



УДК / UDC 630  
УДК / UDC 635.9  
УДК / UDC 674

Online ISSN 1857-9507  
[www.sf.ukim.edu.mk/sumarski\\_pregled.htm](http://www.sf.ukim.edu.mk/sumarski_pregled.htm)

# ШУМАРСКИ ПРЕГЛЕД FOREST REVIEW

МЕЃУНАРОДНО НАУЧНО СПИСАНИЕ  
INTERNATIONAL SCIENTIFIC JOURNAL

80 ГОДИНИ ОД РАЂАЊЕТО НА РАДОСЛАВ РИЗОВСКИ  
YEARS OF RADOŠLAV RIZOVSKI'S BIRTH



Шум. преглед (Šum. pregled)  
For. review

Год. 46  
Vol. 46

Стр. 1-95  
Pag. 1-95

Скопје, 2015  
Skopje, 2015







УНИВЕРЗИТЕТ „СВ. КИРИЛ И МЕТОДИЈ“ ВО СКОПЈЕ  
Ss. CYRIL AND METHODIUS UNIVERSITY IN SKOPJE  
ШУМАРСКИ ФАКУЛТЕТ ВО СКОПЈЕ  
FACULTY OF FORESTRY IN SKOPJE



УДК / UDC 630  
УДК / UDC 635.9  
УДК / UDC 674

Online ISSN 1857-9507  
[www.sf.ukim.edu.mk/sumarski\\_pregled.htm](http://www.sf.ukim.edu.mk/sumarski_pregled.htm)

# ШУМАРСКИ ПРЕГЛЕД FOREST REVIEW

МЕЃУНАРОДНО НАУЧНО СПИСАНИЕ  
INTERNATIONAL SCIENTIFIC JOURNAL

Шум. преглед (Šum. pregled)  
For. review

Год. 46  
Vol. 46

Стр. 1-95  
Pag. 1-95

Скопје, 2015  
Skopje, 2015

**ШУМАРСКИ ПРЕГЛЕД FOREST REVIEW**

Меѓународно научно списание  
Год. 46 / Стр. 1-95  
Скопје, 2015

International Scientific Journal  
Vol. 46 / Pag. 1-95  
Skopje, 2015

Online ISSN 1857-9507  
УДК 630  
УДК 635.9  
УДК 674

Online ISSN 1857-9507  
UDC 630  
UDC 635.9  
UDC 674

**Издавач Publisher**

Универзитет „Св. Кирил и Методиј“ во Скопје  
Шумарски факултет во Скопје  
Декан  
Д-р Јане Ацевски

Ss. Cyril and Methodius University in Skopje  
Faculty of Forestry in Skopje  
Dean  
Jane Acevski PhD

**Главен и одговорен уредник**

Д-р Бојан Симовски

**Editor-in-chief**

Bojan Simovski PhD

**Уредувачки одбор**

Д-р Љупчо Несторовски (Скопје, Македонија)  
Д-р Марилена Идојтиќ (Загреб, Хрватска)  
Д-р Милосав Анѓелиќ (Подгорица, Црна Гора)  
Д-р Милорад Даниловиќ (Белград, Србија)  
Д-р Ирена Папазова-Анакиева (Скопје, Македонија)  
Д-р Роберт Брус (Љубљана, Словенија)  
Д-р Чиприан Палагиану (Сучава, Романија)  
Д-р Влатко Андоновски (Скопје, Македонија)  
Д-р Саша Орловиќ (Нови Сад, Србија)  
Д-р Маргарита Георгиева (Софија, Бугарија)  
Д-р Зоран Говедар (Бања Лука, Р. Српска, БИХ)  
Д-р Јасминка Ризовска Атанасовска (Скопје, Македонија)  
Д-р Мариус Димитров (Софија, Бугарија)  
М-р Дејан Манџуковски (Скопје, Македонија)

