

## CONTRIBUTION TO THE KNOWLEDGE OF LICHEN-FORMING AND LICHENICOLOUS FUNGI OF GOMEL REGION (BELARUS)

Andrei TSURYKAU

F. Skorina Gomel State University, Department of Biology, Sovetskaja Str. 104, Gomel BY-246019, Belarus  
Samara National Research University, Institute of Natural Sciences, Department of Ecology, Botany and Nature Protection, Moskovskoye shosse 34, Samara RU-443086, Russia  
E-mail: tsurykau@gmail.com

### Abstract

Tsurykau A., 2017: Contribution to the knowledge of lichen-forming and lichenicolous fungi of Gomel region (Belarus). – Bot. Lith., 23(2): 123–129.

Records of 21 species of lichen-forming and lichenicolous fungi new to Gomel region, the south-eastern Belarus are presented. Of these, six species (*Bacidia fraxinea*, *Briancoppinsia cytospora*, *Calicium parvum*, *Chaenothecopsis savonica*, *Enchylium bachmanianum* and *Intralichen christiansenii*) are new to Belarus, seven species (*Carbonicola anthracophila*, *Chaenotheca hispidula*, *Cornutispora lichenicola*, *Lichenochora obscuroides*, *Lichenocodium xanthoriae*, *Pyrenochaeta xanthoriae* and *Tremella hypogymniae*) have been previously known from one locality in the country. The occurrence of *Ochrolechia microstictoides* is confirmed with certainty for Belarus. *Ochrolechia parella* is excluded from the list of lichens of Gomel region as erroneously identified.

**Keywords:** biodiversity, distribution, Gomel, Belarus.

### INTRODUCTION

Since the publication of the check-list of lichens and lichenicolous fungi of Gomel region (GR), the south-eastern Belarus (TSURYKAU & KHRAMCHANKOVA, 2011), a number of species have been added to the lichen biota of the area, including some new to science (BELY, 2011; BELY & YATSYNA, 2013; GOLUBKOV, 2011a, 2011b; 2013; TSURYKAU, 2012, 2013, 2017; KONDRATYUK et al., 2013; TSURYKAU & KHRAMCHANKOVA, 2013; TSURYKAU & CZARNOTA, 2014; TSURYKAU et al., 2012, 2013, 2014, 2016b; YATSYNA, 2012a, 2012b; YATSYNA & MOTIEJŪNAITĖ, 2015; ZHURBENKO et al., 2015). Furthermore, the genera *Cetrelia*, *Hypotrachyna*, *Lepraria*, *Parmotrema* and *Punctelia* as well as cup-shaped species of the genus *Cladonia* were revised (BELY et al., 2014; TSURYKAU & GOLUBKOV, 2015; TSURYKAU et al., 2015, 2016a). With these additions, currently known lichen biota of Gomel region includes about 400 species.

In this paper, 21 additional species of lichen-forming and lichenicolous fungi are reported from Gomel region, six of which are new to Belarus.

### MATERIALS AND METHODS

The material is based mainly on the collections made by the author during the field trips in 2002–2016. The herbarium specimens from GSU, MSK and SMR were also revised. Morphology and anatomy were examined using dissecting microscope Nikon SMZ-745 and compound microscope Nikon Eclipse 80i. Microscopic examination was done in water, 10% KOH (K), Lugol's iodine, directly (I) or after a KOH pre-treatment (K/I). Secondary chemistry of lichens was analyzed by thin-layer chromatography (TLC) in solvent C according to the methods by ORANGE et al. (2001). Cited specimens are deposited at the Scientific Herbarium of F. Skorina Gomel State University (GSU) except if otherwise indicated. Lichenicolous fungi are marked with #.

