

# SPIDERS FROM SHARR MOUNTAIN – NEW FAUNISTIC DATA (ARACHNIDA: ARANEAE)


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Grapci-Kotori, L., Geçi, D., Naumova, M., Ibrahim, H., Bilalli, A., Musliu, M., Gashi, A. & Kasumaj, E.: Spiders from Sharr Mountain - new faunistic data (Arachnida: Araneae). *Nat. Croat.*, Vol. 31, No. 2., 335-350, Zagreb, 2022.

In this paper, we present new faunistic data of the spider fauna from the Sharr Mountains (Kosovo), one of the least investigated areas in the Balkans.

Previously only 27 species of spiders were known from the Kosovo part of the Sharr Mountains but with this investigation, the number has increased to 74. Pictures of rare and interesting species are provided. We also include a new record from the North Macedonian part of the Sharr Mountains.

In total we report fifty species, eight of which are first records for Sharr Mountains, twenty-eight are first records for Kosovo, and one species is reported for the first time for North Macedonia. Species recorded for the first time from the Sharr Mountains belong to the following genera: *Histopona*, *Clubio-*

*na, Zelotes, Ceratinella, Mughiphantes, Robertus* and *Ozyptila*. We also provide a checklist of spider species for the Sharr Mountains in Kosovo.

**Keywords:** Kosovo, North Macedonia, endemism, diversity

**Grapci-Kotori, L., Geci, D., Naumova, M., Ibrahim, H., Bilalli, A., Musliu, M., Gashi, A. & Kasumaj, E.: Pauci Šar-planine – novi faunistički podaci (Arachnida: Araneae). Nat. Croat., Vol. 31, No. 2., 335-350, Zagreb, 2022.**

U ovom radu predstavljamo nove faunističke podatke o paucima Šar-planine (Kosovo), jednog od najmanje istraženih područja na Balkanu.

Prethodno je iz kosovskog dijela Šar-planine bilo poznato samo 27 vrsta pauka, no s ovim istraživanjem broj se povećao na 74. Priložene su slike rijetkih i zanimljivih vrsta. U rad smo uključili i novi nalaz s makedonskog dijela Šar-planine.

Ukupno donosimo 50 vrsta, od kojih su osam prvi nalazi za Šar-planinu, 28 su prvi nalazi za Kosovo, a jedna vrsta je prvi puta zabilježena za Sjevernu Makedoniju. Vrste zabilježene po prvi puta za Šar-planinu pripadaju sljedećim rodovima: *Histopona*, *Clubiona*, *Zelotes*, *Ceratinella*, *Mughiphantes*, *Robertus* i *Ozyptila*. Također donosimo popis vrsta pauka za Šar-planinu na Kosovu.

**Ključne riječi:** Kosovo, Sjeverna Makedonija, endemi, raznolikost

## INTRODUCTION

The Sharr Mountains are located at the border area of three countries: Kosovo, North Macedonia, and Albania. The area is situated in the northwestern part of Macedonia, the southern part of Kosovo and the northeastern part of Albania. Sharr Mountains National Park in Kosovo has an area of 53.469 ha and lies in the territory of the following municipalities: Kaçanik, Shtërpce, Suharekë, Prizren and Dragash. This area is known for the high rates of endemism of all groups due to the topographic complexity, geological events that happened in the past, unique microhabitats and long-term stable environmental parameters. This region is characterized by substantial forest ecosystems, and diverse geomorphological and hydrological features.

The spider fauna of this area is, however, poorly investigated. Spider fauna from the Sharr Mountains in Kosovo has been studied by BRESJANČEVA (1907) with nine species recorded, KRATOCHVÍL (1935) with five species recorded, DRENSKY (1935, 1936) with five species recorded, ŠILHAVÝ (1944) with five species recorded, DELTSHEV *et al.* (2003) with six species recorded, VRENOZI & JÄGER (2013) with five species recorded, and GEÇI & NAUMOVA (2021b) with ten species recorded. When it comes to spiders Kosovo's Sharr studies are fragmentary and include only small areas and data based on occasional short-term field trips.

The aim of this study was to investigate the composition of spider fauna from the Sharr Mountains (Kosovo).

