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AN UPDATED CHECK LIST OF DAILY BUTTERFLIES (LEPIDOPTERA: HESPERIOIDEA AND PAPILIONOIDEA) IN NORTH MACEDONIA

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Abstract

In Europe are known 496 species daily butterflies, which belong to 111 genera in 21 subfamilies and six families (Martin Wiemers et al., 2018). Changes compared to the last version of the checklist (Krpach et all., 2008) 8 species of butterflies more have been added for the territory of the Republic of North Macedonia, so far is checked the list of 212 species, arranged in to 85 genera, 14 tribusis, 14 subfamilies and 5 families. The family Hesperiidae – Skippers is represented by 28 species; family Papilionidae – Swallowtail butterflies by 7 species; family Pieridae – Whites, Yellows, and Sulphurs by 25 species; family Lycaenidae – Gossamer-Winged Butterflies (Blues, Coppers, Hairstreaks, Harvesters) is presented by 57; family Nymphalidae – Brush-footed Butterflies or Four-footed Butterflies (Emperors, Admirals, Tortoiseshells and Fritillaries) by 95 species. Such huge number of species compared to the rest of European countries is illustrating the abundance of Fauna of daily butterflies in the Republic of North Macedonia.

Keywords: daily butterflies, check list, North Macedonia

Introduction

Butterflies constitute one of the most well-known groups of insects and have become important models for studying speciation, community ecology, biogeography, climate change, and insect-plant interactions. Daily butterflies, among some plants and vertebrates, are indicators according to which is made evaluation on determined area. Such localities are subjected under constant monitoring on the European level for the sake of their protection. This paper will specifically address species that have severely reduced populations, rarely encountered, newly arrived species that have not been registered in North Macedonia before, or have a small distribution area in Europe.

Material And Methods

We have at our disposal extensive literature data based on the research of butterflies fauna in the territory of the Republic of North Macedonia (Rebel, 1913; Alberti 1922, Burech 1915, Burech & Iltzev 1915, Burech 1921, Doflein 1921, Buresch & Arndt 1926, Drenowski 1920, Drenowski 1921, Drenowski 1930, Rebel H. & Zerny H. 1931, Micheli 1963, Thurner 1964, Werner 1982, Scheider 1984, Scheider and Jakšić 1989, Krpač & Mihajlova 1997, Verovnik & Micevski 2008, Krpač et al. 2008, Krpač et al. 2010, Krpač and Darcemont 2011, Dinca et al. 2010, Tòth & Vaega 2010, Krpač et al. 2011, Krpač et al. 2013, Krpač et al. 2021a, Krpač 2021b, Thomas 1993, Micevski & Micevski 2003, Micevski et al. 2009a, Micevski et al. 2009b, Micevski 2013, Micevski & Micevski 2014, Beshkov 2014, Melovski & Bozhinovska 2014) and Taymans & Cuvelier 2025. We have also added here data from the available literature,

collections (SKO, Jakonov and IET) and observations from research collaborators (eg. Ch. Darcemont), as well as our own research, only for species that are less researched, rare, or with a limited distribution area in Europe and North Macedonia.
Determination, systematic order, nomenclature and ID tags are used in the search for synonyms and the presented checklist, according to Karsholt & Razowski 1996, Higgins, & Riley 1970, Jaksic 1998, Abadjiev 1992, 1993a, 1993b, Tolman & Lewington 2009, Krpač et al. 2010 and Krpač et al. 2021.

Results And Discussion

The updated list of butterfly species from the territory of the Republic of North Macedonia has so far been verified on the list of 212 species, distributed in up to 5 families. In this paper, the main emphasis is placed on species that are rare, insufficiently researched or recorded in a small number of localities in North Macedonia. The data is based on our research conducted over the last ten years, on collections (SKO; Jakonov; IET and observations by Christian Darcemont).
The family **Hesperiidae** – Skippers is represented by 28 species in North Macedonia. In this family are represented species that are rare and limited in their distribution in Europe, i.e. on the Balkan Peninsula.
From the genus *Erynnis* in Europe, ***Erynnis marloyi* (Boisduval, 1834)** is restricted to the southeast of Bulgaria, Albania, North Macedonia, Greece and Turkey. North Macedonia is the northernmost distribution limit in Europe. It is registered on following localities: Kondovo (Skopje), 5 km SW of v. Radusha, 640 m, N 42° 3'11.23" E 21°10'24.20"; Saraj (Skopje), Matka, 390 m, N 41°57'52.82" E 21°17'28.86"; Veles, 2 km S of Veles, 312 m, N 41°41'34.77" E 21°45'47.83"; Berovo, 7 km SE of v. Dvorishte, 1188 m, N 41°31'45.30" E 22°57'30.26"; Prilep, 2 km SW of v. Rekle, 423 m, N 41°26'35.16" E 21°46'2.82"; Kavadarci, near v. Drenovo, 259 m, N 41°25'26.51" E 21°53'41.67"; Valandovo, 3.5 km NE of v. Bajrambos, 903 m, N 41°19'26.75" E 22°44'39.51"; Valandovo, near v. Grchishte, 65mm, N 41°15'3.07" E 22°30'3.24"; Star Dojran, Nikolich, 156 m, N 41°14'56.51" E 22°43'27.29" and Star Dojran, 267 m N 41°11'0.21" E 22°42'37.73" (Schaider and Jakšić 1989). Road between Negotino and Štip, massif, 24.07.2011., 700 m, N 41°35'12.9" E 22°13'32.2",; North of Macedonski Brod, near cave, 09.05.2012., 545 m, N 41°32'49.5" E 21°15'04.0" (obs. Ch. Darcemont).
A somewhat wider distribution is noted for ***Muschampia proto* (Ochsenheimer, 1808)** which is found in Portugal, Spain, southern France, Italy (in the area of Monte Gargano and Calabria), Greece and in North Macedonia this species is registered in following localities: Tearce (Tetovo), Šar Planina, 3 km NW of v. Odri, 1338 m, N 42° 8'17.29" E 21° 3'5.46"; Kavadarci, near v. Drenovo, 259 m, N 41°25'26.51" E 21°53'41.67"; Vitolishte (Prilep), near v. Veprchani, 875 m, N 41°16'15.45" E 21°45'48.18"; (as. *Syrichtus proto* in Schaider and Jakšić 1989). Saraj (Skopje), Matka, monastery St. Andrea, 20.05.1975, 320 m, N 41°57'1.90" E 21°17'57.30", leg. Jakonov; Skopje, Middle Vodno, 28.05.1975., 577 m, N 41°58'31.44" E 21°24'32.38", leg. Jakonov; Skopje, Middle Vodno, 15.06.1975., 577 m, N 41°58'31.44" E 21°24'32.38", leg. Jakonov; Ohrid, Galichica, v. Trpeica, 10.06.1979., 1561 m, N 40°56'30.00" E 20°48'23.00", leg. Jakonov; Gjorče Petrov (Skopje), v. Kuchkovo, 28.06.1979., 562 m, N 42° 3'24.76" E 21°18'22.01", leg. Jakonov (coll. Jakonov SKO).
***Muschampia tessellum* (Hübner, [1803])** is limited to localities from the southern Balkan Peninsula (North Macedonia, Bulgaria, Greece and the European part of Turkey) through Ukraine, southern Russia (north to the Moscow region) and Asia Minor, southern Siberia, Mongolia, east to the Amur regionin. In North Macedonia this species is registered in following localities: Dologoždi (Struga), near v. Delogozhdi, 730 m, N 41°14'46.36" E 20°42'44.47";

Struga, near v. Misleshevo, 694 m, N 41°10’13.87” E 20°42’18.14”; Kosel (Ohrid), near v. Kosel, 753 m, N 41° 9’36.30” E 20°49’51.44”; Star Dojran, 267 m, N 41°11’0.21” E 22°42’37.73”; (Schaider and Jakšić 1989); Petrovec (Skopje), v. Breznica, 04.06.1978., 08.06.1980. and 21.05.1983., 532 m, N 41°52’14.11” E 21°43’29.81”, leg. Jakonov; (coll. Jakonov SKO).