### The list of species

***Bacidia fraxinea*** Lönnr. – New to Belarus. The species has been reported from all neighbouring to Belarus countries (MOTIEJŪNAITĖ, 1999; FALTYNOWICZ, 2003; KONDRATYUK et al., 2010; URBANAVICHUS, 2010; MOTIEJŪNAITĖ et al., 2016). According to GOLUBKOVA (2003), *B. fraxinea* is confined to nitrogen-rich bark of trees growing in open locations. The studied specimen was found in Gomel sub-urban area on roadside oak.

**Specimen examined:** Gomel region, Gomel district, Makejevka forest, 52°22' N, 30°47' E, edge of pine wood, on *Quercus robur*, P. Löhmus, 24 April 2012.

**#*Briancoppinsia cytospora*** (Vouaux) Diederich et al. – New to Belarus. It is a widespread species known in Latvia, Lithuania, Poland and Russia (MOTIEJŪNAITĖ, 1999; FALTYNOWICZ, 2003; ZHURBENKO, 2007; CZARNOTA & KUKWA, 2010). The fungus inhabits *Cladonia* spp., *Lecanora conizaeoides*, *Pertusaria albescens*, *Ramalina calicaris* and wide range of parmelioid lichens, causing brownish necrotic areas surrounded by a circular black line (DIEDERICH et al., 2012).

**Specimen examined:** Gomel region, Gomel district, Chenki forest, 52°20' N, 30°57' E, on *Parmelia sulcata*, A. Tsurykau, 22 September 2006 (SMR 828).

***Calicium parvum*** Tibell – New to Belarus. The species has been reported from all neighbouring to Belarus countries (MOTIEJŪNAITĖ, 1999; FALTYNOWICZ, 2003; URBANAVICHUS, 2010; KONDRATYUK et al., 2010; MOISEJEVS, 2017). *Calicium parvum* is widely distributed in the south-eastern Belarus and is represented by 63 collections made by the author in pine forests.

**Selected specimens examined:** Gomel district, Kalinino forest, 3.5 km NW of Teruxa village, 52°13' N, 31°03' E, pine forest, on *Pinus sylvestris*, A. Tsurykau, 8 August 2011; Loev district, Karpovka forest, 5 km W of Kaūpen village, 51°56' N, 30°35' E, pine forest, on *P. sylvestris*, A. Tsurykau, 9 August 2011.

***Candelaria concolor*** (Dicks.) Arnold – New to GR. The species had been previously excluded from the lichen list of Gomel region after the revision

(TSURYKAU & KHRAMCHANKOVA, 2011), however, single specimen was found later. *Candelaria concolor* seems to be a rare species in Belarus and was confirmed from very few localities (YATSZYNA, 2014). Most of modern records of this lichen appeared to be *C. pacifica* M. Westb. & Arup (BELY & VASHKEVICH, 2017).

**Specimen examined:** Gomel district, the city of Gomel, Zaitseva Str., 52°22' N, 31°00' E, on *Acer platanoides*, A. Tsurykau, 22 March 2007.

***Carbonicola anthracophila*** (Nyl.) Bendiksby et Timdal – New to GR, the second record for Belarus. The species has been reported by YATSZYNA (2012c) from single locality in Mogilev region, growing on lignum.

**Specimen examined:** Dobruš district, Dobruš forest, 0.5 km E of the town of Dobruš, 52°24' N, 31°20' E, pine forest, on *Pinus sylvestris*, A. Tsurykau, 20 August 2013.

***Chaenotheca hispidula*** (Ach.) Zahlbr. – New to GR. The species has recently been reported to Belarus from single locality in Mogilev region (YATSZYNA, 2013).

**Specimen examined:** Gomel district, Pribor forest, 1.5 km S of Pribor village, 52°22' N, 30°46' E, on *Alnus glutinosa*, P. Löhmus, 25 April 2012.

***Chaenothecopsis savonica*** (Räsänen) Tibell – New to Belarus. The species is known in Lithuania (MOTIEJŪNAITĖ & ANDERSSON, 2003), Poland (FALTYNOWICZ, 2003) and Russia (URBANAVICHUS, 2010). According to TITOV (2006), *C. savonica* has worldwide distribution and grows on lignum and on lichens, mainly *Chaenotheca* spp.

