



CONTRIBUTION TO THE FLORA OF MONTENEGRO (SUPPLEMENTUM TO THE MATERIAL FOR VASCULAR FLORA OF MONTENEGRO)

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supplementum

SYNOPSIS

In this contribution we are presenting joint results of different floristic surveys undertaken over Podgorica, Kolašin, Cetinje, Nikšić and Andrijevica municipality.

Following taxa are recorded as new in the flora of Montenegro: *Amaranthus caudatus* L., *Chenopodium strictum* Roth., *Coreopsis lanceolata* L., *Dactylis glomerata* L. subsp. *lobata* (Drejer) Lindb., *Gymnadenia odoratissima* (L.) Rich, *Eragrostis barrelieri* Daveau, *Lobularia maritima* (L.) Desv, *Platanus x hispanica* Münch., *Potamogeton coloratus* Vahl. and *Viola pumila* Chaix.

In this paper we also included a list of published taxa (rank of species and subspecies), which are not included in Pulević's "Material for Vascular Flora of Montenegro", so the paper presents a kind of second Supplement to Rohlena's Conspectus.

Ključne riječi:

vaskularna flora, Crna gora, novi taksoni, dodatak Rohleni

SINOPSIS

U ovom prilogu smo objedinili florističke nalaze nove za područje Crne Gore, a koji su proistekli iz niza uporednih florističkih istraživanja sprovedenih na području opština: Podgorica, Kolašin, Cetinje, Nikšić i Andrijevica. Sledеći taksoni su evidentirani kao novi za našu floru: *Amaranthus caudatus* L., *Chenopodium strictum* Roth., *Coreopsis lanceolata* L., *Dactylis glomerata* L. subsp. *lobata* (Drejer) Lindb., *Gymnadenia odoratissima* (L.) Rich, *Eragrostis barrelieri* Daveau, *Lobularia maritima* (L.) Desv, *Platanus x hispanica* Münch., *Potamogeton coloratus* Vahl. and *Viola pumila* Chaix.

Radu je dodata i lista objavljenih taksona, koji nisu uključeni u Pulevićeve „Materijale za Vaskularnu Floru Crne Gore“, pa se s toga rad može smatrati za drugi dodatak Rohleni.

INTRODUCTION

Conspectus Flora Montenegrinae (Rohlena, 1942) for a long time presented the most complete publication about the flora of Montenegro. Conspectus consists of 2632 species and 193 subspecies of vascular plants, as well as of numerous lower infraspecies taxa as varieties and forms. In 2005. Pulević published "Material for Vascular Flora of Montenegro- A supplement to "Conspectus Flora Montenegrinae". It included all taxa which were reported in the period "after Rohlena", but also a taxa which Rohlena from some reason omitted. In the mean time (2005-2007), in different literature sources numerous new records for the flora of Montenegro were published.

The main idea of this publication is to join all published data and newest records in one publication which will present a Second Rohlena's supplement.

MATERIALS AND METHODS

Material collected during the field surveys is stored in Herbarium Collections at Faculty of Sciences (University of Montenegro) and Natural History Museum of Montenegro. Identification is done by standard keys for identification of Vascular plants, while nomenclature is accorded to Tutin et al. (1964-1980, 1993), Greuter et al. (1984, 1986, 1989), Kurrto et al. (2007), Pignati (1982), Martinčić et al. (2007).

If the taxon is not listed in Rohlena's Conspectus, Pulević's Materials and papers published after 2005, it is considered as new for the flora.

Actual name of new recorded taxa is followed by synonym, information about distribution in Europe or origin, name of the locality in Montenegro, name of legator and habitat type. For all taxa appropriate comment is given.

List of already published records consists of actual name of the taxon (species or subspecies), synonym, literature source and locality. In citation of Martinčić data following abbreviations are used: AK – A. Kofol; AM – A. Martinčić; AP – A. Podobnik; ML – M. Lovka; MK – M. Kralj; TW – T. Wraber.

In appendix, photos of some new reported taxon are given.

RESULTS AND DISCUSSION

Check list of Vascular Flora of Montenegro is enlarged for 10 new recorded taxa. Their names are given below in alphabetical order:

Actual name of the taxon: *Amaranthus caudatus* L.

Family: *Amaranthaceae*

Origin/area of distribution: South America, sometimes occurs as casual (Tutin et al. 1993: 131)

Location in Montenegro: Međuriječe (near the bridge), leg. Stešević.

Habitat type: spontaneously growing vegetation near the road side.

Comment: Population of *Amaranthus caudatus* counted 6 individuals. Question that should be answered in the future: Should *Amaranthus caudatus* be classified as casual alien or it has potential to become naturalized?

Actual name of the taxon: *Chenopodium strictum* Roth.,

Syn: *C. album* L. subsp. *striatum* (Krašan) J. Murr

Family: *Chenopodiaceae*

Area of distribution: C. & S.E. Europe (Tutin et al. 1993: 114)

Location in Montenegro: City area of Podgorica, leg. Stešević.