**Editorial board**

Ljupčo Nestorovski PhD (Skopje, Macedonia)  
Marilena Idžojić PhD (Zagreb, Croatia)  
Milosav Anđelić PhD (Podgorica, Montenegro)  
Milorad Danilović PhD (Belgrade, Serbia)  
Irena Papazova-Anakieva PhD (Skopje, Macedonia)  
Robert Brus PhD (Ljubljana, Slovenia)  
Ciprian Palaghianu PhD (Suceava, Romania)  
Vlatko Andonovski PhD (Skopje, Macedonia)  
Saša Orlović (Novi Sad, Serbia)  
Margarita Georgieva PhD (Sofia, Bulgaria)  
Zoran Govedar PhD (Banja Luka, R. Srpska, BiH)  
Jasminka Rizovska Atanasovska PhD (Skopje, Macedonia)  
Marius Dimitrov PhD (Sofia, Bulgaria)  
Dejan Mandžukovski MSc (Skopje, Macedonia)

**Технички уредник**

М-р Дејан Манџуковски

**Technical editor**

Dejan Mandžukovski MSc

**Корица и насловна фотографија**

Д-р Бојан Симовски, *Ramonda nathaliae*

**Cover page and photography**

Bojan Simovski PhD, *Ramonda nathaliae*

Излегува еднаш годишно

Published once a year

**Интернет-страница**

[www.sf.ukim.edu.mk/sumarski\\_pregled.htm](http://www.sf.ukim.edu.mk/sumarski_pregled.htm)

**Web page (on-line)**

[www.sf.ukim.edu.mk/sumarski\\_pregled.htm](http://www.sf.ukim.edu.mk/sumarski_pregled.htm)

**Адреса на издавачот**

УКИМ-Шумарски факултет во Скопје  
Редакција на Шумарски преглед  
Ул. „16 Македонска бригада“ бр. 1  
(П. факс 235)  
1 000 Скопје  
Република Македонија  
Е-пошта: [sumpregled@sf.ukim.edu.mk](mailto:sumpregled@sf.ukim.edu.mk)  
[www.sf.ukim.edu.mk](http://www.sf.ukim.edu.mk)

**Publisher's address**

UKiM Faculty of Forestry in Skopje  
Editorial Board of the Forest Review  
Ul. 16 Makedonska brigada br. 1  
(P.O. box 235)  
MK-1000 Skopje  
Republic of Macedonia  
E-mail: [sumpregled@sf.ukim.edu.mk](mailto:sumpregled@sf.ukim.edu.mk)  
[www.sf.ukim.edu.mk](http://www.sf.ukim.edu.mk)

**ШУМАРСКИ ПРЕГЛЕД      FOREST REVIEW**

Меѓународно научно списание

International Scientific Journal

Год. 46 / Стр. 1-95

Vol. 46 / Pag. 1-95

Скопје, 2015

Skopje, 2015

Online ISSN 1857-9507

Online ISSN 1857-9507

УДК 630

UDC 630

УДК 635.9

UDC 635.9

УДК 674

UDC 674

**Научен и рецензентски одбор**

Акад. Владо Матевски (Скопје, Македонија)  
Д-р Андраж Чарни (Љубљана, Словенија)  
Д-р Дмитро Јакушенко (Зелена Гора, Полска)  
Д-р Маријана Новаковиќ-Вуковиќ (Белград, Србија)  
Д-р Јане Ацевски (Скопје, Македонија)  
Д-р Југослав Брујиќ (Бања Лука, Р. Српска, БИХ)  
Д-р Марјан Никетиќ (Белград, Србија)  
Д-р Рената Ќуштеревска (Скопје, Македонија)  
Д-р Сеад Војниковиќ (Сараево, БИХ)  
Д-р Бојан Симовски (Скопје, Македонија)  
Д-р Јасница Медак (Загреб, Хрватска)  
Д-р Митко Костадиновски (Скопје, Македонија)