**Specimen examined:** Gomel region, Dobruš district, 52°24' N, 31°25' E, broadleaved forest, on lignum, P. Löhmus, 23 April 2012.

**#*Cornutispora lichenicola*** D. Hawksw. et B. Sutton – New to GR, the second record for Belarus. The species has recently been reported by MOTIEJŪNAITĖ & GROCHOWSKI (2014) from the Be-rezinsky Biosphere Reserve (Vitebsk region) on *Par-motrema perlatum*.

**Specimen examined:** Gomel district, 3 km SW of Čenki village, close to the Gomel State Universi-

ty's field practice stationary camp, 52°19' N, 30°57' E, on *Parmelia sulcata*, A. Tsurykau and N. Timoshenkova, 27 March 2003.

***Enchylium bachmanianum*** (Fink) Otálora et al. – New to Belarus. This widely distributed, but scattered species is known in Poland (FALTYNOWICZ, 2003) and Russia (URBANAVICHUS, 2010). *Enchylium bachmanianum* is a pioneer species inhabiting sand or clay (JØRGENSEN, 2007). The studied specimen was found in the main park of Gomel city on eroded sandy areas.

**Specimen examined:** Gomel region, the city of Gomel, embankment in the city park, 52°25' N, 31°01' E, on soil, A. Tsurykau & E. Korchikov, 27 September 2012.

***Hypogymnia farinacea*** Zopf – New to GR. The species is sporadically distributed throughout the country and is known from Brest, Grodno, Minsk and Vitebsk regions (BACHMANN & BACHMANN, 1920; GOLUBKOV 1985; GOLUBKOV et al., 2007). In Belarus, *H. farinacea* is mostly confined to protected areas, and is included in the Red Data Book of Belarus as a data deficient (DD) species (KACHANOVSKY, 2015).

**Specimen examined:** Žitkoviči district, Pripjatsky National Park, Xvoensk village, 52°02' N, 27°55' E, on wooden fence, O. Shakhrai, 22 July 75; Loev district, Karpovka forest, 5 km W of Kaŭpen village, 51°56' N, 30°35' E, pine forest, on *Pinus sylvestris*, A. Tsurykau, 9 August 2011.

**#*Intralichen christiansenii*** (D.Hawksw.) D.Hawksw. et M.S.Cole – New to Belarus. It is a widespread hyphomycete inhabiting apothecia of host species. The fungus is known from Lithuania (MOTIEJŪNAITĖ, 1999), Russia (ZHURBENKO, 2007) and the Ukraine (KONDRATYUK et al., 2010). According to DIEDERICH (2007), *I. christiansenii* is a heterogeneous species, confined to *Candelariella* in its strict sense.

**Specimen examined:** Gomel region, the city of Gomel, Fabričnaja Str., 52°22' N, 31°01' E, on *Candelariella vitellina*, A. Tsurykau, 26 March 2007.

**#*Lichenochora obscuroides*** (Linds.) Triebel & Rambold – New to GR. So far, the species has been known from single locality in Mogilev region (TSURYKAU et al., 2016b).

**Specimens examined:** Mozyr district, Mozyr town, 52°01' N, 29°13' E, on *Phaeophyscia orbicularis*, N. Naumovich, 27 August 2016; Loev district, Novaja Borščevka village, 51°58' N, 30°29' E, on *P. orbicularis*, V. Drobush, 12 August 2016.

**#*Lichenocodium xanthoriae*** M.S.Christ. – New to GR. The fungus has previously been reported from single locality in Grodno region (GOLUBKOV 2011b).

**Specimen examined:** Gomel district, vicinities of the city of Gomel, Korenevka forest, 52°21' N, 31°06' E, on *Xanthoria parietina*, K. Ananko, 6 September 2016; close to Terexovka village, 52°12' N, 31°57' E, on *X. parietina*, O. Voitishkina, 20 September 2015.

