and which will be gradually published.

Among the collected rust fungi, the most interesting species identified were, as follows: *Puccinia cnici-oleracei* on *Cirsium oleraceum*, *P. dentariae* on *Cardamine bulbifera*, *P. deschampsiae* on *Deschampsia caespitosa*, *P. vulpinae* on *Carex vulpina*, *Pucciniastrum guttatum* on *Galium mollugo*, *Uromyces ononidis* on *Ononis arvensis*. These species are known to occur only in few localities. *Puccinia caricicola* found on *Carex supina* and collected in Wyżyna Małopolska has been included in the index.

The data regarding the occurrence of the fungi have been based on available literature (Danilkiewicz, 1985, 1987; Majewski, 1977, 1979; Mułenko, 1988; Romaszewska-Sałata, 1982; Romaszewska-Sałata, Mułenko, 1983).

COLLECTED SPECIES AND THEIR LOCALITIES

Puccinia caricicola Fuck. on *Carex supina* Willd. ex Wahlenb.: Podgrodzie near Ćmielów, on a steppe slope (leg. et det. J. Romaszewska-Sałata): VIII. The fungus has been recorded so far in Poland only in Góry Pieprzowe mountains near Sandomierz (Fig. 1 A).

Only *Uredinia* can be found on the attacked specimens. Subsequently urediniospores of the size 17-30 x 14-20 µm develop and few amfispores (Pl. 1. fot. 4 a, b).

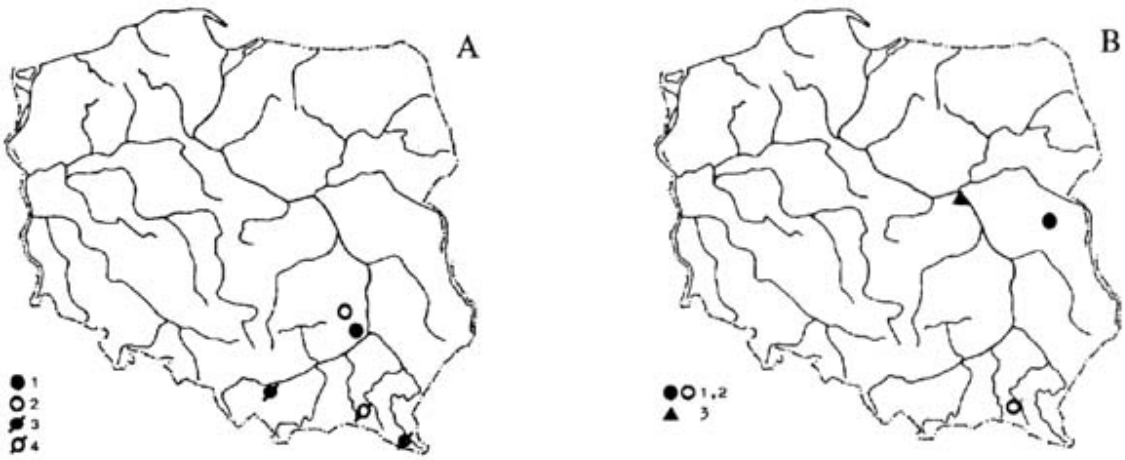
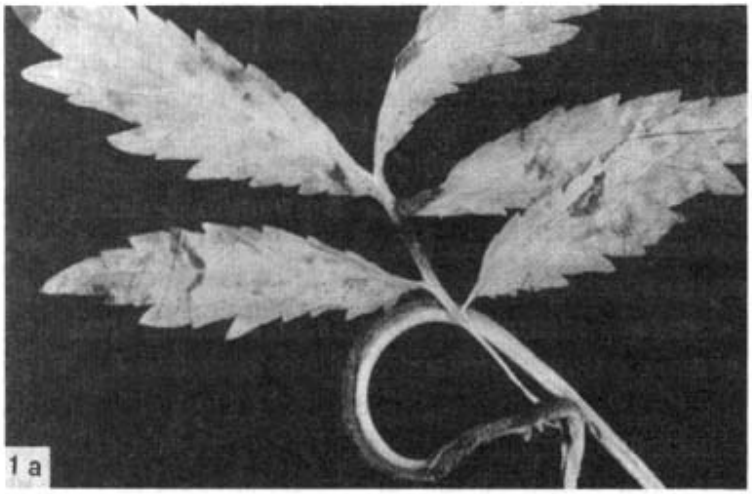


