

Научни трудове на ПУ, <i>Animalia</i>	Год./An.	Том/Vol.	Кн./Fasc.	с./pp.
Trav. Sci. Univ. Plovdiv, <i>Animalia</i>	2004	40	6	129–136

**NEW DISTRIBUTIONAL DATA ABOUT THE FUNGUS GNATS
OF THE FAMILIES *BOLITOPHILIDAE*, *DIADOCIDIIDAE*,
DITOMYIIDAE AND *KEROPLATIDAE* IN BULGARIA
(DIPTERA: NEMATOCERA: SCIAROIDEA)**

Dimitar N. Bechev

*Department of Zoology, University of Plovdiv, 24 Tzar Assen Str., BG-4000
Plovdiv, Bulgaria, bechev@pu.acad.bg*

Abstract. New distributional data about 33 species of fungus gnats in Bulgaria are given.

Key words. Diptera, Sciaroidea, Bolitophilidae, Diadocidiidae, Ditomyiidae, Keroplatidae, Bulgaria.

INTRODUCTION

Fifty seven species of the studied families are known to the fauna of Bulgaria (BECHEV, 2002), in mostly, reported from a single localities. In the present work new distributional data about 33 of them are given.

MATERIAL AND METHODS

The material is collected by the author in various parts of Bulgaria. The geographic regions in **Table 1** are given after HUBENOV (1997). More information about the localities is presented in **Table 2**. Abbreviations: **m**=male, **f**=female.

Table 1. *Geographic district in which are situated the localities.*

Territorial units	Abbreviations
DANUBIAN PLAIN	
Popovo-Provadiya District	DEP
Loudorie-Dobroudzha District	DEL
STARA PLANINA RANGE SYSTEM	
Predbalkan	
Western	SPW
Middle	SPM
Stara Planina Mts (Balkan)	
Western	SBW
Middle	SBM
TRANSITIONAL REGION	
Zemenska Planina Mt.	PKZ
Thracian Lowland	PT
Strandzha Mt.	PBS
RILA-RHODOPE MASSIF	
Belasitsa Mt.	ROB
Kroupnik-Sandanski-Petrich Valley	ROP
Rila Mt.	RPR
Pirin Mt.	RPP
Slavyanka Mt.	RPS
Rhodope Mts	
Western	RRW
Eastern	RRE
BLACK SEA COAST	
Northern	BN
Southern	BS

Table 2. *Information about the localities.*

Locality	Locality type	Geographic region	UTM-code	Altitude Min (m)	Altitude Max (m)
„Aladzha manastir“	place	BN	NH89		150
„Banderitsa“	hut	RPP	GM03	1700	1820
Barziya	village	SBW	FN78		650
„Belasitsa“	hut	ROB	FL87		720
Berkovitsa	town	SBW	FN78		400
Bliznatsi	village	DEP	MJ91		250
„Boatin“	reserve	SBM	KH74	900	1600
„Borovets“	place	RPR	GM18		1300
Cherven	village	DEP	MJ23		150
Dalgi del	village	SBW	FN59	600	700
Divchovoto	village	SBM	KH74	700	800
Druzhevo	village	SBW	FN98		900
Durankulak	village	BN	PJ23		20

New distributional data...

Emine	cape	BN	NH72		150
Emona	village	BN	NH72		100
Goleshovo	village	RPS	GL18		800
Gorno Uyno	village	PKZ	FM29		450
„Hambar dere“	place	RPS	GL28	1250	1500
Isperih	town	DEL	MJ84		250
Kalofer	town	SBM	LH31		650
Kamchia	reserve	BN	NH76		10
Karash	village	SPW	GN37		200
Karlanovo	village	ROP	FM90		500
„Kirilova polyana“	Place	RPR	FM97		1350
Kom (N of)	peak	SBW	FN68		1700
Kostenets (above of)	town	RPR	GM38		900
Kosti	village	PBS	NG65		100
„Ledenika“	hut	SBW	GN08		800
"Levski“	hut	SBM	LH22		1450
„Matnitsa“	place	SBW	FN99		350
Mladezhko	village	PBS	NG36		180
Osenovlag	village	SBW	GN06	700	900
„Parangalitsa“	reserve	RPR	FM95		1500
Parlichevo	village	SPW	FN89		250
„Parshevitsa“	hut	SBW	GN08		1250
Petrich	town	ROP	FL88		300
Petrohan	pass	SBW	FN78	1200	1440
„Pirin“	hut	RPP	GM11		1600
Plovdiv	town	PT	LG16		170
Popsko	village	RRE	MG00		500
„Ray“	hut	SBM	LH33		1700
Rilski manastir	monastery	RPR	FM96		1150
„Ropotamo“	reserve	BS	NG68		10
Rozhenski manastir	monastery	ROP	GM00		550
Shkorpilovtsi	village	BN	NH76		10
„Silkosa“	reserve	PBS	NG66		200
Sinemorets	village	BS	NG75		20
Spanchevtsi	village	SPW	FN88		500
Staro selishte	village	DEL	MJ81		250
Tsarevo	town	BS	NG66	5	40
Varna	town	BN	NH78		20
Varshets (S of)	town	SBW	FN88	600	700
Velika	village	BS	NG68		75
Veslets	hill	SPW	GN19		550
Vratsa	town	SBW	GN08		350
„Yavorov“	hut	RPP	FM93		1740
Zgorigrad (above of)	village	SBW	GN08	600	650
Zlatishki prohod	pass	SBM	KH63	850	1100
Zlatitsa (N of)	town	SBM	KH63		800
Zlatna Panega	village	SPM	KH67		280