**#*Lichenostigma maureri*** Hafellner – New to GR. The species is not rare in Belarus being reported from six localities in Grodno, Minsk and Vitebsk regions (GOLUBKOV 2011b).

**Specimen examined:** Žitkoviči district, Pripjatsky National Park, Ozerany forest, 52°00' N, 27°53' E, boggy pine-birch forest, on *Usnea hirta*, O. Shakhrai, 18 June 1974.

***Ochrolechia microstictoides*** Räsänen – New to GR. The species is confirmed for the first time for Belarus with certainty by analysing its secondary metabolites. The previous Belarusian reports of this species belong to the middle of the 20th century (GORBACH, 1973). However, the name was indicated as a synonym of *O. turneri* (Sm.) Land., and, therefore, these records are dubious. The studied specimen was identified as *O. parella* (L.) A.Massal. and reported for Gomel region by GES' (1960). The revised specimen produces soredia and contains variolaric and lichensterinic acids, and belongs to *O. microstictoides*. *Ochrolechia parella* should be, thus, excluded from the lichen list of Gomel region (TSURYKAU & KHRAMCHANKOVA, 2011).

**Specimen examined:** Žitkoviči district, on *Pinus sylvestris*, D. Ivanova (Ges'), 1 July 1958 (MSK).

***Peltigera hymenina*** (Ach.) Delise – New to GR, the second contemporary record for Belarus. The species has recently been rediscovered by BELY (2011) in the Berezinsky Biosphere Reserve after almost 100 years, where it was first recorded by KREYER (1913).

**Specimen examined:** Gomel district, 3 km SW of Čenki village, close to the Gomel State University's field practice stationary camp, 52°19' N, 30°57' E, on fallen trunk of *Populus tremula*, A. Tsuryskau, 29 September 2012.

**#*Pyrenochaeta xanthoriae*** Diederich – New to GR, the second record for Belarus. The first locality is in Mogilev region (TSURYKAU et al., 2016b).

**Specimen examined:** Gomel district, vicinities of the city of Gomel, Korenevka forest, 52°21' N, 31°06' E, on *Xanthoria parietina*, K. Ananko, 6 September 2016.

**#*Tremella cladoniae*** Diederich & M.S.Christ. – New to GR. So far has been reported only from three localities in Western Belarus by GOLUBKOV (2011b).

**Specimens examined:** Buda-Košelevo district, close to Rudnja Olxovka village, 52°32' N, 30°25' E, marge of pine forest, on *Cladonia squamosa*, A. Tsuryskau, 7 July 2005; Gomel district, close to Šarpilovka village, 52°06' N, 30°55' E, on *Cladonia grayi*, 26 June 2013, N. Horlenka (UGDA); Gomel district, close to Terexovka village, 52°12' N, 31°57' E, on *Cladonia chlorophaea* s.lat., 26 June 2013, N. Dzenisenka; Mozyr district, 3 km W of Provtyuki village, 51°54' N, 29°22' E, birch forest, on *Cladonia chlorophaea* s.lat., 25 August 1977, V. Golubkov (MSK, UGDA).

**#*Tremella hypogymniae*** Diederich & M.S.Christ. – New to GR, the second record for Belarus. Previously has been reported by GOLUBKOV & KUKWA (2006) from the territory of Belovežskaja Pušča National Park.

**Specimen examined:** Gomel district, Kalinino forest, 1.5 km SW of Teryuxa village, 52°12' N, 30°57' E, pine forest, on *Hypogymnia physodes*, A. Tsuryskau, 21 August 2013.

***Usnea lapponica*** Vain. – New to GR. The species is included in the Red Data Book of Belarus as in data deficient (DD) (KACHANOVSKY, 2015). However, the previous Belarusian reports are doubtful as GOLUBKOV (1992) treated this species with *U. fulvorea-gens* (Räsänen) Räsänen, a synonym of *U. glabrescens* (Nyl. ex Vain.) Vain. ex Räsänen, which differs chemically. The studied specimen contains salazinic and usnic acids.