**Scientific and reviewers board**

Vlado Matevski Acad. (Skopje, Macedonia)  
Andraž Čarni PhD (Ljubljana, Slovenia)  
Dmytro Iakushenko PhD (Zielona Góra, Poland)  
Marijana Novaković-Vuković PhD (Belgrade, Serbia)  
Jane Acevski PhD (Skopje, Macedonia)  
Jugoslav Brujić PhD (Banja Luka, R. Srpska, BiH)  
Marjan Niketić PhD (Belgrade, Serbia)  
Renata Ćušterevska PhD (Skopje, Macedonia)  
Sead Vojniković PhD (Sarajevo, BiH)  
Bojan Simovski PhD (Skopje, Macedonia)  
Jasnica Medak PhD (Zagreb, Croatia)  
Mitko Kostadinovski PhD (Skopje, Macedonia)

**Интернет-страница**[www.sf.ukim.edu.mk/sumarski\\_pregled.htm](http://www.sf.ukim.edu.mk/sumarski_pregled.htm)**Web page (on-line)**[www.sf.ukim.edu.mk/sumarski\\_pregled.htm](http://www.sf.ukim.edu.mk/sumarski_pregled.htm)**Адреса на издавачот**

УКИМ-Шумарски факултет во Скопје  
Редакција на Шумарски преглед  
Ул. „16 Македонска бригада“ бр. 1  
(П. факс 235)  
1 000 Скопје  
Република Македонија  
Е-пошта: [sumpregled@sf.ukim.edu.mk](mailto:sumpregled@sf.ukim.edu.mk)  
[www.sf.ukim.edu.mk](http://www.sf.ukim.edu.mk)

**Publisher's address**

UKiM Faculty of Forestry in Skopje  
Editorial Board of the Forest Review  
Ul. 16 Makedonska brigada br. 1  
(P.O. box 235)  
MK-1000 Skopje  
Republic of Macedonia  
E-mail: [sumpregled@sf.ukim.edu.mk](mailto:sumpregled@sf.ukim.edu.mk)  
[www.sf.ukim.edu.mk](http://www.sf.ukim.edu.mk)

## CONTENTS

### *Preface*

---

### ***Bibliography (monograph articles):***

---

Mandžukovski D. <b>THE LIFE AND WORK OF PROF. DR. RADOŠLAV RIZOVSKI (16.IX 1935 – 20.VII 2008) 80 YEARS SINCE THE BIRTH OF AND OVER 40 YEARS OF EDUCATIONAL AND SCIENTIFIC ACTIVITY</b>	1
----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------	---

---

### ***Original Scientific Articles:***

---

Baričević D., Vukelić J., Puača M., Šapić I. <b>A PHYTOCOENOLOGICAL STUDY OF FORESTS OF HUNGARIAN OAK AND TURKEY OAK (QUERCETUM FRINETTO-CERRIDIS /RUDSKI 1949/ TRINAJSTIĆ ET AL. 1996) ON THE NORTHWEST BORDER OF ARRIVAL (NATURE PARK PAPUK, CROATIA)</b>	7
Dimitrov M., Natcheva R., Ganeva A., Gyurova D. <b>PLANT BIODIVERSITY OF SPHAGNUM-DOMINATED MIRES IN VITOSHA NATURE PARK</b>	15
Kutnar L., Eler K. <b>PLANT SPECIES DIVERSITY AND INVASIBILITY OF (PERI-)URBAN FORESTS OF LJUBLJANA, SLOVENIA</b>	30
Melovski Lj., Hristovski S. <b>FIRST RECORDS FOR SEVEN SPECIES AND ONE HYBRID FOR THE FLORA OF THE REPUBLIC OF MACEDONIA</b>	36
Nikolov I., Dimitrov M. <b>BOREO-MONTANE FOREST PHYTOCOENOSES IN CENTRAL STARA PLANINA MTS.</b>	43
Novaković-Vuković M., Milošević R. <b>ANALYSIS OF FLORISTIC COMPOSITION OF MOUNTAIN BEECH FOREST ON LIMESTONE AND SERPENTINE IN SERBIA</b>	55
Pedashenko H., Vassilev K., Bancheva S., Delcheva M., Vladimirov V. <b>FLORISTIC AND VEGETATION DIVERSITY IN KONGURA RESERVE (SOUTH-WEST BULGARIA)</b>	59
Teofilovski A., Nikolov Z., Mandžukovski D. <b>JUNCUS FILIFORMIS L. (JUNCACEAE), A NEW SPECIES IN THE FLORA OF MACEDONIA</b>	71
Vassilev K., Gavrilova A. <b>FLORA, HABITATS AND VEGETATION OF CHAMDZHA MANAGED RESERVE, CENTRAL BALKAN RANGE</b>	74
Vukelić J., Šapić I., Baričević D. <b>FLORISTIC-VEGETATIONAL VARIABILITY OF THE ASSOCIATION EPIMEDIO- CARPINETUM BETULI (HORVAT 1938) BORHIDI 1963 IN THE NORTH OF CROATIA</b>	88