## MATERIALS AND METHODS

In this paper, we provide data from 22 sites in the Sharr Mountains from 690-2232m above sea level. Except for site S12, which belongs to North Macedonia, all the other sites are located in the Kosovo part of the Sharr Mountains. Sites S1-S14 are from current research while the others are from the literature (Table 1). Spiders were collected with different methods, such as sieving net, entomological net, beating bushes and handpicking. Samples were preserved in 70% alcohol and identified to the species level by using Olympus Stereomicroscope and photographed with a GXCAPTURE camera,

in the Laboratory of Zoology of the University of Prishtina by using the online identification key (NENTWIG *et al.*, 2022). Maps were made with the use of QGIS (Fig. 1). The nomenclature follows the WORLD SPIDER CATALOG (2022) and the taxa are listed alphabetically. Species are represented by the number of specimens, date and the place where they are found.

The newly recorded species are marked:

- \* the first record of species for Kosovo
- \*\* the first record of genera and species for Kosovo
- the first record of species for North Macedonia
- the first record of species for Sharr
- ■ the first record of genera and species for Sharr

Specimens are deposited at the University of Prishtina, Faculty of Mathematics and Natural Sciences, Department of Biology.

**Tab. 1.** Locality data for the fourteen sampling sites from Sharr Mountains

Code	Sampling Site	Latitude °N	Longitude °E	Altitude m
Localities from the current investigation				
S1	Brezovicë1	42.1847744	21.043387	1889
S2	Brezovicë2	42.184609	21.04773	1984
S3	Brezovicë3	42.184239	21.046723	1934
S4	Brezovicë4	42.182848	21.038382	1781
S5	Brezovicë5	42.18818	21.003503	1377
S6	Prevallë1	42.174846	20.975118	1405
S7	Prevallë2	42.166731	20.963175	1631
S8	Prevallë3	42.15928	20.960144	1896
S9	Reselicë1	41.92226	20.643631	1820
S10	Reselicë2	41.8584121	20.62171	1626
S11	Restelicë3	41.962404	20.647994	1245
S12	North Macedonia	41.857296	20.625278	1564
S13	Luboten1	42.211765	21.135465	1768
S14	Luboten2	42.205927	21.131744	1935
Localities from literature				
S15	Brezovicë6	42.2058	20.9532	1090
S16	Firajë	42.2485	21.0383	690
S17	Gotovushë	42.2344	21.0767	1140
S18	Livadhi Lake	42.2084	21.1153	2232
S19	Luboten3	42.2084	21.1153	2230
S20	Plavë	42.0959	20.6477	950
S21	Lubiqevë	42.1523	20.7386	730
S22	Sredskë	42.1721	20.8561	740



**Fig. 1.** Sampling sites in the Sharr Mountains (S1-11, S13-22 in Kosovo and S12 in North Macedonia) S13-S22 - Sites for which data are extracted from the literature.

## RESULTS

Overall, 558 specimens were collected, and from them, 267 were adults that were identified to the species level. From the total number of adult specimens, 195 were females and 72 males.

Digital images of the essential taxonomic features were added for some rare species and some other species, which are difficult to identify: *Inermocoelotes karlinskii* (Fig. 2), *Inermocoelotes melovskii* (Fig. 3), *Histopona laeta* (Fig. 4), *Clubiona comta* (Fig. 5), *Clubiona pseudoneglecta* (Fig. 6), *Cybaeus balkanus* (Fig. 7), *Zelotes olympi* (Fig. 8), *Ceratinella brevis* (Fig. 9) and *Linyphia hortensis* (Fig. 10).

The highest number of the found genera belongs to the family Araneidae with 11 genera, followed by Linyphiidae with 7 genera and Theridiidae with 6 genera. The highest number of species comes from the family Araneidae 13 followed by Thomisidae with 9, Theridiidae 8, Lycosidae 8, and Linyphiidae 7. The highest number of specimens belongs to the following species: *Metellina segmentata* (47), *Metellina mengei* (37) and *Araneus quadratus* (34). Species with a single specimen captured are: *Inermocoelotes karlinskii*, *Amaurobius fenestrali*, *Histopona laeta*, *Araneus angulatus*, *Cyclosa conica*, *Clubiona comta*, *Dysderocrates silvestris*, *Dysderocrates storkani*, *Zelotes oblongus*, *Zelotes similis*, *Ceratinella bervis*, *Centromerus sylvaticus*, *Linyphia hortensis*, *Microlinyphia pusilla*, *Alopecosa accentuata*, *Philodromus dispar*, *Euophrys frontalis*, *Steatoda bipunctata*, *Steatoda paykulliana* and *Ozyptila trux*.

## List of species

### AGELENIDAE

1.\* *Inermocoelotes karlinskii* (Kulczyński, 1906) (Fig. 2)

New data: S5 (1♂, 15. IX. 2021).