**Specimen examined:** Gomel district, close to Teryuxovka village, 52°11' N, 31°25' E, mixed forest, on *Betula pendula*, M. Peschanko, 11 October 2008.

***Xylopsora friesii*** (Ach.) Bendiksby et Timdal – New to GR. In Belarus, the species has been known from two localities in the Berezinsky Biosphere Reserve (BELY & SIDOROVICH, 2013).

**Specimens examined:** Gomel district, Staro-Djatlovičskoje forest, 1 km SW of Čkalovo forest, 52°17' N, 30°51' E, pine forest, on *Pinus sylvestris*, A. Tsuryskau, 31 July 2013; Dobruš district, Dobruš forest, 0.5 E of the town of Dobruš, 52°24' N, 31°20' E, pine forest, on *P. sylvestris*, A. Tsuryskau, 20 August 2013.

#### ACKNOWLEDGEMENTS

Piret Lõhmus, Tiina Randlane, Ave Suija, (Tartu), Jurga Motiejūnaitė (Vilnius) and Martin Kukwa (Gdańsk) are warmly thanked for their help in identification of some critical material. I am indebted to Eugeny S. Korchikov (Samara) for providing access to SMR Herbarium.

#### REFERENCES

- BACHMANN E., BACHMANN F., 1920: Litauische Flechten. – *Hedwigia*, 61(6): 308–342.
- BELY P.N., 2011: Annotirovannyj spisok lišajnikov i lixenofil'nyx gribov elovyx ekosistem Belarusi. – *Osobo oxranjaemye prirodnye territorii Belarusi*, 6: 146–178.
- BELY P.N., SIDOROVICH Y.A., 2013: *Hypocenomyce friesii* (Ophiopharmaceae, Ascomycota) – novyj vid lišajnika dlja Belarusi. – *Doklady Nacional'noj Akademii Nauk*, 57(3): 103–105.
- BELY P.N., VASHKEVICH M.N., 2017: Herbarium of lichen forming fungi of the Central Botanical Garden of NAS of Belarus: modern state. – *Role of Botanical Gardens and Arboretums in conservation, investigation and sustainable using diversity of the plant world: Proceedings of the International Conference. Part 1. Minsk, 2017: 357–360. – Minsk.*
- BELY P.N., YATSZYNA A.P., 2013: Ekologo-geografičeskaja xarakteristika *Lichenomphalia*