Habitat type: ruderalis, spontaneously growing vegetation near road side, city lawns, parking plots etc.

Comment: *C. strictum* is closely related and also is very similar to *C. album*. In addition it usually shares the same habitat types. From that reason we suspect that in previous identifications these two species were confused. Due to the fact that *C. strictum* is native for this region we expect that area of its distribution in Montenegro is much broader than city area of Podgorica.

Plant image is given on photo 1.

Actual name of the taxon: *Coreopsis lanceolata* L.

Syn: *C. crassifolia* Ait., *C. heterogyna* Fern.

Family: *Asteraceae*

Origin: North America (Lauber & Wagner 2001: 1078)

Location in Montenegro: Carev laz, leg. Petrović.

Habitat type: spontaneously growing vegetation near the road side.

Comment: Species was for the first time noticed in 2006. Population size was estimated as "up to 20 individuals". In next two years number of individuals rapidly increased, and species started to spread linearly along the road, in both directions (Cetinje and Podgorica).

Plant image is given on photo 2.

Actual name of the taxon: *Dactylis glomerata* L. subsp. *lobata* (Drejer) Lindb.

Syn. *D. glomerata* L. subsp. *aschersoniana* (Graebner) Thell., *D. aschersoniana* Graebner, *D. polygama* Horvátovszky,

Family: *Poaceae*

Area of distribution: Mainly in W. & C. Europe (Tutin et al. 1980: 171)

Location in Montenegro: City area of Podgorica, Donji Crnci (Piperi), leg. Stešević.

Habitat type: fragments of natural forest vegetation, spontaneously growing vegetation near forest path.

Comment: At each locality subspecies occurred in meager populations and as we could observe it preferred shady and not much disturbed habitats. Due to the fact that in the process of identification, majority of herbarium material from *Dactylis glomerata* group was left on the group level, we expect that future revision of the

material, as well as further field surveys will result with more information about distribution of this taxon in Montenegro.

Actual name of the taxon: *Gymnadenia odoratissima* (L.) Rich.

Syn: *Orchis odoratissima* L.

Family: *Orchidaceae*

Area of distribution: from S. Sweden and W.C. Russia southwards to N. Spain, N. Italy and C. Jugoslavia (Tutin et al. 1980: 332). For ex Jugoslavian Republics Hayek (1932-1933: 407) indicate the species in Croatia, Bosnia and Serbia.

Location in Montenegro: Donji kraj, near summer stage (Cetinje), leg. Vuksanović.

Habitat type: wet meadow.

Comment: Population of *Gymnadenia odoratissima* is rather small and it has only 12 mature individuals. In its vicinity the most common species of this genus - *Gymnadenia conopsea* (L.) R. Br. is recorded. Main distinguishing character between these two *Gymnadenias* is length of spur: *G. odoratissima* has much shorter one (4-5mm), and it doesn't exceed ovary (see photo 3).

Actual name of the taxon: *Eragrostis barrelieri* Daveau

Family: *Poaceae*

Area of distribution: W. Mediterranean, but its distribution is probably imperfectly known, owing to confusion with *E. minor* (Tutin et al. 1980: 257).

Location in Montenegro: City area of Podgorica, leg. Stešević.

Habitat type: disturbed grounds, crevices in the pavement, trampled habitats, exploitation sites of the gravel etc.

Comment: Species is for the first time recorded at the city area of Podgorica in 2004, while identification of material is confirmed at beginning of 2008, by using more detailed key for identification of *Eragrostis* species (Portal 2002&Röthlisberger 2005). The main characters that distinguish this species from similar *E. minor* are: glandular relief below racems, absence of glands at the margin of leaf blades and few flowered spikelets bearing nearly to base (see photo 5).

Actual name of the taxon: *Lobularia maritima* (L.) Desv,

Syn: *L. strigulosa* (G. Kunze) Willk., *Konica maritima* (L.) R. Br., *Alyssum maritimum* (L.) Lam

Family: *Brassicaceae*

Area of distribution: S. Europe, but widely cultivated for ornamental elsewhere, and often naturalized or casual (Tutin et al. 1993: 371).

Location in Montenegro: City area of Podgorica, leg. Stešević.

Habitat type: city lawns, spontaneously growing vegetation near road sides, fissures in pavements, different kind of disturbed habitats, even roofs.

Comment: For the first time *Lobularia maritima* was collected in one old outdoor flowerpot, accompanied with some wild growing plants as *Veronica hederifolia*, *Veronica persica*, *Crepis sancta*, so we were not sure if it was planted or

spontaneously growing. Later plant was notify as element of the flora of spontaneously growing vegetation near road sides, city lawns, different kind of disturbed grounds, grasslands and even roofs. In year 2008, we recorded single individuals with rather big and liliac colored flowers, for which we assume that presents escaped cultivars.

Plant image is given on photo 4.