Muschampia cribrellum **(Eversmann, 1841)** (***Favria cribrellum*** **(Eversmann, 1841)**) is one of the rarest and much localised skipper species in Europe. It is recorded from several countries in Eastern Europe: Serbia; Romania; Ukraine; Russia and more recently from Greece; In the Republic of North Macedonia this species is registered in following localities: Saraj (Skopje), Matka, 390 m, N 41°57’52.82” E 21°17’28.86”; Samokov (Makedonski Brod), 2,5 km NW of v. Belitsa, 567 m, N 41°41’28.93” E 21°16’40.00” (Schaider and Jakšić 1989), 4km W of Kozjak Lake, 1056 m, N 41°48’10.53” E 21° 7’25.23” (Verovnik and Micevski 2009); in the vicinity of the Skopje Basin in North Macedonia, Sopište (Skopje), v. Nova Breznica, 900 m, N 41°53’ E 21°16’; 4km W of v. Nova Breznica, 1000 m, N 41°53’ E 21°13’; Skopje, Vodno , 950 m, N 41°57’ E 21°23’; 28 km W of Skopje, Želino (Tetovo), v. Grupčin, 500 m, N 41°58’ E 21°07’; Struga, v. Gorna Belica, 500-1000 m, N 41°41’ E 21°15’ (Dinca et al, 2010); Suva Planina, near v. Nova Breznica, 08.06.1980., 1082 m, N 41°54’10.99” E 21°16’52.87” (coll. Jakonov).

From the genus *Carterocephalus* in Europe, ***Carterocephalus palaemon*** **(Pallas, 1771)** is one of the species with the southernmost distribution limit in Europe. In Macedonia this species is highly localized in distribution and early seasonal occurrence. The species was first recorded in North Macedonia on the Suva Planina plateau, 1082 m, N 41°54’10.99” E 21°16’52.87” (Verovnik and Micevski, 2008); then Melovski and Božinovska (2014) recorded it in the Mariovo area, v. Belčishte, 771 m, N 41°18’3.29” E 20°49’38.20”. With our field research, *C. palaemon* was observed on Šar Planina, v. Brodec, 12.06. 2019., 1040 m, N 42° 8’23.18” E 21°26’47.43”, leg. V. Krpach; Šar Planina, at the site under the village of Bozovce, 11.05.2024., 1297 m, N 42°02’01.6” E 20°48’48.3”, 1 ex, leg. V. Krpač; (coll. IET).

The Mediterranean genus *Gegenes* in Macedonia is represented by one species ***Gegenes nostrodamus*** **(Fabricius, 1793)**. In Europe (sensu Fauna Europaea), this species occurrence in Spain (mainland), Portugal (mainland), Italy (mainland and small islands near the mainland); Croatia, Montenegro, North Macedonia, Albania, Bulgaria, Greece (mainland and islands near the mainland) and European part of Türkiye. This inhabitant of dry localities in North Macedonia is found rarely (not so often). This species is registered in North Macedonia in following localities: Kavadarci, near v. Drenovo, 259 m, N 41°25’26.51” E 21°53’41.67”; Vitolishte (Prilep), near v. Veprchani, N 41°16’15.45” E 21°45’48.18”, 875 m; Kosel (Ohrid), near v. Kosel, 753 m, N 41° 9’36.30” E 20°49’51.44”; Gevgelija, near Negorski Banji, 72 m, N 41°10’25.46” E 22°29’12.89” (Schaider and Jakšić 1989). Dojransko Lake, Ačkot, 17.10.2015., 151 m, N 41°14’22.35” E 22°43’5.00”, leg. V. Krpač (coll. SKO).

The species from genus *Pelopidas*, ***Pelopidas thrax*** **(Hübner, [1821])** is known in Europe only from Greece. Recently, it has expanded its range to the northern parts of Greece near the border at Dojran (Pamperis pers. communication). We strongly hope that it is also present in North Macedonia.

The **Pieridae** family – Whites, Yellows, and Sulphursis represented by 25 species, from which some species are rare or limited in its distribution in North Macedonia.

Such are representatives of the genus *Anthocharis*, ***Anthocharis damone*** **Boisduval, 1836** is recorded in the southern parts of Europe: Sicily, Greece, Nirth Macedonia and the European part of Turkey. In North Macedonia it is recorded at the following localities: Saraj (Skopje), Matka, 390 m, N 41°57’52.82” E 21°17’28.86”; Mavrovi Anovi, 1 km N of v. Mavrovi Anovi, 512 m, N 41°51’43.07” E 21° 9’7.93”; Samokov (Makedonski Brod), 2 km E of v. Zdunje, 629 m, N 41°47’41.89” E 21°10’34.20”; Centar Župa (Debar), v. Gorno Melnichani, 1028 m, N

41°31’6.30” E 20°35’19.54”; Centar Župa (Debar), near v. Dolgash, 718 m, N 41°24’49.59” E 20°34’44.82”; Jablanica, Lukovo (Struga), near v. Lukovo, 978 m, N 41°20’22.06” E 20°35’40.02”; Lukovo (Struga), 1,5 km of v. Prisovjani, 1223 m, N 41°20’2.69” E 20°42’24.28”; Vevčani (Struga), near v. Vevchani, 866 m, N 41°14’45.71” E 20°35’42.52”; Dologoždi (Struga), near v. Delogozhdi, 730 m, N 41°14’46.36” E 20°42’44.47”; Struga, near v. Radolishta, 807 m, N 41°10’12.74” E 20°37’13.11”; NP Galicica, Preslap, 1794 m, N 40°58’10.25” E 20°49’52.04”, (Schaider and Jakšić 1989). Jablanica, v. Modrič – ribnik, 752 m, N 41°22’15.91” E 20°34’34.00” (coll. SKO); Vodno 860m , N 41°58’12.69” E 21°23’31.37”; Matka, 317 m, N 41°57’1.86” E 21°17’57.48”; Sopište (Skopje), 756 m, N 41°57’14.98” E 21°25’19.92”; v. Breznica 531 m, N 41°52’14.11” E 021°43’29.81”; Kondovo (Skopje): v. Rašče, 352 m, N 42°01’17.49” E 21°14’50.07”; Veles – Topolka 214m, N 41°41’55.36” E 21°45’18.48” and Galichica, 1965 m, N 40°58’4.16” E 20°49’54.04” (coll. Jakonov). On the localities: Gjorče Petrov (Skopje): v. Kuchkovo, 550 m, N 42° 3’24.70” E 21°18’27.63”; Galichica – Magaro, 2237 m, N 40°55’55.98” E 20°49’14.00”; Ohrid: v. Velestovo, 1523 m, N 41° 4’45.00” E 20°50’56.00”, v. Pestani, 697 m, N 41° 0’58.65” E 20°48’35.55” and v. Trpejca, 727 m, N 40°57’38.44” E 20°46’58.10” (obs. Ch. Darcemont); Brvenica (Tetovo), v. Radiovce, 460 m, N 41°54’33.25” E 20°57’41.28”; Skopsko, Kozjak, 464 m, N 41°52’41.43” E 21°11’40.09”, leg. V. Krpach (coll. IET).