- umbellifera* (Hygrophoraceae, Basidiomycota) v Belarusi. – Doklady Nacional'noj Akademii Nauk, 57(4): 100–104.
- BELY P., GOLUBKOV V., TSURYKAU A., SIDOROVICH E., 2014: The lichen genus *Cetrelia* in Belarus: distribution, ecology and conservation. – Botanica Lithuanica, 20(2): 69–76.
- CZARNOTA P., KUKWA M., 2010: New and noteworthy lichenized and lichenicolous fungi from Latvia. – Botanica Lithuanica, 16(1): 21–27.
- DIEDERICH P., 2007: *Intralichen*. – In: NASH T.H.III, RYAN B.D., DIEDERICH P., GRIES C., BUNGARTZ F. (eds). Lichen Flora of the Greater Sonoran Desert Region, Vol. 3: 654. – Tempe.
- DIEDERICH P., LAWREY J.D., SIKAROODI M., VAN DEN BOOM P.P.G., ERTZ D., 2012: *Briancoppinsia*, a new coelomycetous genus of Arthoniaceae (Arthoniales) for the lichenicolous *Phoma cytospora*, with a key to this and similar taxa. – Fungal Diversity, 52: 1–12.
- FALTYNOWICZ W., 2003: The lichens, lichenicolous and allied fungi of Poland. An annotated checklist. – Kraków.
- GES' D.K., 1960: Da vyvuchenn'a lišajnikau Paless'a. – Vesci Akadzemii navuk BSSR. Seryja bijalagičnyx navuk, 4: 54–59.
- GOLUBKOV V.V., 1985: Novye i redkie vidy dlja lixenoflory Belovežskoj pušči. – Aktual'nye problemy oxrany, racional'nogo ispol'zovanija i vosproizvodstva prirodnyx resursov (materialy konferencii). Minsk, 1985: 99. – Minsk.
- GOLUBKOV V.V., 1992: Lišajniki oxranjaemyx prirodnyx territorij Belorussii (florističeskaja i ekologo-geografičeskaja charakteristika). PhD thesis. – Minsk.
- GOLUBKOV V.V., 2011a: Lixenobiota Nacional'nogo parka «Pripjatskij». – Minsk.
- GOLUBKOV V.V., 2011b: Annotirovannyj spisok lixenočil'nyx gribov Belarusi. – Botanika. Issledovanija, 40: 295–306.
- GOLUBKOV V.V., 2013: Novye, redkie i maloizvestnye taksony lišajnikov, obnaružennye na territorii Belarusi (kratkoe soobščenie). – Materialy IX Meždunarodnoj konferencii “Aktual'nye problemy ekologii”. Grodno, 2013: 1: 22–24. – Grodno.
- GOLUBKOV V.V., KUKWA M., 2006: A contribution to the lichen biota of Belarus. – Acta Mycologica, 42(1): 155–164.
- GOLUBKOV V.V., BELAYA O.V., KOZLOVSKAYA M.V., 2007: Lixenobiotičeskij analiz parmelojdnix lišajnikov Belarusi. – Materialy Meždunarodnoj konferencii “Sovremennoe sostojanie rastitel'nogo i životnogo mira stran Evroregiona Dnepr, ix oxrana i racional'noe ispol'zovanie. Gomel, 2007: 67–71. – Gomel.
- GOLUBKOVA N.S., 2003: Rod *Bacidia* De Not. – In: GOLUBKOVA N.S. (ed.). Opredelitel' Lišajnikov Rossii. Vypusk 8. Bacidiaceae, Catillariaceae, Lecanoraceae, Megalariaceae, Mycobilimbiaceae, Rhizocarpaceae, Trapeliaceae: 12–40. – Saint-Petersburg.
- GORBACH N.V., 1973: Lišajniki Belorussii. Opredelitel'. – Minsk.
- JØRGENSEN P.M., 2007: Collemataceae. – In: AHTI T., JØRGENSEN P.M., KRISTINSSON H., MOBERG R., SØCHTING U., THOR G. (eds). Nordic Lichen Flora, Vol. 3, Cyanolichens: 14–42. – Nordic lichen society.
- KACHANOVSKY I. M. (ed.), 2015: Krasnaja kniga Respubliki Belarus. Rastenija: redkie i naxodaščiesja pod ugrozaj iščežnovenija vidy dikorastuščix rastenij. – Minsk.
- KONDRATYUK S.Y., DYMYTROVA L.V., NADYEINA O.V., 2010: The third checklist of lichen-forming and allied fungi of Ukraine. – In: KONDRATYUK S.Y., ROMS O.G. (eds). Flora Lišajnikov Ukraini, Vol. 2: 446–486. – Kyiv.
- KONDRATYUK S., YATSZYNA A.P., LÖKÖS L., GALANI NA I., HAJI MONIRI M., HUR J.-S., 2013: Three new *Xanthoria* and *Rusavskia* species (Teloschistaceae, Ascomycota) from Europe. – Acta Botanica Hungarica, 55(3–4): 351–365.
- KREYER G.K., 1913: K flore lišajnikov Mogilevskoj gubernii. – Trudy Imperatorskago S.-Peterburgskago Botaničeskago Sada, 31(2): 263–440.
- MOISEJEVS R., 2017: Lichens and allied fungi new for Latvia. – Folia Cryptogamica Estonica, 54: 9–12.
- MOTIEJŪNAITĖ J., 1999: Checklist of lichens and allied fungi of Lithuania. – Botanica Lithuanica, 5(3): 251–269.
- MOTIEJŪNAITĖ J., ANDERSSON L., 2003: Contribution to the Lithuanian flora of lichens and allied fungi. – Botanica Lithuanica, 9(1): 71–88.
- MOTIEJŪNAITĖ J., GROCHOWSKI P., 2014: Miscellaneous new records of lichens and lichenicolous fungi. – Herzogia, 27: 193–198.