Actual name of the taxon: *Platanus x hispanica* Münch.

Syn. *Platanus acerifolia* (Aiton) Willd., *P. hybrida* Brot.

Familia: *Platanaceae*

Distribution: Commonly planted in much of Europe, especially as a roadside tree and in cities; widely naturalized in S. Europe (Tutin et al. 1993).

Location: City area of Podgorica, leg. Stešević.

Habitat type: spontaneously growing vegetation near river banks, roofs, ruderalis etc.

Comment: Species is often growing as roadside tree, so we suppose that it was the centre of its spreading.

Actual name of the taxon: *Potamogeton coloratus* Vahl.

Family: *Potamogetonaceae*

Distribution: W. & C. Europe, extending to S. Sweden (Tutin et al. 1980).

Location: Water accumulation Krupac (behind big dam), leg. Bubanja.

Habitat type: calcareous water

Comment: Population size of the taxon is assessed with approximately 30 individuals. Due to the fact that species has rather wide range of distribution we expect to find it on more localities with similar ecological conditions.

Actual name of the taxon: *Viola pumila* Chaix

Family: *Violaceae*

Distribution area: Mainly in C. & E. Europe, northwards to c. 56° in Russia, extended to N. Italy, W. France and the Baltic islands (Tutin et al. 1968: 175)

Location in Montenegro: Bare Budoške (reservoir Vrtac), leg. Bubanja.

Habitat type: wet meadows

Comment: Although during the field survey over Bare Budoške only one rather small population is recorded, due to wide distribution range of the taxa we expect to find it at additional locations with similar habitat type.

Image of the plant is given at photo 6.

In continuum Second Supplementum to Rohlena's Conspectus is given. It consists of 104 taxa rank species and subspecies.

fam. ACERACEAE

Acer negundo L.

(Stešević & Jovanović 2005: 66, city area of Podgorica)

fam: ALISMATACEAE

Caldesia parnassifolia (L.) Parl.
(Biberdžić 2007: 151, Skadar Lake)

fam. AMARANTHACEAE

Amaranthus caudatus L.
New taxon for the flora of Montenegro!

Amaranthus chlorostachys Willd.
(Stešević & Jovanović 2005: 66, city area of Podgorica)
Amaranthus cruenthus L.
(Stešević & Jovanović 2005: 66, city area of Podgorica)
Amaranthus powellii S. Watson
(Stešević & Jovanović 2005: 66, city area of Podgorica)

fam. ASCLEPIADACEAE

Asclepias syriaca L.
(Stešević & Jovanović 2005: 66, city area of Podgorica)

fam. ASTERACEAE

Artemisia verlotiorum Lamotte
(Stešević & Jogan 2006: 173, city area of Podgorica)
Aster lanceolatus Willd.
(Bulić 1994: 190, Cijevna)
Aster novi belgii L.
(Stešević & Jovanović 2005: 67, city area of Podgorica)
Bidens frondosa L.
(Stešević & Jovanović 2005: 67, city area of Podgorica)
Conyza albida Willd.
(Stešević & Jovanović 2005: 67, city area of Podgorica)
Conyza bonariensis (L.) Cronq.
(Stešević & Jovanović 2005: 67, city area of Podgorica)
Coreopsis lanceolata L.
Syn: *C. crassifolia* Ait., *C. heterogyna* Fern.
New taxon for the flora of Montenegro!
Erigeron anuus (L.) Pers. Subsp. *serpentionalis* (Fernald & Wieg.) Wagenitz
(Stešević & Jovanović 2005: 67, city area of Podgorica)
Gaillardia aristata Pursh
(Stešević & Jovanović 2005: 67, city area of Podgorica)
Helianthus tuberosus L.
(Stešević & Jovanović 2005: 68, city area of Podgorica)
Iva xanthifolia Nutt.
(Stešević & Jovanović 2005: 68, city area of Podgorica)

Rudbeckia triloba L.

(Stešević & Jovanović 2005: 68, city area of Podgorica)

Scorzonera mollis Bieb.

(Hadžiablahović 2006: 95, Podgorica- Dinoško polje, right from Cijevna river)

Tagetes patula L.

(Stešević & Jovanović 2005: 68, city area of Podgorica)

Zinnia elegans Jacq.

(Stešević & Jovanović 2005: 68, city area of Podgorica)

fam. BALSAMINACEAE

Impatiens balsamina L.

(Stešević & Jogan 2007: 156, 157, Podgorica- Tološko polje)

fam. BERBERIDACEAE

Mahonia aquifolium (Pursh) Nutt.

(Stešević & Jovanović 2005: 68)

fam. BIGNONIACEAE

Catalpa bignonioides Walt.

(Stešević & Jogan 2007: 159, Podgorica, left bank of River Morača- near Botun)

fam BORAGINACEAE

Onosma pseudoarenaria Schur. subsp. *tridentata* (Wettst.) Br.-Bl.