---

### *Instructions to Authors*

---

**JUNCUS FILIFORMIS L. (JUNCACEAE), A NEW SPECIES IN THE FLORA OF MACEDONIA**<sup>1</sup>TEOFILOVSKI A., <sup>2</sup>NIKOLOV Z., <sup>1</sup>MANDŽUKOVSKI D.<sup>1</sup>Public enterprise Makedonski sumi, Skopje, Macedonia<sup>2</sup>Macedonian museum of natural history, Skopje, Macedonia

Corresponding author e-mail address: acoteofilovski@hotmail.com

**ABSTRACT:** In this work *Juncus filiformis* is reported for the first time in the flora of Macedonia. The species was discovered in the subalpine belt of Mt Šar Planina - on Bogovinje Lake coast. Chorological and ecological data regarding the discovered population with additions of a photograph of live specimens, a photograph of fruiting inflorescence of herbarium specimens, and a distribution map are presented. A short discussion of taxonomical position of the species and short description are also given.

**Keywords:** *Juncus filiformis*, new, species, flora, Macedonia.

**1 INTRODUCTION**

The genus *Juncus* L. comprises c. 300 species which are widely distributed in both hemispheres, but most abundantly in the temperate and cold regions. A monographic study of this genus in the flora of Macedonia so far has been not carried out but according to data incorporated in the check lists of some particular regions and in the other floristical works the number of species could be estimated to c. 20 native and one naturalized species. They inhabit mainly moist and wet habitats in mountain areas. Recently, new chorological data regarding several species of this genus in Macedonia have been disclosed (Teofilovski 2011), while *J. minutulus* (Albert & Jahand.) Prain has been reported for the first time in the flora of Macedonia (Matevski & Teofilovski 2011).

During the recent floristic researches on Mt Šar Planina (NW Macedonia), at the Bogovinje Lake coast we have discovered a small population of one representative of the genus *Juncus*, which has been identified as *J. filiformis* L., so far not known from the territory of the Republic of Macedonia.

**2 MATERIALS AND METHODS**

During the field work herbarium material were collected and deposited in the private herbarium of the first author. The determination was performed according to the treatments of this genus in the several standard floras (Snogerup, 1980; Kirschner et al., 2002; Romero Zacro, 2010). The relevant floristic works were checked for possible presence of chorological data regarding the territory of Republic of Macedonia.

**3 RESULTS AND DISCUSSION****3.1 Distribution in Macedonia**

*Juncus filiformis* L. - Mt Šar Planina: on the Bogovinje Lake coast, 1950 m, 09.08.2015, coll. A. Teofilovski, Z. Nikolov & D. Mandžukovski (herb. Teofilovski; herb. Mac. Mus. Nat. Hist., n. 12572). (Fig. 1, 2, 3).

This is the first record of this species for the flora of Macedonia. Only a few patches of individuals was observed in southeast part of the Bogovinje Lake coast, growing in a shallow water and on wet places of the coastline, on siliceous geological substrate. The species is possibly more widespread around this lake, but unfortunately only southeast part of its coast was checked and thus no additional field data were provided.