- MOTIEJŪNAITĖ J., CHESNOKOV S.V., CZARNOTA P., GAGARINA L.V., FROLOV I., HIMELBRANT D., KONOREVA L.A., KUBIAK D., KUKWA M., MOISEJEVS R., STEPANCHIKOVA I., SUJIA A., TAGIRDZHANOVA G., THELL A., TSURYKAU A., 2016: Ninety-one species of lichens and allied fungi new to Latvia with a list of additional records from Kurzeme. – *Herzogia*, 29: 143–163.
- ORANGE A., JAMES P.W., WHITE F.J., 2001: Microchemical methods for the identification of lichens. – London.
- TITOV A.N., 2006: Mikokalicievye griby (porjadok Mycocaliciales) Golarkтики. – Moscow.
- TSURYKAU A., 2012: *Opegrapha herbarum* – novyj dlja Belarusi vid lišajnika. – Materialy III Meždunarodnoj konferencii “Molodye issledovateli – botaničeskoj nauke 2012”. Gomel, 2012: 72–74. – Gomel.
- TSURYKAU A., 2013: *Lecidea nylanderii* – novyj vid lišajnikov dlja Jugo-Vostoka Belarusi. – Trudy XIII S’ezda Russkogo botaničeskogo obščestva. Toljatti, 2013: 1: 221–222. – Toljatti.
- TSURYKAU A., 2017: New or otherwise interesting records of lichens and lichenicolous fungi from Belarus. II. – *Herzogia*, 29(1): 164–175.
- TSURYKAU A., CZARNOTA P., 2014: Three lichen species of *Micarea* (Pilocarpaceae) new to Belarus. – *Acta Mycologica*, 49(2): 249–253.
- TSURYKAU A., GOLUBKOV V., 2015: The lichens of the *Cladonia pyxidata-chlorophaea* complex in Belarus. – *Folia Cryptogamica Estonica*, 52: 63–71.
- TSURYKAU A., KHRAMCHANKOVA V., 2011: Lichens from Gomel region: a provisional checklist. – *Botanica Lithuanica*, 17(4): 157–163.
- TSURYKAU A., KHRAMCHANKOVA V., 2013: *Cliosotomum leprosum* (Ramalinaceae) – novyj vid lišajnikov dlja Gomel’skoj oblasti. – Sbornik statej II Meždunarodnoj konferencii “Aktual’nye problemy izučeniya i soxraneniya fito- i mikrobioty”. Minsk, 2013: 118–119. – Minsk.
- TSURYKAU A., KHRAMCHANKOVA V., MOTIEJŪNAITĖ J., 2012: *Pycnora sorophora* (Lecanoraceae) – lichen species new to Belarus. – *Botanica Lithuanica*, 18(1): 80–82.
- TSURYKAU A., SUJIA A., KHRAMCHANKOVA V., 2013: New records of lichenicolous fungi from the Gomel Region of Belarus. – *Folia Cryptogamica Estonica*, 50: 67–71.
- TSURYKAU A., GOLUBKOV V., KUKWA M., 2014: New or otherwise interesting records of lichens and lichenicolous fungi from Belarus. – *Herzogia*, 27: 111–120.
- TSURYKAU A., GOLUBKOV V., BELY P., 2015: The genera *Hypotrachyna*, *Parmotrema* and *Punctelia* (Parmeliaceae, lichenized Ascomycota) in Belarus. – *Herzogia*, 28: 736–745.
- TSURYKAU A., GOLUBKOV V., BELY P., 2016a: The genus *Lepraria* (Stereocaulaceae, lichenized Ascomycota) in Belarus. – *Folia Cryptogamica Estonica*, 53: 43–50.