***Anthocharis gruneri* Herrich-Schäffer, [1851]** is one of the few species with a very limited distribution area in the southern parts of Europe. Occurrence Hungary, Serbia, North Macedonia, Albania, Bulgaria, Greece (mainland and islands near the mainland). In North Macedonia this species is registered in following localities: Kondovo (Skopje), 5 km SW of v. Radusha, 640 m, N 42° 3’11.23” E 21°10’24.20”; Gjorče Petrov (Skopje), v. Kuchkovo, 643 m, N 42° 3’39.82” E 21°17’32.16”; Čair (Skopje), 3,5 km W of v. Radishani, 315 m, N 42° 3’15.84” E 21°24’5.72”; Saraj (Skopje), 390 m, Matka, N 41°57’52.82” E 21°17’28.86”; Sopište (Skopje), v. Gorno Sonje, 833 m, N 41°57’24.81” E 21°24’5.54”; Gazi Baba (Skopje), v. Trubarevo, 232 m, N 41°57’57.52” E 21°31’48.03”; Ilinden (Skopje), v. Miladinovci, 265 m, N 41°58’24.03” E 21°38’57.16”; Negotino Pološko (Gostivar), 3km E of v. Sanokos, 511 m, N 41°52’1.03” E 20°55’35.96”; Mavrovi Anovi, 1 km N of v. Mavrovi Anovi, 512 m, N 41°51’43.07” E 21° 9’7.93”; Petrovec (Skopje), 2,5 km of v. Katlanovo, 465 m, N 41°52’21.78” E 21°39’20.14”; Gostivar, v. Balin Dol, 549 m, N 41°47’15.60” E 20°56’6.73”; Samokov (Makedonski Brod), 2 km E of v. Zdunje, 629 m, N 41°47’41.89” E 21°10’34.20”; Zelenikovo (Skopje), 3 km S of v. Tisovica, 1269 m, N 41°47’1.58” E 21°32’7.28”; Lozovo, 1 km N of v. Lozovo, 297 m, N 41°47’31.77” E 21°53’47.76”E; Veles, 2 km S of Veles, 312 m, N 41°41’34.77”, E 21°45’47.83”; Čaška (Veles), 2 km NE of v. Vojnica, 609 m, N 41°36’28.14”, E 21°46’41.41”; Centar Župa (Debar), near v. Dolgash, 718 m, N 41°24’49.59” E 20°34’44.82”; Jablanica, Lukovo (Struga), near v. Lukovo, 978 m, N 41°20’22.06” E 20°35’40.02”; Valandovo, v. Kalkovo, 137 m, N 41°20’38.91” E 22°29’37.39”; Kukliš (Strumica), 1 km S of v. Kosturino, 422 m, N 41°20’42.39” E 22°36’32.79”; Vevčani (Struga), near v. Vevchani, 866 m, N 41°14’45.71” E 20°35’42.52”; Dologoždi (Struga), near v. Delogozhdi, 730 m, N 41°14’46.36” E 20°42’44.47”; Valandovo, near v. Grchishte, 65 m, N 41°15’3.07” E 22°30’3.24”; Star Dojran, near v. Crnichani, 182 m, N 41°14’35.76” E 22°37’56.63”; Star Dojran, Nikolich, 156 m, N 41°14’56.51” E 22°43’27.29”; Kosel (Ohrid), near v. Kosel, 753 m, N 41° 9’36.30” E 20°49’51.44”; Gevgelija, near Negorski Banji, 72 m, N 41°10’25.46” E 22°29’12.89”; Ohrid, near v. Velestovo, 1187 m, N 41° 5’8.95” E 20°49’58.00” (Schaider and Jakšić 1989). Saraj (Skopje), Matka, monastery St. Andrea, 21.04.1975., 320 m, N 41°57’1.90” E 21°17’57.30”; Saraj (Skopje), Matka, monastery St. Andrea, 12.05.1975., 320 m, N 41°57’1.90” E 21°17’57.30”; Skopje, Middle Vodno, 20.05.1975., 577 m, N 41°58’31.44” E 21°24’32.38”; Skopje, Middle Vodno, 04.05.1976., 577 m, N 41°58’31.44” E 21°24’32.38”; Saraj (Skopje), Matka, monastery St. Andrea, 08.05.1976.,