(Bubanja & Vuksanović 2007: 27, Nikšićka Župa)

fam. BRASSICACEAE

Descuriania sophia (L.) Webb ex Prantl

syn. *Sisymbrium sophia* L.

(Hadžiablahović 2006: 95, Podgorica- Trg Božane Vučinić)

Lobularia maritima (L.) Desv,

Syn: *L. strigulosa* (G. Kunze) Willk., *Koniga maritima* (L.) R. Br., *Alyssum maritimum* (L.) Lam

New taxon for the flora of Montenegro!

fam. CACTACEAE

Opuntia vulgaris Miller.

syn. *O. humifusa* Rafin., *O. compressa* (Salisbury) Mabride

(Stešević & Jovanović 2005: 69, city area of Podgorica)

fam: CAMPANULACEAE

Edraianthus dalmaticus A.DC.

(Bubanja et al. 2007: 21, Nikšić vicinity- Budoške bare, reservoir Vrtac)

Edraianthus x lakusicii = *E. tenuifolius* (Waldst. & Kit.) A. DC. x *E. wettsteinii*

Haláschy subsp. *lovcenicus* E. Mayer & Blečić

(Lakušić et al. 2007: 46)

fam. CARYOPHYLLACEAE

Cerastium malyi (Georgiev) Niketić
(Niketić et al. 2007a: 391)

Heliosperma oliverae Niketić & Stevanović
(Niketić & Stevanović 2007b: 60, Gusinjske Prokletije)

fam. CHENOPodiACEAE

Chenopodium strictum Roth.,
Syn: *C. album* L. subsp. *striatum* (Krašan) J. Murr
New taxon for the flora of Montenegro!

fam. COMMELIACEAE

Tradescantia virginiana L.
(Stešević & Jovanović 2005: 69, city area of Podgorica)

fam. CONVOLVULACEAE

Ipomea purpurea Roth.
(Stešević & Jovanović 2005: 69, city area of Podgorica)

fam. CRASSULACEAE

Sedum sarmentosum Bunge.
(Stešević & Jovanović 2005: 69, city area of Podgorica)

fam. CUCURBITACEAE

Citrullus lanatus (Thunb.) Mansfeld.
(Stešević & Jovanović 2005: 69, city area of Podgorica)
Sycois angulatus L.
(Stešević & Jovović 2005: 17, Jasenova village, above Morača Monastery)

fam. CYPERACEAE

Schoenoplectus triquetus (L.) Palla
(Blaženčić 2007: 78, Šasko jezero, 1mnv)

fam. EUPHORBIACEAE

Euphorbia humifusa Willd.
(Stešević & Jovanović 2005: 70, city area of Podgorica)
Euphorbia marginata Pursh.
(Stešević & Jovanović 2005: 70, city area of Podgorica; Hadžiablahović 2006:
96, Podgorica- Konik)
Euphorbia nutans Lag.
(Stešević & Jovanović 2005: 70, city area of Podgorica)

fam. FABACEAE

Ononis reclinata L.

(Hadžiablahović 2006: 97, Tuzi- Dečić hill, Podgorica- close to "Agrokombinat 13. jul", Ržanički most & Dinoško polje)

fam. GENTIANACEAE

Gentianella bulgarica (Velen) Holub

(Markišić 2002:252)

fam. IRIDACEAE

Iris orjenii Bräuchler & Čikovac

(Bräuchler & Cikovac 2007: 221, Orjen)

fam. LAMIACEAE

Mentha piperita L.

(Stešević & Jovanović 2005: 70, city area of Podgorica)

Perilla frutescens (L.) Britton

(Stešević & Jovanović 2005: 71, city area of Podgorica)

fam. LEMNACEAE

Lemna trisulca L.

(Lakušić 1983: 105- Skadarsko jezero; Blaženčić 1989: 32,34- Martinovićko blato od Plava)

fam. LILIACEAE

Gagea amblyopetala Boiss & Heldr.

(Stešević 2006: 70, Podgorica- Sadine)

fam. MALVACEAE

Hibiscus syriacus L.

(Stešević & Jovanović 2005: 71, city area of Podgorica)

fam. MIMOSACEAE

Acacia dealbata Link.

(Stešević & Jovanović 2005: 71, city area of Podgorica)

Albizia julibrissin Duv.

(Stešević & Jovanović 2005: 71, city area of Podgorica)

fam. MORACEAE

Broussonetia papyrifera L'Herit ex Vent.

(Stešević & Jovanović 2005: 71, city area of Podgorica)

fam. NYCTAGINACEAE

Mirabilis jalapa L.

(Stešević & Jovanović 2005: 71, city area of Podgorica)

fam. OLEACEAE

Fraxinus pensylvanica Marshall

(Hadžiablahović, 2006: 98, Podgorica, Lake Skadar, between Virpazar and Vranjina)

fam. ORCHIDACEAE

Gymnadenia odoratissima (L.) Rich.