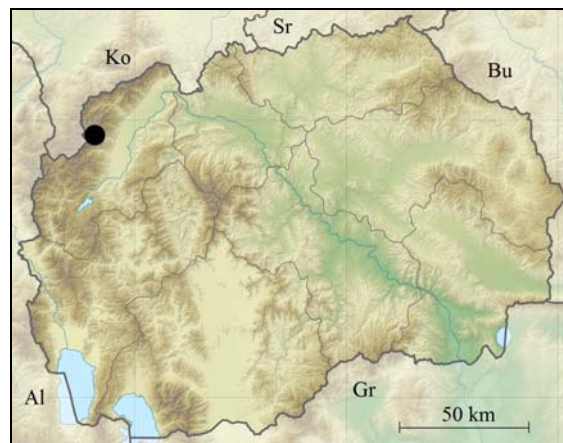
**3.2 General and regional distribution**

The general range of this boreo-montane species includes the temperate areas of the north hemisphere. In the north parts of the range it occurs from near sea level to low alpine zone, while in the south mostly in high mountains up to 2200 m or more, growing on various at least temporarily wet habitats, usually on acid soils (Kirschner et al., 2002).

In the Balkan Peninsula, *J. filiformis* is a rare species, which is so far known from several localities in Croatia, Bosnia and Hercegovina, Montenegro, Serbia, Bulgaria, and Greece, but it is not yet reported from Kosovo, Albania, and European part of Turkey.

The closest finding sites are located c. 150 km northeast (Vlasina, SE Serbia) (Nikolić, 1976), c. 150 km southeast (NC Greece) (Dimopoulos & al., 2013), c. 180 km northwest (Nikšić - Budoške Bare, W Monte Negro) (Babunja, 2013), and c. 210 km east (Mt Rila and Mt Pirin, W Bulgaria) (Georgiev et Kožuharov, 1964).

Nikolić (1976) reported *J. filiformis* also for Pčinja valley - Rt (S Serbia), apparently by mistake, based on herbarium specimens labeled with "Macedonia, Pčinja - Rt" (coll. P. Černjavski, 26.5.1926, n. 28645). According to the investigation of Niketić (2011) "Rt" is actually misplaced name used by P. Černjavski for locality Banjski Rid, situated above Katlanovska Banja in the Macedonian part of Pčinja valley. We checked a scan of the cited herbarium specimens but they seem undeterminable since their inflorescences are almost fully undeveloped.



**Figure 1:** Distribution of *Juncus filiformis* in Macedonia





**Figure 2:** *Juncus filiformis* (Photo A. Teofilovski)

### 3.3 Description and taxonomy

*Juncus filiformis* L. Sp. Pl.: 326. 1753

Rhizome with short internodes, horizontal. Stems 10-60 cm, the uppermost basal sheath with a short lamina. Non-flowering shoots usually few or absent. Lowest bract ( $\frac{1}{2}$ )1-1 $\frac{1}{2}$  times as long as stem; second bract sometimes leaf-like, though short. Inflorescence with 4-10 flowers, dense. Perianth-segments 2.5-3.5 mm, ovate to narrowly ovate or the inner oblong; outer aristate; inner obtuse. Anthers c. 0.5 mm,  $\frac{1}{3}$ - $\frac{1}{2}$  as long as filaments. Capsule (2.5-)3-3.5(-4.5) mm, trigonus ovoid, usually shortly mucronate, light brown, about equaling perianth. Seeds 0.5 mm, obliquely ovoid, faintly reticulate, with one inconspicuous appendage (Snogerup, 1980).

*J. filiformis* is taxonomically well defined species belonging to the *J.* subgen. *Agathryon* sect. *Juncotypus* Dumort. This section has a world-wide distribution comprising 67 perennial species which are characterised with pseudo lateral inflorescence, lower inflorescence bract terete, erect, seeming to be a continuation of stem, basal leaves bladeless, cauline leaves  $\pm$  absent, sterile shoots terete, stem-like (Kirschner et al., 2002). Another three species of this section also occur in Macedonia (*J. inflexus* L., *J. effusus* L., and *J. conglomeratus* L.).