- TSURYKAU A., SUJIA A., HEUCHERT B., KUKWA M., 2016b: New or otherwise interesting records of lichens and lichenicolous fungi from Belarus. II. – *Herzogia*, 29(1): 164–175.
- URBANAVICHUS G.P., 2010: A checklist of the lichen flora of Russia. – St Petersburg.
- YATSINA A.P., 2012a: Novye i interesnye naxodki lišajnikov i nelixenizirovannyx gribov v Belarusi. – *Vesnik Vicebskaga dzyaržaunaga universiteta*, 5(71): 45–49.
- YATSINA A.P., 2012b: Novye vidy lišajnikov, lixnofil’nyx i nelixenizirovannyx gribov NP “Pripjatskij”. Materialy Meždunarodnoj konferencii «Sovremennoe sostojanie i perspektivy razvitija osobo oxranjaemyx prirodnyx territorij Respubliki Belarus”. Domžericy, 2012: 101–104. – Minsk.
- YATSINA A.P., 2012c: Očerok o lišajnikax Glusckogo rajona. – Problemy ustojčivogo razvitija regionov Respubliki Belarus i sopredel’nyx stran: Sbornik naučnyx statej II Meždunarodnoj konferencii, 2. Mogilev, 2012: 316–319. – Mogilev.
- YATSINA A.P., 2013: Novye i interesnye naxodki lišajnikov i lixnofil’nogo griba v Belarusi. – *Vesnik Vicebskaga dzyaržaunaga universiteta*, 3(75): 62–67.
- YATSINA A., 2014: Lichens from manor parks in Minsk region (Belarus). – *Botanica Lithuanica*, 20(2): 159–168.
- YATSINA A., MOTIEJŪNAITĖ J., 2015: New and noteworthy lichens to Belarus. – *Botanica Lithuanica*, 21(1): 57–63.
- ZHURBENKO M.P., 2007: The lichenicolous fungi of Russia: geographical overview and a first checklist. – *Mycologia Balcanica*, 4: 105–124.
- ZHURBENKO M.P., BRAUN U., HEUCHERT B., KOBZEVA A.A., 2015: New lichenicolous hyphomycetes from Eurasia. – *Herzogia*, 28: 584–598.

## PAPILDOMI DUOMENYS APIE GOMELIO REGIONO (BALTARUSIJA) KERPEŠ IR LICHENOFILINIUS GRYBUS

Andrei TSURYKAU

### Santrauka

Pateikiami duomenys apie 21 naują Gomelio regiono (pietrytinė Baltarusijos dalis) kerpių ir lichenofilinių grybų rūšį. Iš jų šešios rūšys (*Bacidia fraxinea*, *Briancoppinsia cytospora*, *Calicium parvum*, *Chaenothecopsis savonica*, *Enchylium bachmanianum*, *Intralichen christiansenii*) yra naujos Baltarusijai, septynios rūšys (*Carbonicola anthracophila*, *Chaenotheca hispidula*, *Cornu-*

*tispora lichenicola*, *Lichenochora obscuroides*, *Licheniconium xanthoriae*, *Pyrenochaeta xanthoriae*, *Tremella hypogymniae*) anksčiau buvo aptiktos šalyje tik vienoje radvietėje. Buvo patvirtinta, kad *Ochrolechia microstictoides* neabejotinai auga Baltarusijoje. *Ochrolechia parella* yra išbraukta iš Gomelio regiono sąrašo, nes anksčiau buvo klaidingai identifikuota.