Syn: *Orchis odoratissima* L.

New taxon for the flora of Montenegro!

Nigritella rhellicani Teppner & Klein

(Stešević & Mayrhofer 2007: 104)

Fam. PAEONIACEAE

Paeonia daurica Andrews

(Cikovac 2005, Orijen)

Fam. PITTOSPORACEAE

Pittosporum tobira (Thunb.) Aiton fil.

(Stešević & Jovanović 2005: 71, city area of Podgorica)

Fam. PLATANACEAE

Platanus x hispanica Münch.

Syn. *Platanus acerifolia* (Aiton) Willd., *P. hybrida* Brot.

New taxon for the flora of Montenegro!

fam. POACEAE

Dactylis glomerata L. subsp. *lobata* (Drejer) Lindb.

Syn. *D. glomerata* L. subsp. *aschersoniana* (Graebner) Thell. *D. aschersoniana* Graebner, *D. polygama* Horvátovszky,

New taxon for the flora of Montenegro!

Eragrostis barbelieri Daveau

New taxon for the flora of Montenegro!

Heteropogon contortus (L.) Beauv.

(Hadžiablahović, 2006: 96, Danilovgrad- Bandići, Lake Skadar, between Virpazar and Vranjina).

Panicum capillare L.

(Stešević & Jovanović 2005: 71, city area of Podgorica)

Setaria verticilliformis Dumort.

(Stešević & Jogan 2007: 153, city area of Podgorica)

Setaria viridis (L.) PB. subsp. *pycnocoma* (Steud) Tzvel.

(Stešević & Jogan 2007: 156, Gornji Kokoti, roadside Podgorica-Cetinje)

Sporobolus vaginiflorus

(Stešević & Jogan 2006: 174, city area of Podgorica)

Fam. POLYGONACEAE

Reynoutria japonica Houtt.

(Stešević & Jovanović 2005: 73, city area of Podgorica)

Fam. POTAMOGETONACEAE

Potamogeton coloratus Vahl.

New taxon for the flora of Montenegro!

Potamogeton obtusifolius Mert. et Koch

(Blaženčić 2007: 68, Žabljačka rijeka Durmitor, Vražje jezero 1411m (Durmitor), Pošćensko jezero kod Šavnika, blizu kanjona Komarnice, 890m)

Potamogeton panormitanus Biv.

(Blaženčić 2007: 68, Slano jezero, Nikšić)

Potamogeton decipiens Nolte

(Blaženčić 2007: 65, Plavsko jezero 907m)

Potamogeton rutilus Wolfgang.

(Blaženčić 2007: 70, Plavsko jezero, Prokletije 907m, Martinićko blato, Prokletije, 907m)

Fam. RANUNCULACEAE

Ranunculus hayekii Dörfel.

(Bulić 2008: 112)

fam. ROSACEAE

Alchemilla acutiloba Opiz

(Martinčić 1990: 28, Prokletije: Popadija, dolina Grbaja, Čakor 1700 m (AM)).

A. bertiscea spec. nov.

(Martinčić 1990: 30, Prokletije: Karanfil 1900 m (AM-ML)).

A. bulgarica Rorhmaler

(Martinčić 1990: 25, Belić (AM)).

A. catachnoa Rothmaler

(Martinčić 1990: 30, Bjelasica: Lalovića Dolovi 1740 m (TW-ML); Prokletije: Trojan 1900 m, Belić 2000 m (AM)).

A. colorata Buser

syn. *A. illyrica* Rothmaler

(Martinčić 1990: 27, Durmitor: Mali Štulac, Savin kuk (AM)).

A. connivens Buser

(Martinčić 1990: 29, Prokletije: Popadija 1800 m (TW-ML); Žljeb (AM)).

A. fallax Buser

(Martinčić 1990: 31, Prokletije: Karanfil 1900 m (AM-ML)).

A. exigua Buser ex Paulin

(Martinčić 1990: 26, Prokletije: Belić (AM)).

A. glomerulans Buser

(Martinčić 1990: 29, Prokletije: Belić 2100 m, Karanfil 200 m (AM).

A. gorcensis Pawłowski

(Martinčić 1990: 31, Prokletije: dolina Grbaja pri Gusinju (AM), Šuplja vrata na d dolino Ljubokuć 2050 m (TW-ML), Hajla nad Rožajem 1500 m (TW-ML).

A. incisa Buser

(Martinčić 1990: 31, Prokletije: Bals nad dolino Grbaja 1500 m (TW-ML), dolina Grbaja 1200 m (AM), Karanfil 1700 m (AM-ML).

A. lineata Buser

(Martinčić 1990: 29, Prokletije: Čakor 1700 m (AM).

A. micans Buser

syn. *A. gracilis* Opiz

(Martinčić 1990: 28, Durmitor: Žabljak (AM); Prokletije: Hajla nad Rožajem 1800 m (TW-AP).