FAUNISTIC LIST

FAMILY *BOLITOPHILIDAE*

Bolitophila (Bolitophila) cinerea Meigen, 1818

SPW: Parlichevo, 1.05.1992, 2 m. SBW: Berkovitsa, 7.04.1983, 1 m; Petrohan, 25.06.1984, 2 m, 70 f; Parshevitsa, 20.05.1982, 1 m. SBM: Boatin, 6.06.1982, 2 m; 20.04.1983, 14 m, 1 f; Divchovoto, 22.04.1983, 17 m, 1 f; 25.04.1983, 13 m, 3 f. RPR: Parangalitsa, 28.8.1989, 1 m. RPP: Yavorov, 26.07.1985, 2 m. RPS: Hambar dere, 3.06.1988, 1 m.

Bolitophila (B.) saundersi (Curtis, 1836)

SBW: Dalgi del, 24.07.1983, 1 m; Zgorigrad, 4.07.1983, 2 m; Parshevitsa, 17.07.1983, 2 m. SBM: Zlatitsa, 20.07.1983, 1 m, 1 f; Zlatishki prohod, 18.07.1983, 1 m; Boatin, 6.06.1982, 1 m; Ray, 27.08.1997, 2 m; RPR: Parangalitsa, 28.08.1989, 1 m. RPP: Yavorov, 26.07.1985, 1 m.

Bolitophila (Cliopisa) hybrida (Meigen, 1804)

SBM: Zlatishki prohod, 18.07.1983, 1 m.

Bolitophila (C.) pseudohybrida Landrock, 1912

SPW: Veslets, 9.04.1989, 2 m. SBW: Vratsa, 26.6.1988, 1 m. ROP: Rozhenski manastir, 28.05.1993, 1 m. BS: Sinemorets, 2.06.1990, 1 m.

FAMILY *DIADOCIDIIDAE*

Diadocidia (Diadocidia) ferruginosa (Meigen, 1830)

SBW: Dalgi del, 24.07.1984, 1 m; Matnitsa, 4.09.1984, 1 m; Osenovlag, 5.09.1984, 1 m; Zgorigrad, 4.07.1983, 1 m; Parshevitsa, 17.07.1983, 1 m; Ledenika, 8.06.1984, 1 m. SBM: Boatin, 6.06.1982, 1 m; 7.09.1984, 1 m. ROB: Belasitsa, 23.06.1992, 1 m. BN: Kamchia, 4.07.1985, 1 m; 17.06.1991, 1 m; Aladzha manastir, 15.05.1996, 1 m. BS: Tsarevo, 11.06.1990, 1 m.

Diadocidia (D.) spinosula Tollet, 1948

RPR: FM95: Parangalitsa, 28.08.1989, 3 m, 4 f; FM96: Rilski manastir, 27.08.1989, 2 m. RPP: Yavorov, 20.07.1985, 1 m.

FAMILY *DITOMYIIDAE*

Ditomyia fasciata (Meigen, 1818)

SPW: Veslets, 9.04.1989, 1 m; Karash, 9.07.1988, 1 m, 1 f. SBW: Matnitsa, 4.09.1984, 1 f; Parshevitsa, 23.09.1984, 1 m.

***Symmerus annulatus* (Meigen, 1830)**

SPW: Karash, 9.07.1988, 1 m. PBS: Kosti, 27.05.1987, 1 m; 28.05.1987, 1 m. BN: Kamchia, 4.07.1985, 1 m; Shkorpilovtsi, 21.05.1990, 1 m.

FAMILY KEROPLATIDAE

SUBFAMILY KEROPLATINAE

Tribe Keroplatini

***Cerotelion racovitzai* Matile et Burghele-Balacesco, 1969**

SBW: Byalata voda, 30.05.1985, 2 m. BS: Tsarevo, 11.06.1991, 1 m.

***Cerotelion striatum* (Gmelin, 1790)**

SBW: Vratsa, 22.07.1982, 1 m; 20.05.1986, 1 m; 14.07.1983, 1 m. SBM: Kalofer, 27.08.1997, 1 m. RPS: Goleshovo, 5.06.1988, 2 m.