The images of the male presented (Fig. 2) correspond well with the drawings of WANG *et al.*, 2010

Overall distribution: Carpatho-Balkan

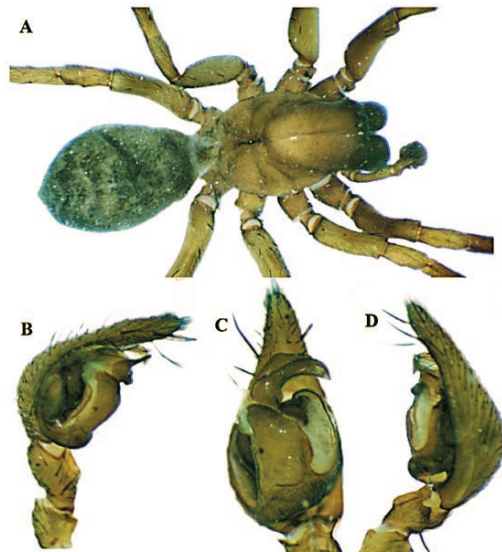


Fig. 2. A - Habitus, B - Palp prolateral, C - Palp ventral, D - Palp retrolateral

2. \**Inermocoelotes melovskii* Komnenov, 2017 (Fig. 3)

New data: S9 (1♀, 08. V. 2018, 1♂, 26.V. 2021).

The images of the male and female presented (Fig. 3) correspond well with the drawings and images in the description (KOMNENOV, 2017)

Overall distribution: Balkan

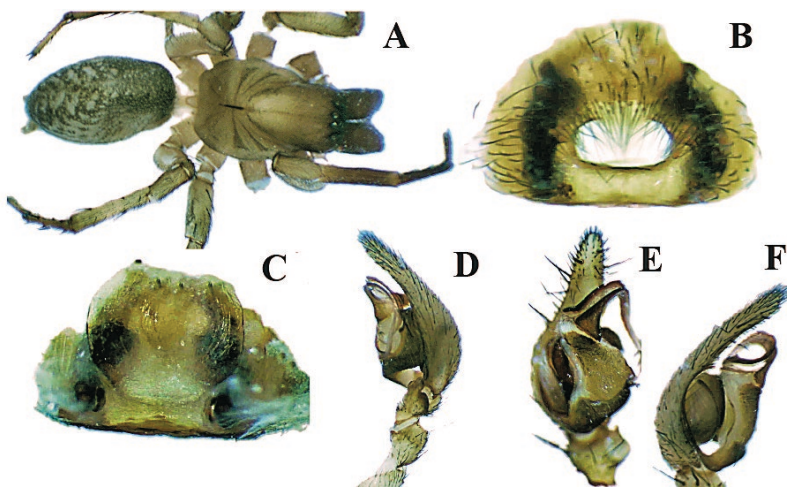


Fig. 3. *Inermocoelotes melovskii*, A - Habitus, B - Epigyne ventral, C - Epigyne dorsal, D - Palp retrolateral, E - Palp ventral, F - Palp prolateral

3. \* ■ *Histoipona laeta* (Kulczyński, 1897) (Fig. 4)

New data: S6 (1♀, 16. IX. 2021).

The images of the female presented (Fig. 4) correspond well with the drawings of WEISS & RUSDEA, 1998

Overall distribution: Balkan

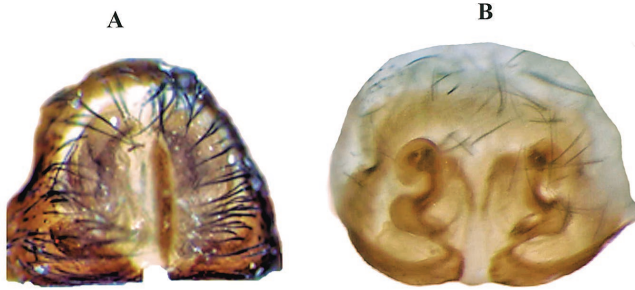


Fig. 4. *Histoipona laeta*; Epigyne: A - ventral, B - dorsal

#### AMAUROBIIDAE

4. *Amaurobius fenestralis* (Ström, 1768)

New data: S11 (1♀, 26. IX. 2021).

Overall distribution: Euro-Central Asian

#### ARANEIDAE

5. *Aculepeira ceropegia* (Walckenaer, 1802)

New data: S2 (3♀♀ 1♂, 11. VII. 2021, 1♀, 24. VII. 2021), S6 (2♀♀ 1♂, 16. VII. 2021).