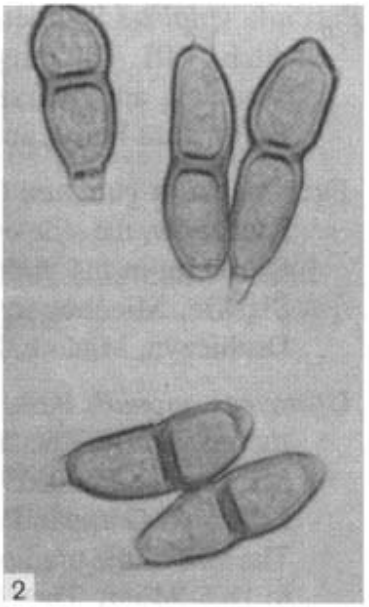
Fig. 1. A – The occurrence of *Puccinia caricicola* Fuck. on *Carex supina* (1, 2) and *Puccinia dentariae* (Alb. et Schw.) Fuck. on *Cardamine bulbifera* (3, 4)
1, 3 – first localities; 2, 4 – new localities
B – The occurrence of *Uromyces ononidis* Pass.
1, 2 – on *Ononis arvensis*; 3 – on *Ononis spinosa*

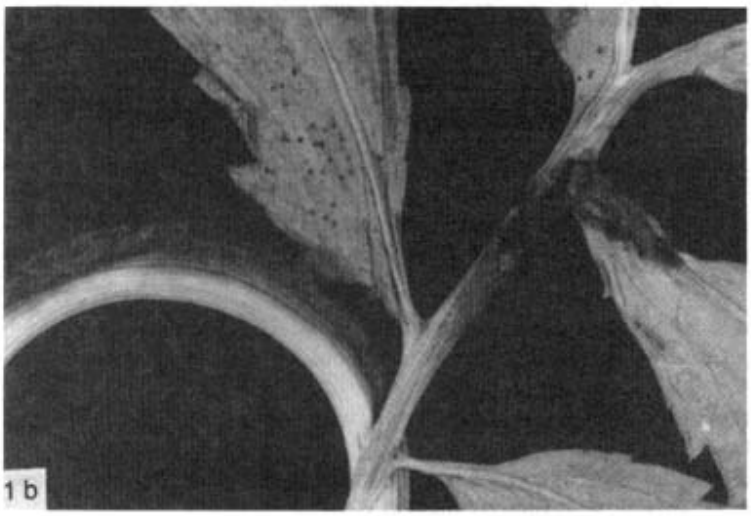
Puccinia cnici-oleracei Pers. ex Desm. on *Cirsium oleraceum* (L.) Scop.: Rymanów a side of a drainage ditch; VIII. The fungus on the host has so far been reported from: Beech Forest near Szczecin, Skonał Lake near Giżycko, Reserve Czartowe Pole (Roztocze) and Ustrzyki Górne.

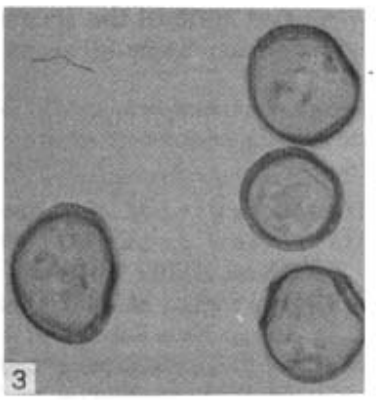
Puccinia dentariae (Alb. et Schw.) Fuck. on *Cardamine bulbifera* (L.) Crantz: Iwonicz Zdrój, the slope of Góra Krzemionki (= Przedziwna), in *Dentario glandulosae-Fagetum*; V. The fungus has been noted only in Kalwaria Zebrzydowska and in Połonina Caryńska (Bieszczady) (Fig. 1 A).
The collected specimens are strongly attacked and deformed. Telia form very big clusters (up to 8 cm long), mainly on the stem and leaf petioles, and smaller ones on the leaves (Pl. 1, fot. 1 a, b). Teliospores are a bit larger than those described in literature and are respectively: 32-51 x 14-18 µm (Pl. 1, fot. 2).

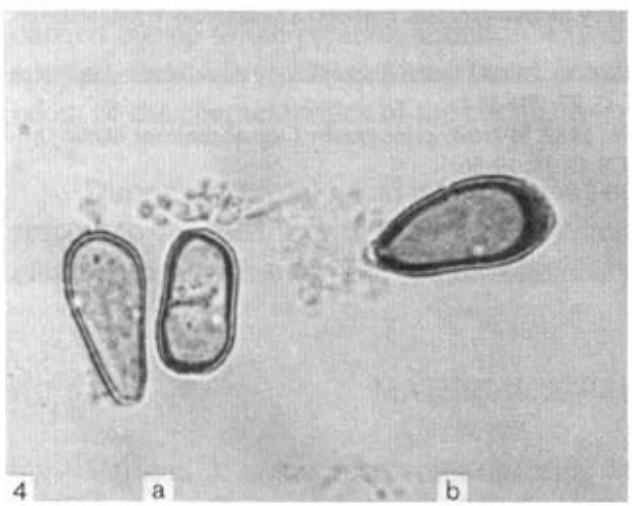
Puccinia deschampsiae Arth. on *Deschampsia caespitosa* (L.) Beauv.: Rymanów, in a meadow association belonging to the class *Molinio-Arrhenatheretea*; X. Other localities: the surroundings of Szczecin and Stargard, Puszcza Kampinoska Forest, Mała Wieś n. Grójec, Babia Góra, Pieniny mountains, Bieszczady Zachodnie mountains, Woskrzenice (the valley of the River Krzna), Woroblin (the valley of the middle part of the River Bug) and Łęczna-Włodawa Lake District. Only telia were found on the collected leaves. Teliospores are slightly larger than those described in literature and are respectively: 35-58 x 14-20 µm (Pl. 1, fot. 5).