***Keroplatus reaumurii* Dufour, 1839**

SBW: Vratsa, 1.07.1982, 1 m; 07.1982, 1 m; 14.07.1983, 1 m; 12.06.1986, 1 m; 15.06.1986, 2 m; 25.08.1991, 2 m. BN: Kamchia, 4.07.1985, 1 m, 1 f; Shkorpilovtsi, 8.06.1990, 1 m.

***Keroplatus tipuloides* Bosc, 1792**

ROB: Belasitsa, 24.06.1992, 2 m.

Tribe Orfeliini

***Antlemon (Antlemonopsis) brevipanum* (Loew, 1871)**

SBM: Levski, 28.08.1997, 1 m. RPR: Parangalitsa, 28.08.1989, 1 m; Borovets, 17.08.1990, 1 m.

***Isoneuromyia semirufa* (Meigen, 1818)**

ROB: Belasitsa, 26.06.1992, 4 m. BN: Emona, 5.08.1993, 1 m.

***Macrorrhyncha flava* Winnertz, 1846**

BN: Kamchia, 4.07.1985, 1 f; Tsarevo, 20.06.1989, 4 m, 3 f. BS: Velika, 16.06.1989, 6 f; Ropotamo, 24.06.1989, 1 f; Sinemorets, 21.06.1989, 2 m.

***Neoplatyura nigricauda* (Strobl, 1893)**

SPW: Veslets, 31.05.1985, 1 f. PBS: Silkosia, 11.06.1990, 1 m.

***Orfelia fasciata* (Meigen, 1804)**

SBW: Byalata voda, 30.05.1985, 1 m. ROP: Petrich, 23.06.1992, 1 m.

***Orfelia nemoralis* (Meigen, 1818)**

DEL: Staro selishte, 20.05.1990, 1 m. DEP: Bliznatsi, 20.05.1990, 1 m. PT: Plovdiv, 31.05.1992, 1 m. ROP: Karlanovo, 23.05.1970, 1 m. BN: Kamchia, 4.07.1985, 1 m. BS: Tsarevo, 10.06.1992, 1 m; 29.05.1993, 6 m.

***Orfelia nigricornis* (Fabricius, 1805)**

SBW: Vratsa, 11.08.1889, 1 m.

***Orfelia tristis* (Lundström, 1911)**

SBW: Vratsa, 8.06.1988, 1 m; 15.06.1988, 1 m; 3.07.1988, 1 m; 16.06.1989, 1 m; 25.05.1990, 2 m. RPP: Popski preslop, 31.05.1972, 1 m.

***Orfelia unicolor* (Staeger, 1840)**

SPW: Veslets, 2.09.1983, 1 m. SBW: Barziya, 26.06.1984, 1 m; Berkovitsa, 31.05.1985, 1 m; Byalata voda, 26.06.1982, 1 m; Vratsa, 5.08.1981, 1 m; 22.05.1982, 1 f; 30.06.1982, 1 m; 5.06.1984, 1 m; 8.06.1984, 1 m; 10.06.1984, 1 m; 29.06.1984, 1 m; 28.06.1988, 1 m; 17.07.1989, 1 m. PT: Plovdiv, 9.06.1997, 1 m. ROB: Belasitsa, 24.06.1992, 1 m. RPR: Kirilova polyana, 27.08.1989, 2 m. BS: Tsarevo, 29.05.1993, 1 m.

***Platyura marginata* Meigen, 1804**

SBW: Varshets, 9.06.1984, 1 m. RPR: Kostenets, 22.05.1986, 1 m. RPS: Goleshovo, 5.06.1988, 1 m.

***Pyratula zonata* (Zetterstedt, 1855)**

SBW: Byalata voda, 30.05.1985, 1 m; Vratsa, 13.05.1989, 1 m. PKZ: Gorno Uyno, 20.05.1989, 1 m. ROB: Belasitsa, 23.06.1992, 1 m; 29.05.1993, 1 m. ROP: Rozhenski manastir, 28.05.1993, 1 m. RPS: Paril, 3.06.1988, 1 m.

SUBFAMILY *MACROCERINAE*

***Macrocera anglica* Edwards, 1925**

SBM: Boatin, 7.09.1984, 3 m, 2 f.

***Macrocera centralis* Meigen, 1818**

SBW: Byalata voda, 10.06.1984, 3 m, 1 f; 30.05.1985, 1 m; Varshets, 9.06.1984, 1 m; Druzhevo, 25.08.1981, 1 m; Ledenika, 3.09.1983, 1 m. SBM: Boatin, 6.06.1982, 1 m, 2 f; 7.09.1984, 2 m. RPR: Kirilova polyana, 27.08.1989, 1 m. RPP: Banderitsa, 19.08.1997, 1 m. BN: Emine, 20.05.1990, 1 m.