Overall distribution: Euro-Caucasian

6. *Agalenatea redii* (Scopoli, 1763)

Literature data: S16 (GECI & NAUMOVA, 2021b).

Overall distribution: Palearctic

7. *Araneus angulatus* Clerck, 1757

New data: S10 (1♂, 26.IX.2021).

Overall distribution: Palearctic

8. \* *Araneus diadematus* Clerck, 1757

New data: S3 (1♀, 15. IX. 2021), S5 (2♀♀, 15. IX. 2021), S6 (2♀♀, 16. IX. 2021), S7 (2♀♀, 16. IX. 2021), S8 (1♀, 16. IX. 2021).

Overall distribution: Holartic

9. *Araneus quadratus* Clerck, 1757

New data: S1 (1♀, 11. VII. 2021, 4♀♀, 24. VII. 2021), S2 (1♀, 11. VII. 2021, 3♀♀, 24. VII. 2021), S3 (1♀, 15. IX. 2021), S5 (1♀, 15. IX. 2021), S6 (2♀♀, 16. IX. 2021), S7 (1♀ 1♂, 16. IX. 2021), S8 (2♀♀, 16. IX. 2021), S9 (4♀ 1♂, 26. IX. 2021), S10 (6♀♀ 3♂♂, 26. IX. 2021), S12 (2♀♀ 1♂, 26. IX.2021), S13 (1♀, 11. V. 2018).

Overall distribution: Euro-Siberian

10. *Araniella cucurbitina* (Clerck, 1757)

Literature data: S21 (BRESJANČEVA, 1907).

Overall distribution: Palearctic

11. *Araniella opisthographa* (Kulczyński, 1905)

New data: S4 (2♀♀ 1♂♂, 11.VII.2021).

Overall distribution: Euro-Central Asian

12. *Cyclosa conica* (Pallas, 1772)

New data: S13 (1♀♀, 11.V.2018).

Overall distribution: Palearctic

13. *Gibbaranea bituberculata* (Walckenaer, 1802)

New data: S13 (1♀♀ 1♂♂, 11.V.2018).

Overall distribution: Palearctic

14. *Larinioides patagiatus* (Clerck, 1757)

New data: S1 (13♀♀ 2♂♂, 11. VII. 2021).

Overall distribution: Holarctic

15. *Nuctenea umbratica* (Clerck, 1757)

Literature data: S16 (GECI &amp; NAUMOVA, 2021b).

Overall distribution: Euro-Central Asian

16. *Singa hamata* (Clerck, 1757)Literature data: S21 (BRESJANČEVA, 1907; DELTSHEV *et al.*, 2003; VRENOZI & JÄGER, 2013)

Overall distribution: Palearctic

17. *Zilla diodia* (Walckenaer, 1802).

Literature data: S16 (GECI &amp; NAUMOVA, 2021b).

Overall distribution: Palearctic

## CLUBIONIDAE

18. \* ■ *Clubiona comta* C. L. Koch, 1839 (Fig. 5)

New data: S1 (1♀♀, 15. IX. 2021).

The images of the female presented (Fig. 5) correspond well with images made by BOSMANS *et al.*, 2017.

Overall distribution: Euro-Caucasian

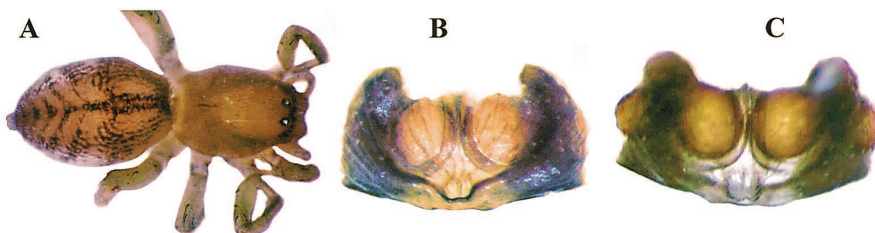


Fig. 5. *Clubiona comta*, A - Habitus, B - Epigyne Ventral, C - Epigyne Dorsal

19. \* ■ *Clubiona pseudoneglecta* Wunderlich, 1994 (Fig. 6)

New data: S7 (1♀, 16. IX. 2021), S9 (1♀, 26. IX. 2021), S10 (1♀, 26. IX. 2021).

The images of the female presented (Fig. 6) correspond well with images made by BOSMANS *et al.*, 2017.