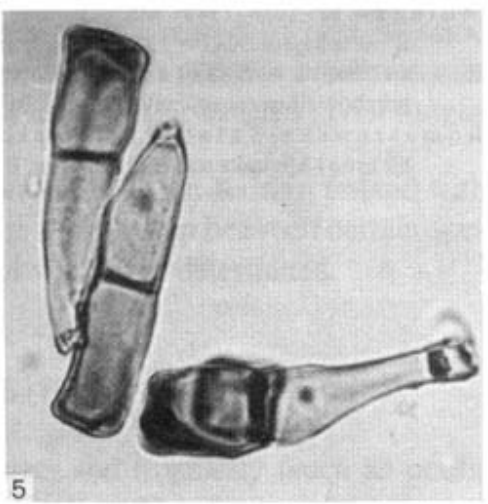


Plate I. 1 a, b – Telia of *Puccinia dentariae* (Alb. et Schw.) Fuck. on steam and leaf of *Cardamine bulbifera*, 2 – Teliospores of *Puccinia dentariae* (Alb. et Schw.) Fuck, 3 – Urediniospores of *Uromyces ononidis* Pass. on *Ononis arvensis*, 4 – Spores of *Puccinia caricicola* Fuck. on *Carex supina*: a – urediniospores, b – an amfispore, 5 – Teliospores of *Puccinia deschampsiae* Arth. on *Deschampsia caespitosa*

Puccinia vulpinae Schroet. on *Carex vulpina* L.: Rymanów, the side of a drainage ditch; VIII. The fungus has also been noted in the surroundings of Legnica, Wrocław and Warszawa, Ludwikowo, Samostrzel by the River Noteć, in Białowieża Forest and Międzyrzec Podlaski.

Pucciniastrum guttatum (Schroet.) Hyl. Jørst. et Nannf. on *Galium mollugo* L.: Rymanów, the side of a drainage ditch; VIII. Other localities: Beech Forest n. Szczecin, in the vicinity of Wrocław, Warszawa and Olsztyn, in Ząbkowice Śląskie, Miechowice, Zakopane, Pieniny mountains, Kamień n. Mrągów, Drohiczyn, Mielnik, Białowieża Forest and Puszcza Knyszyńska Forest.

Uromyces ononidis Pass. on *Ononis arvensis* L.: Rymanów, in *Molinio-Arrhenatheretea*; VIII. The fungus on this host has been recorded in the vicinity of Międzyrzec Podlaski. In Poland it also occurs on *Ononis spinosa* L. only in Łomianki Górne in Puszcza Kampinoska Forest (Fig. 1 B).

The size of the urediniospores on the collected specimens ranged from 19.5-26 to 18.5-24 μm. They have 3-4 germ pores arranged irregulary or at an equatorial zone of the spores, covered by distinct, flattish cups (Pl. I, 3).

REFERENCES

Danilkiewicz M., 1985. Notatki mikologiczne z doliny Krzny. Acta Mycol. XXI (1): 77-80.

Danilkiewicz M., 1987 (1990). Grzyby pasożytnicze lewobrzeżnej doliny środkowego Bugu. Acta Mycol. XXIII : 37-80.

Danilkiewicz M., 1987. Mikroskopowe grzyby pasożytnicze łąk i pastwisk doliny Krzny. Zesz. Problem. Postęp. Nauk Rol. 307: 91-104.

Majewski T., 1977. Podstawczaki (*Basidiomycetes*), rdzawnikowe (*Uredinales*) I. [In:] Flora Polska, Grzyby. IX. Warszawa-Kraków. pp. 394, pl. I-III. – 1979. Ditto, II. Ibid. XI. pp. 426, pl. I-II.

Mułenko W., 1988 (1989). Mikroskopowe grzyby fitopatogeniczne Pojezierza Łęczyńsko-Włodawskiego. II. Acta Mycol. XXIV: 125-171.

Romaszewska-Sałata J., 1982. Nowe dla flory Polski i rzadziej spotykane gatunki mikroskopijnych grzybów fitopatogenicznych. Ann. UMCS, C, 37: 201-214.

Romaszewska-Sałata J., Mułenko W., 1983. Mikroskopijne grzyby fitopatogeniczne okolic Drohiczyna i Mielnika nad Bugiem. Ann. UMCS, C, 38: 19-36.