***Macrocera fasciata* Meigen, 1804**

SPW: Spanchevtsi, 23.05.1982, 1 m; Veslets, 2.09.1983, 1 m; 20.10.1983, 1 m. SBW: Barziya, 26.06.1984; Matnitsa, 10.07.1982, 2 m; 20.08.1982, 2m; Vratsa, 5.08.1982, 1 m; Ledenika, 3.09.1983, 4 m. PBS: Mladezhko, 26.09.1989, 1 m;

Silkosia, 26.09.1989, 1 m. ROB: Belasitsa, 24.06.1992, 4 m. ROP: Petrich, 20.05.1990, 3m; 22.06.1992, 1 m. RPS: Goleshovo, 5.06.1988, 2 m.

***Macrocera inversa* Loew, 1869**

DEP: Cherven, 13.05.1996, 2 m. ROB: Belasitsa, 24.06.1992, 2 m, 1 f. RPR: Borovets, 17.07.1985, 1 m. RPP: Yavorov, 20.07.1985, 1 m.

***Macrocera lutea* Meigen, 1804**

SPW: Karash, 9.07.1988, 2 m. PBS: Silkosia, 29.05.1987, 1 m. ROB: Belasitsa, 24.06.1992, 1 m. BN: Shkorpilovtsi, 8.06.1990, 1 m. BS: Sinemorets, 2.06.1990, 1 m.

***Macrocera parva* Lundström, 1914**

SBW: Kom, 8.07.1982, 6 m, 1 f; 20.08.1983, 1 m, 1 f. SBM: Boatin, 6.06.1982, 2 m, 1 f. RPP: Yavorov, 20.07.1985, 1 m.

***Macrocera phalerata* Meigen, 1818**

DEL: Isperih, 20.05.1990, 1 m, 1 f. DEP: Bliznatsi, 28.05.1990, 1 m. SPM: Zlatna Panega, 14.06.1990, 1 m. SBW: Vratsa, 5.08.1981, 1 m; Parshevitsa, 17.07.1984, 1 f. PBS: Silkosia, 11.06.1990, 1 m. ROB: Belasitsa, 24.06.1992, 2 m. RPS: Goleshovo, 5.06.1988, 2 m. BN: Kamchia, 8.06.1990, 4 m; NH78: Varna, 9.06.1990, 1 m; Durankulak, 7.07.1985, 1 m. BS: Tsarevo, 17.06.1991, 1 m; Velika, 6.07.1996, 1 m.

***Macrocera stigma* Curtis, 1837**

RPS: Goleshovo, 5.06.1988, 2 m; Hambar dere, 3.06.1988, 1 m.

***Macrocera stigmoides* Edwards, 1925**

RPR: Borovets, 17.07.1989, 1 m. RPP: Yavorov, 20.07.1985, 1 m; Banderitsa, 19.08.1997, 5 m. BS: Tsarevo, 20.06.1989, 1 m; 11.06.1992, 1 m; Velika, 6.07.1996, 1 m.

***Macrocera vittata* Meigen, 1830**

SPW: Veslets, 31.05.1985, 1 m. SBW: Byalata voda, 10.07.1982, 1 m; 10.06.1984, 1 m; Varshets, 9.06.1984, 2 m; Zgorigrad, 4.07.1983, 2 m. ROB: Belasitsa, 24.06.1992, 1 m. RPS: Paril, 3.06.1988, 1 m.

REFERENCES

- BECHEV D. 2002. Check list of the fungus gnats of the families Bolitophilidae, Diadocidiidae, Ditomyiidae, Keroplatidae and Mycetophilidae in Bulgaria (Diptera: Nematocera). – *Trav. Sci. Univ. Plovdiv, Biologie, Animalia*, **38**, 6: 81-112.
- HUBENOV Z. 1997. Possibilities for using of a system from the really defined natural territories for the faunistic researches in Bulgaria. – *Acta zool. Bulg.*, **49**: 5-9.

НОВИ ДАННИ ЗА РАЗПРОСТРАНЕНИЕТО НА ГЪБНИТЕ КОМАРИ ОТ СЕМЕЙСТВА *BOLITOPHILIDAE*, *DIADOCIDIIDAE*, *DITOMYIIDAE* И *KEROPLATIDAE* В БЪЛГАРИЯ (DIPTERA: NEMATOCERA: SCIAROIDEA)

Димитър Н. Бечев

*Катедра Зоология, Пловдивски университет „Паусий Хилендарски“,
Цар Асен 24, 4000 Пловдив*

(Резюме)

Досега за фауната на България от изследваните семейства са известни 57 вида (BECHEV, 2002), повечето съобщени от единични находища. В настоящата работа се дават редица нови фаунистични данни за 33 от тях.