320 m, N 41°57’1.90” E 21°17’57.30”; Skopje, Middle Vodno, 20.05.1978., 577 m, N 41°58’31.44” E 21°24’32.38”; Petrovec (Skopje), v. Breznica, 04.06.1978., 532 m, N 41°52’14.11” E 21°43’29.81”; Saraj (Skopje), Matka, monastery St. Andrea, 24.03.1979., 320 m, N 41°57’1.90” E 21°17’57.30”; Saraj (Skopje), Matka, monastery St. Andrea, 10.04.1979., 320 m, N 41°57’1.90” E 21°17’57.30”; Kondovo (Skopje), v. Rashce, 11.04.1979., 353 m, N 42° 1’17.49” E 21°14’50.07”; Kondovo (Skopje), v. Rashce, 23.4.1979, 353 m, N 42° 1’17.49” E 21°14’50.07”; Kondovo (Skopje), v. Rashce, 11.06.1979, 353 m, N 42° 1’17.49” E 21°14’50.07”; Gjorče Petrov (Skopje), v. Kuchkovo, 26.05.1979., 562 m, N 42° 3’24.76” E 21°18’22.01”; Veles, 31.03.1980., 187 m, N 41°43’48.00” E 21°46’48.00”; Petrovec (Skopje), v. Breznica, 04.05.1980., 532 m, N 41°52’14.11” E 21°43’29.81”; Petrovec (Skopje), v. Breznica, 08.06.1980., 532 m, N 41°52’14.11” E 21°43’29.81”; Petrovec (Skopje), v. Breznica, 09.05.1982., 532 m, N 41°52’14.11” E 21°43’29.81”; Ohrid, Galichica, v. Trpeica, 25.04.1983., 1561 m, N 40°56’30.00” E 20°48’23.00” (coll. Jakonov SKO). Skopje: Mt. Vodno, 10.05.1941, 1052 m, N 41°57’53.39” E 21°23’34.87” leg. K. Bogoevski; Skopje: Mt. Vodno, 07.05.1946, 1052 m, N 41°57’53.39” E 21°23’34.87” leg. K. Bogoevski; Skopje: Mt. Vodno, 18.05.1946, 1052 m, N 41°57’53.39” E 21°23’34.87” leg. K. Bogoevski; Skopje: Železnička stanica Pčinja, 20.07.1951., 196 m, N 41°49’7.13” E 21°40’11.90” leg. K. Bogoevski; Mt. Vodno, 23.04.1972, 1052 m, N 41°57’53.39” E 21°23’34.87” leg. J. Čingovski; Skopje: v. Zelenikovo, 03.05.1974., 232m, N 41°52’52.15” E 21°35’22.85” leg. J. Čingovski; Skopsko, 04.05.1978., 393 m, N 42° 4’46.95” E 21°24’2.02”, leg. B. Mihajlova; Valley of the Raec River, 14.04.1982., 286 m, N 41°25’30.92” E 21°50’49.81”, leg. P. Scheider; Skopje: v. Breznica, 06.05.1982., 532 m, N 41°52’14.11 E 21°43’29.81”, leg. J. Čingovski; Skopje: Matka, 10.04.1983., 390 m, N 41°57’52.82” E 21°17’28.86” leg. P. Meškovski; Skopje: Matka, 24.04.1983., 390 m, N 41°57’52.82” E 21°17’28.86” leg. P. Meškovski; Skopje: v. Kučkovo, 02.05.1983., 563 m, N 42° 3’24.76” E 21°18’22.01” leg. P. Meškovski; Konečka Mt., 22.04.1988., 260 m, N 41°33’7.00” E 22°10’16.00” leg. V. Krpač; Skopje: v. Breznica, 06.05.1988., 532 m, N 41°52’14.11 E 21°43’29.81” leg. V. Krpač; Skopje: Matka, 08.04.1990.,390 m, N 41°57’52.82” E 21°17’28.86” leg. P. Meškovski; Skopje, damp Kozjak, 01.06.2004., 464 m, N 41°52’41.43” E 21°11’40.09” leg. V. Krpač; Mt. Jablanica: v. Modrič – fishpond, 752 m, N 41°22’15.91” E 20°34’34.00”; Skopje: v. Kučkovo, 08.04.2008., 550 m, N 42° 3’24.70” E 42° 3’24.70” leg. V. Krpač (coll. SKO). Kuckovo - village edge, 08.04.2010., 504 m, N 42°03’35.6” E 21°18’54.9”; Ohrid region, West of Magaro, 10.04.2011., 1263 m, N 40°55’11.5” E 20°47’14.6”; Ohrid region, Galicica, v. Velestovo – Ramnem, 1156 m, 11.04.2011., N 41°05’56.8” E 20°50’13.2”; Lake Ohrid, between Pestani and Trpejca, 711 m 11.04.2011., N 40°59’29.9” E 020°47’59.4” (obs. Ch. Darcemont).

The species from genus *Euchloe,* ***Euchloe penia*** **(Freyer, 1851)** has a very small and restricted range in Europe (sensu fauna Europaea): occurrence in North Macedonia, Albania, Bulgaria, Greece (mainland and islands near the mainland) and European part of Turkey. In North Macedonia this species is registered on a few following localities: Treska canyon, 25.05.1977 and 30.05.1977, 288 m, N 41°57’34.55” E 21°17’43.84” (Back, 1982); Gjorče Petrov (Skopje), v. Kuchkovo, 643 m, N 42° 3’39.82” E 21°17’32.16”; Šar Planina, Dolna Leshnitsa, 1536 m, N 41°57’30.66” E 21° 3’37.08”; Saraj (Skopje), Matka, 390 m, N 41°57’52.82” E 21°17’28.86”; Mavrovi Anovi, 1 km N of v. Mavrovi Anovi, 512 m, N 41°51’43.07” E 21° 9’7.93”; Samokov (Makedonski Brod), 2 km E of v. Zdunje, 629 m, N 41°47’41.89” E 21°10’34.20”; Kukurečani (Bitolsko), 2 km S of v. Drevenik, 1062 m, N 41°10’33.42” E 21°17’47.36” (Schaider and Jakšić 1989). Saraj (Skopje), Matka, monastery St. Andrea, 10.06.1974., 21.04.1975., 29.05.1975., 11.07.1975. 09.08.1975., 16.08.1975., 08.50.1976., 27.03.1978., 01.05.1978., 07.05.1978., 21.05.1978., 10.04.1979., 13.04.1979., 02.06.1979., N 41°57’1.90” E 21°17’57.30”, 320 m. 26.08.1979., 03.09.1979., 15.04.1980., 17.06.1980.,

24.06.1980., 320 m, N 41°57’1.90” E 21°17’57.30”; Skopje, Middle Vodno, 15.06.1975., 577 m, N 41°58’31.44” E 21°24’32.38”; Petrovec (Skopje), v. Breznica, 04.05.1980., 532 m, N 41°52’14.11” E 21°43’29.81”; Ohrid, Gorica, 17.04.1983., 720 m, N 41° 5’3.81” E 20°47’53.53” (coll. Jakonov SKO). Skopje, Matka, 24.05.1946., 320 m, N 41°57’1.90” E 21°17’57.30” leg. K. Bogoevski; Skopje, Matka, 27.04.1981., 29.05.1982., 20.05.1984. and 28.4.1986., 320 m, N 41°57’1.90” E 21°17’57.30” leg. P. Meškovski; Skopje, v. Breznica, 12.05.2004., 532 m, N 41°52’14.11 E 21°43’29.81” leg. V. Krpač; Skopje, dam Kozjak, 01.06.2004., 23.06.2007., 26.03.2008., 18.05.2008., 1000 m, leg. V. Krpač; Skopje, dam Sv. Petka, 18.05.2008., 780 m., leg. V. Krpač; Skopje, brana Kozjak-Rudina, 09.04.2009. and 10.05.2009., 1000 m, leg. V. Krpač; Skopje: brana Kozjak, 05.06.2011., 03.07.2012 and 27.06.2014., 464 m, N 41°52’41.43” E 21°11’40.09” leg. V. Krpač (coll. SKO). Mountain, west of v. Nova Breznica, 10.05.2009., 1118 m, N 41°53’11.5” E 21°13’52.7”; Pletvar, pass between Prilep and Negotino, 26.07.2011., 1080 m, N 41°53’11.5” E 21°13’52.7”; Towards Lake Kozjac, 11.05.2012., 694 m, N 41°52’40.0” E 21°12’46.7” (obs. Ch. Darcemont). Skopsko, Kozjak, 14.03.2021.,1064 m, N 41º53’17.0” E 21º13’42.9”, 2 ex., leg. V. Krpač; Skopsko, Kozjak, 12.04.2021. 1064 m, N 41º53’17.0” E 21º13’42.9”, 11 ex., leg. V. Krpač; Skopsko, Kozjak, 13.04.2025., 1094 m, N 41° 53’ 23.86” E 21° 13’ 26.61”, 4 ex., leg. V. Krpač (coll. IET). Saraj municipality, Suva Planina, Crven Hank area, 23-24.07.2019, 800-1100 m, N 41° 53’ 29.76” E 21° 13’ 26.72”, (det. & fot.: Hermann Falkenhahn).