A. monticola Opiz

(Martinčić 1990: 28, Durmitor: Žabljak (Z. Kolenc), Vr. Štulac, pri Škrčkem jezeru (Z. Kolenc); Prokletije: Čakor 1700 m, dolina Grbaja, Belić, Popadija, Karanfil 2000 m (AM); Žljeb (AM).

A. polonica Pawłowski

(Martinčić 1990: 28, Žljeb nad Rožajem (AM).

Comment: In Kurtto et al 2007 comment given about this taxon is: „identification of the material should be checked“.

A. reniformis Buser

(Martinčić 1990: 29, Prokletije: Žuti kamen 2200 m (AM).

A. straminea Buser

(Martinčić 1990: 30, Prokletije: Čakor 1700 m, Belić (AM).

A. subcrenata Buser

syn. *A. tetricola* Pawłowski

(Martinčić 1990: 27, Žljeb nad Rožajem (AM).

A. venulosa Buser

syn. *A. gracillima* Rothmaler

(Martinčić 1990: 32, Prokletije: Karanfil 2000 m (AM-ML), Žljeb 2000 m (AM-ML), dolina Grbaja 1200 m (AM-ML), Belić (AM-ML); Bjelasica; Lalovića Dolovi 1740 m (ML-TW).

A. xanthochlora Rothmaler

(Martinčić 1990: 28, Prokletije: Karanfil 2000 m, Belić, dolina Grbaja, Čakor (AM), Ljubokuć nad dolino Grbaja 2000 m, Šuplja vrata nad dolino Ljubokuć 2050 m (TW).

Cotoneaster horizontalis Dcne.

(Božović et al. 2006: 103, hill Trijebač, near Podgorica)

Duchesnea indica (Andrews) Focke

(Tomović & Stešević 2007: 162, city area of Berane)

fam. SAPINDACEAE

Koelereuteria paniculata Laxm.

(Stešević & Jovanović 2005: 73, city area of Podgorica)

fam. SOLANACEAE

Petunia x hybrida (Hook.) Vilm.

(Stešević & Jovanović 2005: 73, city area of Podgorica)

fam. SCROPHULARIACEAE

Anthirrhinum barrelieri Boreana

(Stešević & Jovanović 2005: 73, city area of Podgorica)

Linaria genistifolia (L.) Miller subsp. *genistifolia*

(Stešević 2006: 70, city area of Podgorica- "Republika Crnogorskih Serdara")

fam. VITACEAE

Partenocissus quinquefolia (L.) Planchon

(Stešević & Jovanović 2005: 73, city area of Podgorica)

fam. VIOLACEAE

Viola kosaninii (Deg.) Hay.

(Bulić 2008: 145, Čemer, Lemaja, kanjon Cijevne)

Viola pumila Chaix

New taxon for the flora of Montenegro!

CONCLUSION

Second supplement to Rohlrena's Conspectus consists of 104 taxa, and among them 10 are reported as a new for the Vascular flora of Montenegro: *Amaranthus caudatus*, *Chenopodium strictum*, *Coreopsis lanceolata*, *Dactylis glomerata* subsp. *lobata*, *Gymnadenia odoratissima*, *Eragrostis barrelieri*, *Lobularia maritima*, *Platanus x hispanica*, *Potamogeton coloratus* and *Viola pumila*.