Overall distribution: Euro-Central Asian

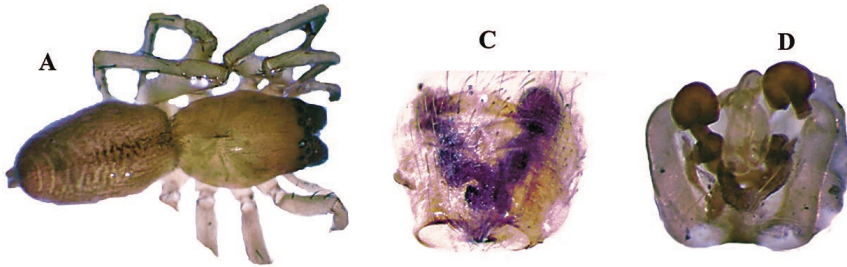


Fig. 6. *Clubiona pseudoneglecta*, A - Habitus, B - Epigyne ventral, C - Epigyne dorsal

#### CYBAEIDAE

20. \*\* *Cybaeus balkanus* Deltshv, 1997 (Fig. 7)

New data: S3 (1♂, 11. VII. 2021).

The images of the male (Fig. 7) correspond well with the drawings in the description (DELTSHEV, 1997).

Overall distribution: Balkan

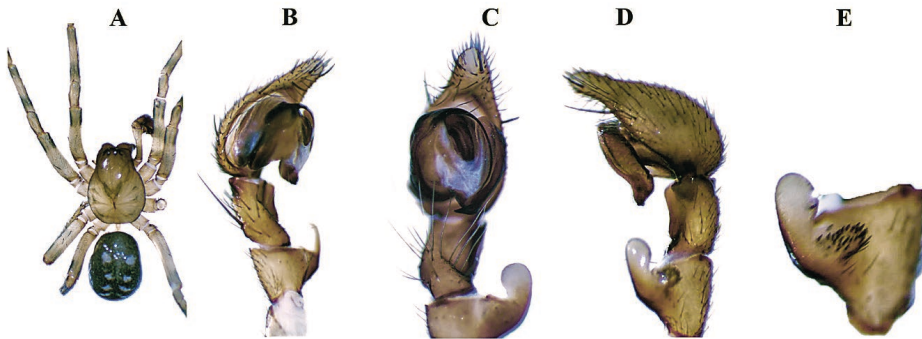


Fig. 7. *Cybaeus balkanus*, A - Habitus, B - Palp retrolateral, C - Palp prolateral, D - Palp ventral, E - Palp dorsal, F - patellar apophysis

#### DYSDERIDAE

21. \* *Dysderocrates silvestris* Dieleman-Reinhold, 1988

New data: S3 (1♂, 24. VII. 2021).

Overall distribution: Balkan



22. *Dysderocrates storkani* (Kratohvíl, 1935)

Literature data: S18 (KRATOCHVÍL, 1935)

New data: S14 (1♀, 11. V. 2018).

Overall distribution: Balkan

GNAPHOSIDAE

23. *Drassodes lapidosus* (Walckenaer, 1802)

New data: S2 (2♀♀, 24. VII. 2021), S3 (1♀ 1♂, 24. VII. 2021).

Overall distribution: Palearctic

24. \* *Zelotes oblongus* (C. L. Koch, 1833)

New data: S9 (1♀, 08. V. 2018).

Overall distribution: South-European

25. \*●■ *Zelotes olympi* (Kulczyński, 1903) (Fig. 8)

New data: S10 (1♀ 2♂♂, 26. IX. 2021), S12 (1♀ 2♂♂, 26. IX. 2021).

The presented images of the male (Fig. 8) fit well with the drawings of KOVBLÝUK, 2005.

Overall distribution: Euro-Caucasian

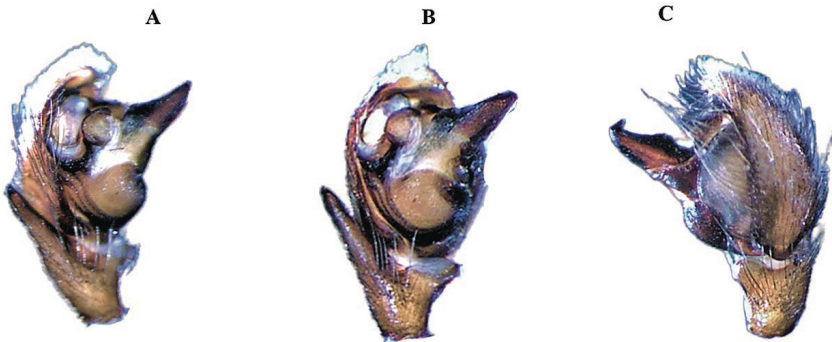


Fig. 8. *Zelotes olympi*, A - Palp retrolateral, B - Palp ventral, C - Palp prolateral

26. \* *Zelotes similis* (Kulczyński, 1887)

New data: L14 (1♀, 11. V. 2018).