The species from genus *Pieris*, ***Pieris krueperi*** **Staudinger, 1860** has a very small and restricted range in Europe (sensu fauna europaea); occurrence in North Macedonia, Albania, Bulgaria, Greece (mainland and islands near the mainland), and european part of Türkiye. This species has been recorded only in a few localities in North Macedonia: Saraj (Skopje), Matka, 390 m, N 41°57’52.82” E 21°17’28.86”; Sopište (Skopje), v. Gorno Sonje, 833 m, N 41°57’24.81” E 21°24’5.54”; Mavrovi Anovi, 1 km N of v. Mavrovi Anovi, 512 m, N 41°51’43.07”21° 9’7.93”E; Veles, 2 km S of Veles, 312 m, N 41°41’34.77” E 21°45’47.83”; Rostushe, near v. Rostushe, 856 m, N 41°36’42.32” E 20°35’49.98”; Čaška (Veles), v. Novo Selo, 364 m, N 41°36’30.80” E 21°39’9.87”; Berovo, 7 km SE of v. Dvorishte, 1188 m, N 41°31’45.30” E 22°57’30.26”; Lukovo (Struga), 1,5 km of v. Prisovjani, 1223 m, N 41°20’2.69” E 20°42’24.28”; Prilep, 636 m, N 41°20’18.42” E 21°31’47.64”; Prilep, 3 km S of Pletvar, 1348 m N 41°20’11.51” E 21°39’17.96” (Schaider and Jakšić 1989). Saraj (Skopje), Matka, monastery St. Andrea, 14.07.1974., 20.5.1975., 25.6.1975., 02.7.1975., 07.7.1975., 09.8.1975., 16.8.1975; 04.9.1975; 08.5.1976; 01.5.1978., 07.5.1978., 21.5.1978., 03.9.1979., 06.7.1980., 04.7.1981., and 30.9.1981., 320 m N 41°57’1.90” E 21°17’57.30”; Kavadarci, v. Raec, 04.5.1975., 286 m, N 41°25’30.92” E 21°50’49.81” (coll. Jakonov SKO). Skopje, r. Treska, 05.06.1941., 01.08.1942. and 13.08.1942., 269 m, N 41°59’44.60” E 21°19’42.53” leg. K. Tuleškov; Skopje: Katlanovo, Crn Vrv, 07.08.1942., 770 m, N 41°51’32.37” E 21°44’17.59” leg. K. Bogoevski; Skopje. r. Treska, 09.08.1942., 269 m, N 41°59’44.60” E 21°19’42.53” leg. G. Stojanov; Skopje, Matka, 18.04.1942., 320 m N 41°57’1.90” E 21°17’57.30” leg. K. Bogoevski; Skopje, Matka, 24.04.1943., 320 m N 41°57’1.90” E 21°17’57.30” leg. G. Stojanov; Skopje, Matka, 28.04.1943., 28.4.1943., 06.05.1943., 20.05.1945., 24.05.1945., 30.05.1945., 320 m N 41°57’1.90” E 21°17’57.30” leg. K. Bogoevski; Skopje, Matka, 14.07.1974., 320 m N 41°57’1.90” E 21°17’57.30” leg. S. Jakonov; Veles: Mt. Babuna, 13.04.1982., 246 m, N 41°38’11.31” E 21°44’17.48” leg. P. Schaider, 170 m; Skopje, Matka, 29.05.1982. and 20.05.1984, 320 m N 41°57’1.90” E 21°17’57.30” leg. P. Meškovski; Veles, r. Topolka, 02.05.1985., 214 m, N 41°41’55.36” E 21°45’18.48” leg. P. Meškovski; Veles, r. Topolka, 06.06.2008. and 15.06.2008 214 m, N 41°41’55.36” E 21°45’18.48” leg. V. Krpač; Veles, r. Topolka, 06.06.2008. and 15.06.2008., 214 m, N 41°41’55.36” E 21°45’18.48” M. Ivanov; leg. V. Krpač; Galičica Mt. Korita, 14.06.2008., 1366 m, N 40°58’1.87” E 20°48’52.56” .leg. V. Krpač; (coll. SKO). Northeast of Vratnitsa,

near the Kosovo border, 25.06.2012., 725 m, N 42°08’50.7” E 021°11’01.8”; Star Dojran, 2.07.2012., 270 m, N 41°11’34.2 E 22°40’38.6” (obs. Ch. Darcemont). Šar Planina, v. Jažince, 25.06.2012., 677 m, N 42^{0} 08’61.65”, E 21°07’60.77”, 1♂1♀, leg Xh. Abdija (coll. IET).

The species from genus *Colias*, ***Colias caucasica balcanica*** **Rebel, 1901** in Europe (sensu fauna Europaea) occurrence in Croatia, Bosnia and Herzegovina, Serbia, Montenegro, North Macedonia, Albania; Bulgaria, Greece (mainland and islands near the mainland). In North Macedonia, is registered on Lipkovo (Kumanovo), near v. Rankovtse, 564 m, N 42° 8’27.18” E 22° 7’37.58”; Kratovo, 1 km NE of v. Nazhilovo, 1098 m, N 42° 8’32.86” E 22°15’8.48”; 5.5 km SE of Kriva Palanka, 1545 m, N 42° 9’12.98” E 22°21’20.66”; Kriva Palanka, 8 km SE of Devebair, 1859 m, N 42° 8’42.83” E 22°29’4.05”; Korab, 1928 m, N 41°50’32.44” E 20°35’44.13”; Korab, 2110 m, N 41°46’43.06” E 20°34’55.19”; Mavrovi Anovi, near v. Belichica, 1437 m, N 41°41’25.66” E 20°41’31.93”; Mavrovi Anovi, Bistra Mt., 1,5 km E of v. Leunovo, 1298 m, N 41°41’15.73” E 20°48’44.70”; Bogomila (Veles), v. Oreshe, 790 m, N 41°37’4.80” E 21°24’53.45”; Rostushe, 6 km E of v. Vrbjani, 1626 m, N 41°25’30.72” E 20°42’55.86”; Lukovo (Struga), 1,5 km of v. Prisovjani, 1223 m, N 41°20’2.69” E 20°42’24.28”; Kosel (Ohrid), 1 km NW of v. Sirula, 1193 m, N 41°14’39.53” E 20°50’15.13”; Resen, v. Sopotsko 3,5 km E of Resen, 915 m, N 41° 4’59.39” E 21° 4’0.24”; Capari (Bitolsko), 3 km SW of Kazhani, 848 m, N 41° 4’32.81” E 21°11’11.77”; NP Pelister over Shiroka, 2487 m, N 40°59’49.15” E 21°11’5.63” (Schaider and Jakšić 1989). Mt. Pelister, Kopanki, 14.07.1956., 1625 m, N 41° 2’0.64” E 21°13’7.89” leg. K. Bogoevski; Mt. Pelister, Kopanki – Staza, 13.07.2001., 1551 m, N 41° 2’4.50” E 21°13’17.53” leg. V. Krpač; Mt. Pelister, Palisnopje, 21.07.2004., 1524 m, N 41° 1’49.15” E 21°11’33.55” leg. V. Krpač; Mavrovo, v. Ničpur, 11.08.2004., 1057 m, N 41°44’35.18” E 20°40’24.39” leg. V. Krpač; Mavrovo: between v. Bogdevo and v. Krokornica; 18.06.2010., 1412 m, N 41°44’52.38” E 20°41’45.25”, leg. V. Krpač; Mavrovo: Crn Kamen, 18.06.2010., 1232 m, N 41°41’44.69” E 20°46’18.51” leg. V. Krpač; Ohrid: v. Peštani, 19.06.2012., 697 m, N 41° 0’58.65” E 20°48’35.55” leg. V. Krpač (col. SKO). Track after Vrben, 18.06.2010., 1380 m, N 41°43’30.4” E 20°43’19.1”; Proximity to the Kosovo border, 18.06.2010., 1530 m, N 41°50’52.9” E 20°37’22.7” (obs. Ch. Darcemont). Galičica, Kazani, 20.07.2015., 1888 m, N 40°56’32” E 20°49’47”,leg. V. Krpač (coll. IET).