### 4 CONCLUSIONS

*J. filiformis* is recorded for the first time from the territory of the Republic of Macedonia. A small population of this species has been discovered in the subalpine belt of Mt Šar Planina – on the Bogovinje Lake

coast, on 1950 m a.s.l. It grows in shallow water and on wet places of the lake coastline, on siliceous geological substrate. The nearest known finding sites are located c. 150 km northeast (Vlasina, SE Serbia) and c. 150 km southeast (NC Greece).

### 5 ACKNOWLEDGEMENTS

The authors are grateful to the reviewers M. Kostadinovski (Skopje) and M. Niketić (Beograd) for useful suggestions which improved the manuscript, and to M. Niketić also for sending us a scan of the cited herbarium specimens of *Juncus* sp.



**Figure 3:** *Juncus filiformis* - inflorescences (herbarium specimens)

6 REFERENCES

- [1] Babunja, N., The flora of wetlands and aquatic habitats in the vicinity of Nikšić, *Natura Montenegrina*, Nat. Hist. Mus. Monten., Podgorica, (2013), 12(1): 13-41.
- [2] Dimopoulos, P., Raus, Th., Bergmeier, E., Constantinidis, Th., Iatrou, G., Kokkini, S., Strid, A., Tzanodacis, D. Vascular flora of Greece: an annotated checklist, *Englera*, (2013), 31: 1- 372.
- [3] Georgiev, T., Kožuharov, St., *Juncus* L. In: Jordanov, D. (ed.): *Flora Republicae popularis Bulgaricae*, (1964), 2: 149-167. (In Bulgarian)
- [4] Kirschner, J. et al., *Juncaceae* 3: *Juncus* subg. *Agathryon*, *Species Plantarum: Flora of the World*, (2002), 8: 1-192.
- [5] Matevski, V., Teofilovski, A., New species in the Flora of the Republic of Macedonia, *Biol. Macedonica*, (2011), 62: 49-54.
- [6] Niketić, M., Problematika učitavanja, transfera i standardizacije podataka sa herbarskih etiketa na primeru tribusa *Sileneae* (*Caryophyllaceae*) u zbirci Prirodnjačkog muzeja u Beogradu. – Prirodnjački muzej Beograd, Habilitacioni rad., (2011), p. 81.
- [7] Nikolić, V., *Juncaceae* A. L. Juss. In: Josifović, M. (ed.): *Flora de la Republique socialiste de Serbie*. ASSA, Beograd, (1976), 8: 116-151. (In Serbian)
- [8] Romero Zacro, C., *Juncus* L. In: Talavera et al. (eds.): *Flora Iberica*, Real Jardín Botánico, Madrid, (2010), 17: 123-187.
- [9] Snogerup, S., *Juncus* L. In Tutuin et al. (eds): *Flora Europaea*, Cambridge, (1980), 5: 102-111.
- [10] Teofilovski, A., Contributions to the flora of the Republic of Macedonia, Skopje, (2011), p. 142. (In Macedonian, with English summary).





### ШУМАРСКИ ПРЕГЛЕД

Меѓународно научно списание  
Год. 46 / Стр. 1-95  
Скопје, 2015

### FOREST REVIEW

International Scientific Journal  
Vol. 46 / Pag. 1-95  
Skopje, 2015

Online ISSN 1857-9507

УДК 630

УДК 635.9

УДК 674

Online ISSN 1857-9507

UDC 630

UDC 635.9

UDC 674

#### Издавач

Универзитет „Св. Кирил и Методиј“ во Скопје  
Шумарски факултет во Скопје  
Декан  
Д-р Јане Ацевски

#### Publisher

Ss. Cyril and Methodius University in Skopje  
Faculty of Forestry in Skopje  
Dean  
Jane Acevski PhD