Overall distribution: Euro-Central Asian

LINYPHIIDAE

27. \*\* *Bolyphantes alticeps* (Sundevall, 1833)

New data: S1 (1♂, 15. IX. 2021), S7 (1♂, 16. IX. 2021), S9 (1♂, 26. IX. 2021).

Overall distribution: Euro-Asian

28. \*\*■ *Ceratinella brevis* (Wider, 1834) (Fig. 9)

New data: S4 (1♂, 15. IX. 2021).

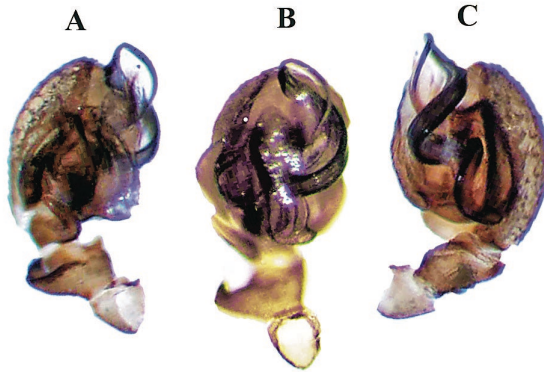


Fig. 9. *Ceratinella bervis*, A - Palp pretrolateral, B - ventral, C - prolateral

The images of the male presented (Fig. 9) fit well with the images of COŞAR (2021).

Overall distribution: Euro-Asian

29. \*\* *Centromerus sylvaticus* (Blackwall, 1841)

New data: S5 (1♂, 15. IX. 2021).

Overall distribution: Holarctic

30. \* *Linyphia hortensis* Sundevall, 1830 (Fig. 10)

New data: S6 (1♂, 30. X. 2010).

The images of the male presented (Fig. 10) fit well with the drawing made by ROBERTS (1998).

Overall distribution: Palearctic

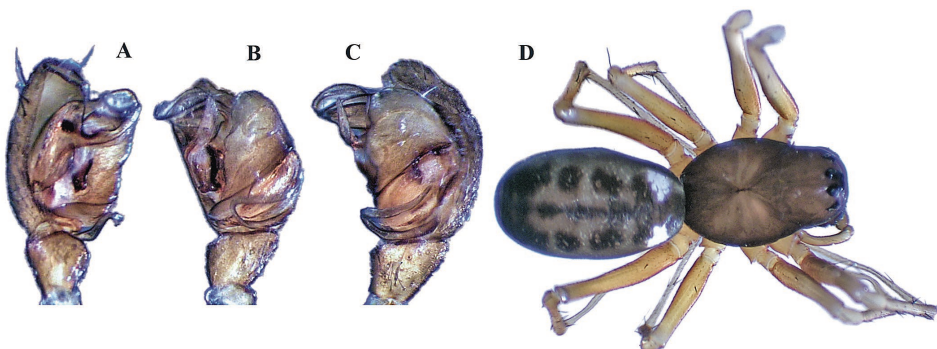


Fig. 10. *Linyphia hortensis*, A - Palp pretrolateral, B - ventral, C - prolateral, D - habitus

31. *Neriene montana* (Clerck, 1757)

Literature data: S16 (GECI & NAUMOVA, 2021b)

Overall distribution: Euro-Asian

32. *Microlinyphia pusilla* (Sundevall, 1830) \*

New data: S2 (1♂, 11. VII. 2021).

Overall distribution: Euro-Siberian.

33. \*\**Mughiphantes* sp.

New data: S5 (1♂, 15. IX. 2021), S6 (2♂♂, 16. IX. 2021)

Overall distribution: Balkan

34. *Tenuiphantes tenebricola* (Wider, 1834)

New data: S5 (2♀♀ 1♂, 11. VII. 2021).

Overall distribution: Euro-Siberian

#### LYCOSIDAE

35. \* *Alopecosa accentuata* (Latreille, 1817)

New data: S13 (1♂, 11. V. 2018).

Overall distribution: Euro-Central Asian

36. *Alopecosa cuneata* (Clerck, 1757)

New data: S9 (3♂♂, 08. V. 2018)

Overall distribution: Euro-Siberian.