The species from genus *Gonepteryx*, ***Gonepteryx farinosa*** **(Zeller, 1847)** has a very small and restricted range in Europe (sensu Fauna Europaea): occurrence in Montenegro, North Macedonia, Albania, Bulgaria, Greece (mainland and islands near the mainland), questionable occurrence in the European part of Türkiye. In North Macedonia is present in Kondovo (Skopje), 5 km SW of v. Radusha, 640 m, N 42° 3’11.23” E 21°10’24.20”; Sopište (Skopje), v. Gorno Sonje, 833 m, N 41°57’24.81” E 21°24’5.54”; Veles, 1 km of v. Otovitsa, 294 m, N 41°46’54.97” E 21°45’46.38”; Veles, 2 km S of Veles, 312 m, N 41°41’34.77” E 21°45’47.83”; Rostushe, near v. Rostushe, 856 m, N 41°36’42.32” E 20°35’49.98”; Čaška (Veles), v. Novo Selo, 364 m, N 41°36’30.80” E 21°39’9.87”; Bogomila (Veles), Oraov Dol, 8 km SE of Bogomila, 597 m, N 41°31’39.92” E 21°32’3.26”; Rosoman, 4 km W of v. Rosoman, 245 m, N 41°31’24.91” E 21°53’38.52”; Negotino, near v. Krivolak, 120 m, N 41°31’36.58” E 22° 7’40.02”; Prilep, 2 km SW of v. Rekle, 423 m, N 41°26’35.16” E 21°46’2.82”; Kavadarci, near v. Drenovo, 259 m, N 41°25’26.51” E 21°53’41.67”; Jablanica, Lukovo (Struga), near v. Lukovo, 978 m, N 41°20’22.06” E 20°35’40.02”; Star Dojran, near v. Crnichani, 182 m, N 41°14’35.76” E 22°37’56.63”; Star Dojran, Nikolich, 156 m, N 41°14’56.51” E 22°43’27.29”; Kosel (Ohrid), near v. Kosel, 753 m, N 41° 9’36.30” E 20°49’51.44”; Bitola, 1,5 km NE of v. Snegovo, 992 m, N 41° 4’42.27” E 21°18’26.86”; NP Galicica, Preslap, 1974 m, N 40°58’10.25” E 20°49’52.04”; (Schaider and Jakšić 1989). Skopje, v. Taor, 27.03.1947., 239 m, N 41°54’2.25” E 21°36’38.90” leg. K. Bogoevski; Veles, v. Otovica, 30.03.1972, 259 m, N 41°46’4.51” E 21°46’10.89” leg. J. Čingovski; Konečka Planina, Orlovo Brdo, 05.04.1974.,

184 m, N 41°32’42.00” E 22° 8’4.00” leg. J. Čingovski; Kičevo, v. Cer, 07.04.1982., 1014 m, N 41°24’59.00” E 21° 4’13.94” J. Čingovski; Mt. Babuna, 13.04.1982, 246 m, N 41°38’11.31” E 21°44’17.48” leg. P. Schaider; Konečka Mt., 03.07.1987., 260 m, N 41°33’7.00” E 22°10’16.00” N. Topukova (coll. SKO). Skopje, Middle Vodno, 577 m, 15.06.1975., N 41°58’31.44” E 21°24’32.38”; Dojran, 3 km NW of Nov Dojran, 04.04.1976., 200 m, N 41°15’46.08” E 22°44’44.71”, Negotino, v. Krivolak, 17.04.1976., 138 m, N 41°31’42.31” E 22° 7’14.40”; Veles, Veleshko brdo, 04.07.1976., 423 m, N 41°42’15.23” E 21°46’35.22” (coll. Jakonov SKO).

The **Lycaenidae** family – Gossamer-Winged Butterflies (Blues, Coppers, Hairstreaks, Harvesters) is presented by 57 eprcies. From the genus *Lycaena* two species sre represented by limited distribution in North Macedonia.

***Lycaena ottomanus* (Lefèbvre, 1831)** in Europe is limited to the southeast part of Europe: Montenegro, North Macedonia, Albania, Bulgaria, Greece, and European part of Türkiye). It is also found on the southern coast of the Asian part of Turkey. In North Macedonia has been recorded at the localities: Skopje, Gjorče Petrov, near v. Kuchkovo, 643 m, N 42° 3’39.82” E 21°17’32.16”; Veles, 1 km of v. Otovitsa, 294 m, N 41°46’54.97” E 21°45’46.38”; Veles, 2 km S of Veles, 312 m, N 41°41’34.77” E 21°45’47.83” and Kozuf , Smrdliva Voda, 1521 m, N 41°11’8.71” E 22° 8’40.16” (Scheider & Jakšić 1989). Also at the localities: Mavrovo – Mountain northwest of v. Nichpur, 1057 m, N 41°44’35.18” E 20°40’24.39”; Popova Shapka (ski resort), 1713 m, N 42° 0’41.55” E 20°52’51.81”; Ljuboten, 2470 m, N 42°12’24.51” E 21° 7’8.67” and Kozuf, 1954 m, N 41° 9’1.77” E 22° 9’53.05” (obs. Ch. Darcemont). Our research confirmed the species also at the locality Staro Nagoricani 368m, N 42°12’14.5” E 21°50’20.8, Kozjak, r. Pčinja – r. Bistrica, 464 m, N41°52’41.43” E 21°11’40.09”, (coll. IET, leg. V. Krpach).

From the genus *Tarucus*, ***Tarucus balkanica* (Freyer, 1843)** in Europe (sensu fauna Europaea) occurrences in Croatia, Bosnia and Herzegovina, Serbia, Montenegro, Albania, Romania, Bulgaria, Greece (Mainland and Islands near the Mainland), European part of Türkiye and North Macedonia, It is registered on following localities: Veles, 2 km S of Veles, 312 m, N 41°41’34.77” E 21°45’47.83”; Berovo, 7 km SE of v. Dvorishte, 1188 m, N 41°31’45.30” E 22°57’30.26”; Kavadarci, near v. Drenovo, 259 m, N 41°25’26.51” E 21°53’41.67”; Valandovo, v. Kalkovo, 137 m, N 41°20’38.91” E 22°29’37.39”; Vevčani (Struga), near v. Vevchani, 866 m, N 41°14’45.71” E 20°35’42.52”; Kosel (Ohrid), near v. Kosel, 753 m, N 41° 9’36.30” E 20°49’51.44”; Ohrid, near v. Velestovo, 1187 m, N 41° 5’8.95” E 20°49’58.00” (Scheider & Jakšić 1989). Veles, r. Topolka, 06.06.2008., 214 m, N 41°41’55.36” E 21°45’18.48” leg. V. Krpač, 06.06.2008., leg. M. Ivanov, 15.06.2008, leg. V. Krpač, 15.06.2008, leg. M. Ivanov; Skopje, Kozjak, 30.06.2008., 464 m, N 41°52’41.43” E 21°11’40.09” leg. V. Krpač; Veles, r. Topolka, 02.09.2009., 214 m, N 41°41’55.36” E 21°45’18.48” leg. V. Krpač (coll. SKO). Kavadarci, v. Raec, 10.06.1975., 29.07.1975., 07.09.1975., and 04.07.1976., 286 m, N 41°25’30.92” E 21°50’49.81”; Kondovo (Skopje), v. Rashce, 27.07.1978, 353 m, N 42° 1’17.49” E 21°14’50.07” (coll. Jakonov); Lake Dojran, towards Nikolić, 03.08.2011., 165 m N 41°14’38.6” E 22°42’46.7”; Raduša road, direction Skopje, 26.06.2012., 353 m, N 42°03’37.6” E 21°15’02.2”; towards v. Besvica, 03.07.2012., 291 m, N 41°22’58.4 E 22°11’34.2”; v. Mećkuevci, 04.07.2012., 544 m, N 41°55’22.8” E 22°04’17.8”; v. Besvica, 15.08.2012., 258 m, N 41°22’56.8” E 22°11’19.3”; v. Prdejci, 09.08.2013., 68m, N 41°12’52.7”, E 22°29’55.3”, (obs. Darcemont).