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LITERATURE

- BIBERDŽIĆ, V. 2007: *Caldesia parnassifolia* (L.) Parl., New Species in Montenegrin Flora.- Natura Montenegrina, Podgorica, 6: 151-152.
- BRÄUCHLER, C. & CIKOVAC, P. 2007: *Iris orjenii* (Iridaceae) – A new species from the littoral Dinaric Alps.- Willdenowia, Berlin- Dahlem, 37: 221-228.
- BLAŽENČIĆ, J. & BLAŽENČIĆ Ž. 1989: Makrofitska flora i vegetacija Plavskog i Martinovićkog blata, Crnogorska Akademija Nauka i Umjetnosti, Odjeljenje prorodnih nauka, 7: 25-43.
- BLAŽENČIĆ, J. 2007: Floristički pregled slatkovodnih makrofita u Crnoj Gori.- Glasnik Republičkog Zavoda Za Zaštitu Prirode, Podgorica, (29-30): 19-91.
- BOŽOVIĆ, M., KNEŽEVIĆ, B. & STEŠEVIĆ, D. 2006: Flora of Southern part of Piperi (Montenegro). In: Pešić, V. and Hadžiblahović, S. (Eds.), International Symposium of Ecologist of Montenegro 2, Proceedings of the Symposium.- Centre for Biodiversity of Montenegro, Republic Institute for Protection of Nature of Montenegro, Natural History Museum of Montenegro and Institute for Marine Biology, pp. 101-112.
- BUBANJA, N. & VUKSANOVIC, S. 2007: *Onosma pseudoarenaria* Schur. subsp. *tridentata* (Wettst.) Br.-Bl., new taxon in flora of Montenegro.-Natura Montenegrina, Podgorica, 6: 27-30.
- BUBANJA, N., STEVANOVIĆ, V., LAKUŠIĆ, D. 2007: *Edraianthus dalmaticus* A. CD. (Campanulaceae), in Montenegro.- Natura Montenegrina, Podgorica 6: 19-25.
- BULIĆ, Z. 2008: Vaskularna flora kanjona i klisura rijeke Morače u Crnoj Gori.- Univerzitet u Beogradu, Biološki fakultet. Doktorska disertacija, 378 pp.
- CIKOVAC, P. 2005. Distribution and ecology of *Paeonia daurica* Andrews in the Dinaric Alps.- Internationales Päonien-Symposium im Botanischen Garten München, Abstracts. Available at: www.paeonia.de/symposium/irsigler.html (3/10/08)
- GREUTER, W., BURDET, H.M., LONG, G. eds. 1984. Med-checklist 1. Pteridophyta (ed. 2), Gymnospermae Dicotyledones (Acanthaceae-Cneoraceae).- Conservatoire et jardin botaniques de la Ville de Geneve, 330 pp.
- GREUTER, W., BURDET, H.M., LONG, G. eds. 1986. Med-checklist 3. Dicotyledones (Convolvulaceae-Labiatae). Conservatoire et jardin botaniques de la Ville de Geneve, 395 pp.
- GREUTER, W., BURDET, H.M., LONG, G. eds. 1989. Med-checklist 4. Dicotyledones (Laureaceae-Rhamnaceae). Conservatoire et jardin botaniques de la Ville de Geneve, 330 pp.
- HADŽIABLAHOVIĆ, S. 2006. Floristic and chorological additions to the vascular flora of Montenegro. In: Pešić, V. and Hadžiblahović, S. (Eds.), International Symposium of Ecologist of Montenegro 2, Proceedings of the Symposium.- Centre for Biodiversity of Montenegro, Republic Institute for Protection of Nature of Montenegro, Natural History Museum of Montenegro and Institute for Marine Biology, pp. 93-101.

- HAYEK, A. 1933: *Prodromus Florae Peninsulae Balcanicae*, Band 3., Monocotyledonae, Verlag des Repertoriums, Dahlem, 472 pp.
- JALAS, J. & SUOMINEN, J. (Eds.) 1986: *Atlas Flora Europaea, distribution of Vascular plants in Europe*, vol. 7, Caryophyllaceae (Silenoidae).- The Committee for Mapping the Flora of Europe and Societas Biologica Fennica Vanamo, Helsinki, 229 pp.
- JOGAN, N. 2007: Poaceae- trave. In Martinčič (ed.), *Mala flora Slovenije : ključ za določanje praprotnic in semenk.* 4., dopolnjena in spremenjena izd. Ljubljana.- Tehniška založba Slovenije, pp. 862-932
- KURTTO, A., FRÖHNER, S. E., LAMPINEN, R. (eds.) 2007: *Atlas Flora Europaea*. Distribution of vascular plants in Europe 14. Rosaceae (Alchemilla and Aphanes). - The Committee for Mapping the Flora of Europe & Societas Biologica Fennica Vanamo. Helsinki, 200 pp.
- LAKUŠIĆ, R. 1983: Ekosistemi Skadarskog jezera i njegove okoline. In Ivanović, B. (ed.), Skadarsko jezero, radovi sa Simpozijuma.- Crnogorska Akademija Nauka i Umjetnosti, Naučni skupovi, knjiga 9: 101-112.
- LAKUŠIĆ D., RAKIĆ T., STEFANOVIĆ S., MEĐEDOVIĆ S., STEVANOVIĆ V., 2007: *Edraianthus x lakusicii* a new natural hybrid of *Edraianthus* DC. (Campanulaceae) from Montenegro- Međunarodni naučni skup Prirodne- i društvene vrijednosti ekosistema Dinarida- posvećen životu i djelu profesora dr. Radomira Lakušića, Berane, Plav, Andrijevica. Knjiga abstrakata, pp. 46.
- LAUBER, K. & WAGNER, G. 2001: *Flora Helvetica*. Paul Haupt, Bern-Stuttgart-Wien, 1615 pp.
- MARTINČIĆ, A. 1990: Prispevek k poznavanju rodu *Alchemilla* L. v Jugoslaviji [A Contribution to the Knowledge of *Alchemilla* genus in Yugoslavia]. – Biološki vestnik, Ljubljana, 38(3): 23-38.
- MARTINČIĆ, A. WRABER, T., JOGAN, N., PODOBNIK, A., RAVNIK, V., TURK, B., VREŠ, B., FRAJMAN, BOŽO, STRGULC-KRAJŠEK, S., TRČAK, B., BAČIĆ, T., FISCHER, M.A., ELER, K., SURINA, B.(2007) *Mala flora Slovenije : ključ za določanje praprotnic in semenk.* 4., dopolnjena in spremenjena izd. Ljubljana.- Tehniška založba Slovenije, 967 pp.
- MICEVSKI, K. 1985: Flora na SR Makedonija.- Macedonian Academy for Sciences and Art, vol 1(1), 155pp.
- NIKETIĆ, M., STEVANOVIĆ, V., TOMOVIĆ, G. 2007a: Nomenclatural and taxonomic notes on the Flora of Serbia and Balkan peninsula. I Caryophyllaceae.- Archives of Biological Sciences, Belgrade, 59(4): 387-396
- NIKETIĆ, M. & STEVANOVIĆ, V. 2007b: A new species of *Heliosperma* (Caryophyllaceae) from Serbia and Montenegro, Botanical Journal of the Linnean Society, London, vol. 54(1): 55-63
- PIGNATI, S. 1982: *Flora d' Italia*, vol. 1.- Edagricole, 790 pp.
- PORTAL R ED. 2002: *Eragrostis de France et de l'Europe occidentale*.- Vals près Le Puy France, 431 pp.
- PULEVIĆ, V. 2005: Materials for the Vascular flora of Montenegro.- Special edition of Republic institute for Nature Protection of Montenegro, Podgorica, 218 pp.