37. *Alopecosa trabalis* (Clerck, 1757)

Literature data: S22 (DELTSHEV *et al.*, 2003; VRENOZI & JÄGER, 2013)

Overall distribution: European

38. *Pardosa fulvipes* (Collett, 1876)

Literature data: S17 (KRATOCHVÍL, 1935)

Overall distribution: Euro-Siberian

39. *Pardosa lugubris* (Walckenaer, 1802)

Literature data: S16 (GECI & NAUMOVA, 2021b).

Overall distribution: Palearctic

40. *Pardosa mixta* (Kulczyński, 1887)

Literature data: S18, S19 (Kratochvíl, 1935)

Overall distribution: European

41. \**Pardosa monticola* (Clerck, 1757)

New data: S13 (2♀♀ 1♂, 11. V. 2021).

Overall distribution: European

42. *Pardosa saltuaria* (L. Koch, 1870)

Literature data: S19 (KRATOCHVÍL, 1935)

New data: S1 (2♀♀, 11. VII. 2021), S3 (11♀♀ 1♂, 11. VII. 2021, 4♀♀ 2♂, 24. VII. 2021).

Overall distribution: Euro-Caucasian

43. *Trochosa robusta* (Simon, 1876)

Literature data: S18 (KRATOCHVÍL, 1935)

New data: S14 (2♀♀, 11. V. 2018)

Overall distribution: Euro-Siberian

## OXYOPIDAE

44. *Oxyopes ramosus* (Martini & Goeze, 1778)

Literature data: S21 (BRESJANČEVA, 1907; DRENSKY, 1936; DELTSHEV *et al.*, 2003; VRENOZI & JÄGER, 2013)

Overall distribution: Euro-Siberian

## PHILODROMIDAE

45. \**Philodromus dispar* Walckenaer, 1826

New data: S9 (1♀, 08.V.2018).

Overall distribution: Euro-Caucasian

46. \**Tibellus oblongus* (Walckenaer, 1802)

New data: S1 (1♂, 11. VII. 2021), S2 (4♀♀, 1♂, 11. VII. 2021)

Overall distribution: Holarctic

## PISAUROIDAE

47. *Pisaura mirabilis* (Clerck, 1757)

Literature data: S15, S21 (GECI & NAUMOVA, 2021b; BRESJANČEVA, 1907; DRENSKY, 1936; DELTSHEV *et al.*, 2003; VRENOZI & JÄGER, 2013)

New data: S1 (2♀♀, 24.VII.2021), S12 (2♀♀, 3♂♂, 26.IX.2021), S13 (1♂, 11. V. 2018).

Overall distribution: Palearctic

## SALTICIDAE

48. \*\**Euophrys frontalis* (Walckenaer, 1802)

New data: S5 (1♀, 11.V.2021)

Overall distribution: Palearctic

49. \**Neon reticulatus* (Blackwall, 1853)

New data: S6 (2♀♀, 16. IX. 2021)

Overall distribution: Holarctic

50. *Marpissa muscosa* (Clerck, 1757)

Literature data: S15, S16 (GECI & NAUMOVA, 2021b)

Overall distribution: Euro-Siberian

51. *Pellenes seriatus* (Thorell, 1875)

Literature data: S15 (GECI & NAUMOVA, 2021b)

Overall distribution: Euro-Central Asian

## SEGESTRIIDAE

52. *Segestria senoculata* (Linnaeus, 1758)

Literature data: S15 (GECI & NAUMOVA, 2021b)

New data: S2 (2♀♀, 11. VII. 2021), S9 (1♀ 1♂, 26.IX.2021).

Overall distribution: Palearctic

## SPARASSIDAE

53. *Micrommata virescens* (Clerck, 1757)

Literature data: S21 (BRESJANČEVA, 1907; DELTSHEV *et al.*, 2003; VRENOZI & JÄGER, 2013).

Overall distribution: Palearctic

## TETRAGNATHIDAE

54.\* *Metellina menzei* (Blackwall, 1869)

New data: S6 (5♀♀, 30. X. 2010, 24♀♀ 8♂♂, 16. IX. 2021)

Overall distribution: Euro-Caucasian

55. *Metellina merianae* (Scopoli, 1763)

Literature data: S20 (VRENOZI & JÄGER 2013)

Overall distribution: Euro-Central Asian

56. *Metellina segmentata* (Clerck, 1757)

New data: S3 (8♀♀ 2♂♂, 15. IX. 2021), S4 (4♀♀, 15. IX. 2021), S10 (22♀♀ 9♂♂, 26. IX. 2021), S12 (2♀♀, 26. IX. 2021)