From the genus *Agriades*, ***Agriades dardanus* (Freyer, [1843])** in Europe (sensu Fauna Europaea), occurrence in Russia (European part to Manych lowland); Ukraine (excluding the Crimean peninsula); Bosnia and Herzegovina, Montenegro, Bulgaria, Greece (mainland and islands near the mainland), European part of Türkiye and North Macedonia, Tsikolovets (2011), *A. dardanus* is registered on following localities: Šar Planina, Karabunar, 3.5 km of

peak Titov Vrv, 1864 m, N 41°57’59.19” E 20°48’45.04”; Čaška (Veles), 2 km NW of v. Gorno Vranovtsi, 1158 m, N 41°41’7.26” E 21°31’40.49”, (as. *Agriades pyrenaicus* Scheider and Jakšić 1989).

From the genus *Polyommatus*, ***Polyommatus aroaniensis* (Brown, 1976)** (*Agrodiaetus aroaniensis*) in Europe (sensu fauna Europaea) occurrence in Bosnia and Herzegovina, Bulgaria, Greece (mainland and islands near the mainland), and European Part Of Türkiye. In North Macedonia is registered in Mariovo, v. Polchishte, mountain stream, 14.07.2012, 1000 m, N 41° 8’47.91” E 21°49’10.74”, 3 ♂, leg. D. Melovski (coll. D. Melovski). Mariovo, river Satoka, riparian habitat, 11.07.2012, 700 m, N 41°7’39” E 21°43’25” 2♂ 1♀, leg. D. Melovski & E. Bozhinovska (coll. D. Melovski),. Melovski & Bozhinovska (2014); Mt. Plačkovica: University resort “Goce Delčev”, 30.06.2012., 1355 m, N 41°46’31.84” E 22°26’16.05” , leg. V. Krpač; Skopje, dam Kozjak, 03.7.2012., 1059 m, leg. V. Krpač (coll. SKO); Above Lake Tikves, 27.07.2013., 1126 m, N 41°20’41.5” E 21°54’28.1”; Medistina, lower west of v. Galičnik, 21.08.2010., 1735m, N 41°36’44.8” E 20°38’18.5”; Pletvar, pass between Prilep and Negotino, 26.07.2011., 1115 m, N 41°22’15.5” E 21°39’28.6”; v. Dunje, 29.05.2013., 588 m, N 41°13’04.0” E 21°41’24.6” (obs. Ch. Darcemont). Kavadarci, v. Dunje, dry meadow, open oak grove, 25.05.2013., 588 m, N 41°13’04.0” E 21°41’24.6”, 1 ex, leg. Ch. Darcemont; Galičica, Tomoros, 16.08.2022., 1676 m, N 40 9892.9˚ E 20 8798.1˚, 1 ex., leg. V. Krpač (coll. IET).

Family Nymphalidae – Brush-footed Butterflies or Four-footed Butterflies (Emperors, Admirals, Tortoiseshells and Fritillaries) ar present in North Macedonia with 95 species.

***Nymphalis vaualbum* ([Denis &Schiffermüller], 1775)** is found in Palearctic - eastern Europe, Romania, Ukraine, the south of Russia to the areas west of the Urals, the southern part of Siberia to the Himalayas and Japan. A strong migratory butterfly, recorded for the first time in North Macedonia, Šar Planina, in a beech forest clearing, at an altitude of 1500 m, (Melovski & Bozhinovska (2014). Since there no other records of this species, only a single captured specimen remains, which makes it difficult to determine whether this is a random specimen that cannot provide a correct conclusion as to whether the populations are permanent or temporary in North Macedonia. Although it is a strong migrant, it is somewhat surprising that this species is found in North Macedonia, far from its range. Future extensive research is needed to clarify the presence of the species in North Macedonia.

***Melitaea ornata* Christoph, 1893** in Europe (sensu Fauna Europaea) occurrence in Russia (European part to Manych Lowland), Slovakia, Hungary, questionable occurrence in France, Italy, Slovenia, Croatia, Serbia, Montenegro, Albania, Romania, Bulgaria, Greece and North Macedonia: middle Vardar river valley near Demir Kapiya Town, 27.04.2013., 130 m, N 41°24’4.20”, E 22°17’10.20”, 2♂ and 1♀, (Beshkov, 2014). This species is reported as a new for Macedonia very recently as. *Melitaea telona* Fruhstorfer, 1908: Mt. Suva Planina, ridge above Kozjak Lake W of Nova Breznica, 01.06.2008. and 08.06.2008., 1054 m, N 41° 53’ 19.2” E 21° 13’ 41.64”; Mt. Vodno, above v. Gorno Sonje, 01.06.2008., 677 m, N 41° 57’ 12” E 21° 23’ 52.98”; Štip, small valley E of Tursko Rudare village, ; 2.6.2008. 543 m, N 41° 58’ 53.34” E 22° 15’ 40.74”; Ohrid, lower part of the Belička River valley W of v. Dolna Belica, 06.06.2008., 737 m, 41° 12’ 22.26”; 20° 37’ 50.16”, (Verovnik, Micevski, Duric, Jaksic, Keymeulen, van Swaay & Veling, 2010), and at present has very few localities in the country. It seems that *Melitaea ornata* is widely spread in warm, arid places at low altitude in the southern Balkans. Skopje, 30.04.1975., Skopje, Matka. 12.05.1975., 390 m, N 41°57’52.82” E 21°17’28.86”; Veles, Lake Mladost, 03.05.1975., 284 m, N 41°46’39.49” E 21°46’13.37”; Prilep, Gorge Raec, 04.05.1975.; Drenovska Gorge, 08.05.1975.; Skopje, Mt. Vodno, 20.05.1975., and 20.05.1978., 860 m, N 41°58’12.69” E 21°23’31.37” Skopje, Zelenikovo, 09.05.1976., 232 m, N 41°52’52.15” E 21°35’22.85” Veles hill, 04.07.1976., 387 m, N

41°44’30.30” E 21°48’32.54” as. *Melitaea telona* (coll. Jakonov SKO). Near the Vardar, opposite bank to Gjueli, 08.05.2011., 139 m, N 41°21’17.9” E 22°25’19.3”; Road to Brest, 14.05.2011., 747 m, N 41°37’18.6” E 22°19’04.5”; north of Makedonski Brod, near cave, 09.05.2012., 545 m, N 41°32’49.5” E 21°15’04.0”; towards v. Besvica, 03.07.2012., 291 m, N 41°22’58.4 E 22°11’34.2” as. *Melitaea telona* (obs. Ch. Darcemont). All European references to *M. telona* refer to other species, mostly *M. ornata*. The reason for the small number of known localities is misidentification with the closely related *Melitaea phoebe* ([Denis & Schiffermüller], 1775).