#### Главен и одговорен уредник

Д-р Бојан Симовски

#### Editor-in-chief

Bojan Simovski PhD

#### Уредувачки одбор

Д-р Љупчо Несторовски (Скопје, Македонија)  
Д-р Марилена Ицојтиќ (Загреб, Хрватска)  
Д-р Милосав Ангелиќ (Подгорица, Црна Гора)  
Д-р Милорад Даниловиќ (Белград, Србија)  
Д-р Ирена Папазова-Анакиева (Скопје, Македонија)  
Д-р Роберт Брус (Љубљана, Словенија)  
Д-р Чиприан Палагиану (Сучава, Романија)  
Д-р Влатко Андоновски (Скопје, Македонија)  
Д-р Саша Орловиќ (Нови Сад, Србија)  
Д-р Маргарита Георгиева (Софија, Бугарија)  
Д-р Зоран Говедар (Бања Лука, Р. Српска, БИХ)  
Д-р Јасминка Ризовска Атанасовска (Скопје, Македонија)  
Д-р Мариус Димитров (Софија, Бугарија)  
М-р Дејан Манџуковски (Скопје, Македонија)

#### Editorial board

Ljupčo Nestorovski PhD (Skopje, Macedonia)  
Marilena Idžojtić PhD (Zagreb, Croatia)  
Milosav Anđelić PhD (Podgorica, Montenegro)  
Milorad Danilović PhD (Belgrade, Serbia)  
Irena Papazova-Anakieva PhD (Skopje, Macedonia)  
Robert Brus PhD (Ljubljana, Slovenia)  
Ciprian Palaghianu PhD (Suceava, Romania)  
Vlatko Andonovski PhD (Skopje, Macedonia)  
Saša Orlović (Novi Sad, Serbia)  
Margarita Georgieva PhD (Sofia, Bulgaria)  
Zoran Govedar PhD (Banja Luka, R. Srpska, BiH)  
Jasminka Rizovska Atanasovska PhD (Skopje, Macedonia)  
Marius Dimitrov PhD (Sofia, Bulgaria)  
Dejan Mandžukovski MSc (Skopje, Macedonia)

#### Технички уредник

М-р Дејан Манџуковски

#### Technical editor

Dejan Mandžukovski MSc

#### Корица и насловна фотографија

Д-р Бојан Симовски, *Ramonda nathaliae*

#### Cover page and photography

Bojan Simovski PhD, *Ramonda nathaliae*

Излегува еднаш годишно

Published once a year

#### Интернет-страница

[www.sf.ukim.edu.mk/sumarski\\_pregled.htm](http://www.sf.ukim.edu.mk/sumarski_pregled.htm)

#### Web page (on-line)

[www.sf.ukim.edu.mk/sumarski\\_pregled.htm](http://www.sf.ukim.edu.mk/sumarski_pregled.htm)

#### Адреса на издавачот

УКИМ-Шумарски факултет во Скопје  
Редакција на Шумарски преглед  
Ул. „16 Македонска бригада“ бр. 1  
(П. факс 235)  
1 000 Скопје  
Република Македонија  
Е-пошта: [sumpregled@sf.ukim.edu.mk](mailto:sumpregled@sf.ukim.edu.mk)  
[www.sf.ukim.edu.mk](http://www.sf.ukim.edu.mk)

#### Publisher's address

UKIM Faculty of Forestry in Skopje  
Editorial Board of the Forest Review  
Ul. 16 Makedonska brigada br. 1  
(P.O. box 235)  
MK-1000 Skopje  
Republic of Macedonia  
E-mail: [sumpregled@sf.ukim.edu.mk](mailto:sumpregled@sf.ukim.edu.mk)  
[www.sf.ukim.edu.mk](http://www.sf.ukim.edu.mk)

Шум. преглед (Šum. pregled)  
For. review

Год. 46  
Vol. 46

Стр. 1-95  
Pag. 1-95

Скопје, 2015  
Skopje, 2015