- PULEVIĆ, V. 2006: Botanists and Montenegro.- Natural History Museum of Montenegro, Special editions, vol 2, 458pp.
- ROHLENA, J. 1942: Conspectus Flora Montenegrinae, Preslia 20-21
- RÖTHLISBERGER J. 2005: Die Gattung Eragrostis in der Schweiz- eine Standortbestimmung, Bauhinia, Basel, 19: 15-28
- STEŠEVIĆ, D. & JOVOVIĆ, Z. 2005: Sycios angulatus L. – a new non-indigenous species in the flora of Montenegro, Herbologia, vol.6(3): 17-24
- STEŠEVIĆ, D. & JOVANOVIĆ S. 2005. Contribution to the knowledge of non indigenous flora of Montenegro. In Terzić, S. (ed), Proceedings of the Workshop devoted to 25th Anniversary of the Faculty of Sciences and Mathematics at University of Montenegro: Contemporary mathematics, physics and biology- University of Montenegro, pp- 65-78.
- STEŠEVIĆ, D. 2006a. Gagea chrysanthia (Jan) Schultes & Schultes fil. and Linaria genistifolia (L.) Miller subsp. genistifolia two new taxon in the flora of Montenegro. In: Pešić, V. and Hadžiblahović, S. (Eds.), International Symposium of Ecologist of Montenegro 2, Proceedings of the Symposium.- Centre for Biodiversity of Montenegro, Republic Institute for Protection of Nature of Montenegro, Natural History Museum of Montenegro and Institute for Marine Biology, pp. 69-72.
- STEŠEVIĆ, D. & JOGAN, N. 2006b. Two new neophytes in the flora of Montenegro: Artemisia verlotiorum and Sporobolus vaginiflorus. -Natura Montenegrina, Podgorica, 5: 173-175
- STEŠEVIĆ, D. & MAZRHOFER, H. 2007: O potrebi revizije taksona Nigritella nigra (L.) Rchb.f. u flori Crne Gore.- Međunarodni naučni skup Prirodne- i društvene vrijednosti ekosistema Dinarida- posvećen životu i djelu profesora dr. Radomira Lakušića, Berane, Plav, Andrijevica. Knjiga abstrakata, pp. 104.
- STEŠEVIĆ, D. & JOGAN, N. 2007: Additions to the flora of Montenegro: Setaria verticilliformis Dumort., Setaria viridis (L.) PB. subsp. pycnocoma (Steud) Tzvel., Impatiens balsamina L. and Catalpa bignonioides Walt..- Natura Montenegrina, Podgorica, 6: 153-160.
- TOMOVIĆ, I. & STEŠEVIĆ D. 2007: Duchesnea indica (Andr.) Focke, new alien species in the flora of Montenegro.- Natura Montenegrina, Podgorica, 6: 161-163
- TUTIN, T.G., HEYWOOD, V., BURGES, N.A., MOORE, D.M., VALENTINE, D.H., WALTERS, S.M.& WEBB, D.A. 1964-1980: Flora Europaea 1-5.- University Press, Cambridge
- TUTIN, T.G., HEYWOOD, V., BURGES, N.A., MOORE, D.M., VALENTINE, D.H., WALTERS, S.M.& WEBB, D.A. 1993: Flora Europaea 1, Cambridge, 581 pp.

Internet sources:

<http://herbarium.univie.ac.at/database/>
<http://hirc.botanic.hr/>

Appendix

Photo 1. *Chenopodium strictum*



Photo 2. *Coreopsis lanceolata*



Photo 3. *Gymnadenia odoratissima*



Photo 4. *Lobularia maritima*



Photo 5. *Eragrostis barrelieri*



Photo 6. *Viola pumila*