Overall distribution: Holarctic

## THERIDIIDAE

57. *Enoplognatha ovata* (Clerck, 1757)

Literature data: S21 (BRESJANČEVA 1907; DRENSKY 1936)

Overall distribution: Holarctic

58. *Crustulina guttata* (Wider, 1834)

Literature data: S16 (GECI & NAUMOVA, 2021b)

Overall distribution: Euro-Asian

59. *Phylloneta sisyphia* (Clerck, 1757)

Literature data: S21 (BRESJANČEVA, 1907; DRENSKY, 1936)

New data: S4 (3♀♀, 15. IX. 2021), S6 (2♀♀, 16. IX. 2021)

Overall distribution: Palearctic

60. \* *Platnickina tinctoria* (Walckenaer, 1802)

New data: S1 (3♀♀, 11.VII.2021, 1♀, 24.VII.2021), S2 (1♀, 24.VII.2021)

Overall distribution: Euro-Siberian

61. \*■ *Robertus lividus* (Blackwall, 1836)

New data: S6 (1♂, 30. X. 2010)

Overall distribution: Euro-Asian

62. *Steatoda albomaculata* (De Geer, 1778)

New data: S10 (2♀♀ 1♂, 26. IX. 2021), S12 (3♀, 2♂, 26. IX. 2021).

Overall distribution: Holarctic

63. \* *Steatoda bipunctata* (Linnaeus, 1758)

New data: S8 (1♀, 16. IX. 2021)

Overall distribution: Euro-Asian

64. *Steatoda paykulliana* (Walckenaer, 1806)

New data: S10 (1♀, 26. IX. 2021).

Overall distribution: Mediterranean-Central Asian

#### THOMISIDAE

65. *Runcinia grammica* (C. L. Koch, 1837)

Literature data: S21 (BRESJANČEVA, 1907)

Overall distribution: Euro-Siberian

66. \*■ *Ozyptila trux* (Blackwall, 1846)

New data: S11 (1♂, 26. IX. 2021)

Overall distribution: Euro-Caucasian

67. *Psammitis sabulosus* (Hahn, 1832)

Literature data: S19 (ŠILHAVÝ, 1944)

Overall distribution: European

68. *Thomisus onustus* Walckenaer, 1805

Literature data: S21 (BRESJANČEVA, 1907; DRENSKY, 1936; DELTSHEV *et al.*, 2003; VRENOZI & JÄGER, 2013).

Overall distribution: Palearctic

69. *Xysticus audax* (Schrank, 1803)

New data: S2 (1♀, 11. VII. 2021, 1♀, 24. VII. 2021).

Overall distribution: Palearctic

70. *Xysticus cristatus* (Clerck, 1757)

Literature data: S17, S18 (ŠILHAVÝ, 1944).

Overall distribution: Euro-Siberian

71. *Xysticus erraticus* (Blackwall, 1834)

Literature data: S17 (ŠILHAVÝ, 1944)

New data: S13 (1♀, 11. V. 2018).

Overall distribution: European

72. *Xysticus ferrugineus* Menge, 1876

Literature data: S19 (ŠILHAVÝ, 1944).

Overall distribution: Euro-Asian

73. *Xysticus kochi* Thorell, 1872

Literature data: S19 (ŠILHAVÝ, 1944).

Overall distribution: Palearctic

74. *Xysticus lanio* C. L. Koch, 1835

Literature data: S19 (ŠILHAVÝ, 1944).

Overall distribution: Palearctic

## DISCUSSION

According to literature data and current data, in the Kosovo part of the Sharr Mountains there are 74 species of spider, belonging to 51 genera and 18 families.

*Inermocoelotes melovskii* was previously known only from the North Macedonian part of Sharr (KOMNENOV, 2017) but now is found in Kosovo as well.

Spider species included in this research belong to 11 zoogeographic areas, with the majority of the species belonging to the Palearctic region, in total 25.6% of the total number of species (19), followed by Euro-Siberian species with 14.86% (11), Euro-Central Asian and Holarctic species, that share the same percentage of 10.81% (8), Euro-Caucasian and Euro-Asian, each with 9.46% (7), Balkan endemic species with 8.10%, European species 6.75% (5), Carpatho-Balkan, South European and Mediterranean-Central Asian make 1.35% of the total number of the species each.

The knowledge of spiders in Kosovo was neglected for a long time but lately it has been slowly increasing (GECI & NAUMOVA, 2021a, 2021b).

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