***Apatura metis* Freyer, 1829** Europe (sensu Fauna Europaea), occurrence in Russia (European part to Manych Lowland), Ukraine, Slovakia, Hungary, Croatia, Serbia, Montenegro, Albania, Romania, Bulgaria, Greece (mainland and islands near the mainland), European part of Türkiye and North Macedonia [Kudrna et al. (2011). Although this species is showing decline in part of its European range, it is not believed to face major threats at the European level. It is almost an endangered species in the Republic of North Macedonia**.** This species is mentioned for North Macedonia ([Kudrna et al. (2011)), on locality Star Dojran, car camping neir Mrdaja, 150 m, N 41°10’19.33” E 22°44’44.75”.

***Euphydryas maturna* (Linnaeus, 1758)**

Europe (sensu Fauna Europaea), occurrence in Germany, Austria, Denmark, Sweden, Finland, Russia (European part to Manych Lowland), Ukraine (excluding the Crimean peninsula), Ukraine, Belarus, Estonia, Latvia, Lithuania, Poland, Czech Republic, Slovakia, Hungary, extinct or missing in Belgium, Extinct or lost in Luxembourg, France, Italy, Slovenia, Croatia, Bosnia and Herzegovina, Serbia, Montenegro, North Macedonia, Albania, Romania and Bulgaria. In North Macedonoa this species is rare and insufficiently researched. It is found in several localities, singly and in specific habitats: Shar Planina, Karabunar, 3,5 km of Titov Vrv, 1864 m, N 41°57’59.19” E 20°48’45.04”; Mavrovi Anovi, 1 km E of v. Brodets, 1807 m, N 41°47’1.88” E 20°42’5.40”; Rostushe, 2 km N of v. Zhirovnica, 1531 m, N 41°41’37.78” E 20°34’47.89”; Mavrovi Anovi, near v. Belichica, 1437 m, N 41°41’25.66” E 20°41’31.93”, Rostushe, near v. Rostushe, 856 m, N 41°36’42.32” E 20°35’49.98”; Centar Župa (Debar), v. Gorno Melnichani, 1028 m, N 41°31’6.30” E 20°35’19.54” (Scheider & Jakšić 1989). R. Radika, 12.07.1975., 942 m, N 41°43’56.25” E 20°40’13.24”, 2 ex., leg. Jakonov; Mavrovi Anovi, Radika r., near v. Nichpur, 12.07.1975., 942 m, N 41°43’56.25” E 20°40’13.24”, leg. Jakonov (coll. Jakonov SKO). Mavrovo: v. Ničpur, Sveta Voda, 03.07.2010., 1057 m, N 41°44’35.18” E 20°40’24.39”, 1 ex., leg. V. Krpač (coll. SKO).

***Melitaea* (*Mellicta*) *aurelia* (Nickerl, 1850)**

Europe (sensu Fauna Europaea), occurrence in Germany, Switzerland, Austria, Liechtenstein, Russia (European part to Manych Lowland), Ukraine Belarus, Estonia, Latvia, Lithuania, Poland, Czech Republic, Slovakia, Hungary, Belgium, Netherlands, Luxembourg, France, Slovenia, Croatia, Bosnia and Herzegovina, Serbia, Montenegro, Kosovo, North Macedonia, Albania, Romania, Bulgaria, Greece (mainland and islands near the mainland) and European part of Türkiye. *M. aurelia* is found in several localitiesin North Macedonia: Mt. Galićica: Asan Đura (Šarboica), 25.06.2009., 1474 m, N 41° 1’38.06” E 20°51’57.56” 1 ex., leg. V. Krpač; Mt. Baba, Pelister, Golema Livada, 02.07.2009., 1186 m, N 41° 2’40.06” E 21°12’52.77” 1 ex., leg. V. Krpač; Mt. Galičica, Preslap, 14.06.2010., 1005 m, N 41°49’28.17” E 21°28’6.55” 1 ex., leg. V. Krpač; Skopje, dam Kozjak, 03.07.2012., 1059 m, 4 ex., leg. V. Krpač (coll. SKO). Polog, v. Perśovce, 08.09.2011., 475 m, N 42°04’26.08” E 21°5’38.02”, 1♂1♀, leg. Xh. Abdija; Mavrovo, 05.05.2012., 1026 m, N 41°42’15.64” E 20°45’16.51”, 1 ex., leg. Xh. Abdija; v. Negotino, 03.06.2012., 668 m, N 41°53’11.01” E 20°05’52.03”, 4 ex., leg. Xh. Abdija; Sharr Mountains, v. Kalište, Sokolac, 28.05.2022., 1445 m, N 41°52’46” E 20°52’12”, 1ex., leg. V. Krpač; Šar Planina, Uliverica, 30.06.2023., 1732 m, N 41 99 30.8° E 20 86 45.1°, 2 ex., leg. V. Krpač; N P Mavrovo, Štirovica, Strezimir, 04.08.2023., 1381 m, N 41 80 12.0° E 20 82 70.6°,

1 ex., leg. V. Krpač (coll. IET). Galicica, Preslap Pass, meadow at the edge of a beech forest, 17.06.2010., 1600 m, N 40°57’07.5” E 20°49’47.3” (obs. Ch. Darcemont).

***Limenitis camilla* (Linnaeus, 1764)**

Europe (sensu Fauna Europaea), occurrence in Germany, Switzerland, Austria, Liechtenstein, Denmark, Sweden, Finland, Russia (European part to Manych Lowland), Ukraine Belarus, Estonia, Latvia, Lithuania, Poland, Czech Republic, Slovakia, Hungary, Great Britain, Belgium, Netherlands, Luxembourg, France, Andorra, Spain, Portugal, Slovenia, Croatia, Bosnia and Herzegovina, Serbia, Montenegro, North Macedonia, Albania, Romania, Bulgaria, Greece (mainland and islands near the mainland) and European part of Türkiye. In North Macedonia, this species is present in several localities: Several times near Ohrid, as well as Petrina Mt. (Thurner 1938: 128). Gjorče Petrov (Skopje), v. Kuchkovo, 643 m, N 42° 3’39.82” E 21°17’32.16”; Kratovo, v. Prikovci, 847 m, N 42° 3’17.18” E 22° 8’26.32”, (Scheider & Jakšić 1989). Petchevo (vallon au sud-est), 03.08.2013, 1080 m, N 41°43’52.9” E 022°57’50.6”, Beech forest edge with river; Berovo - à l’est du lac, 3.08.2013, 1050 m, N 41°40’24.3” E 022°55’21.6”, edge of beech and fir forest with river (obs. Ch. Darcemont).

***Pyronia cecilia* (Vallantin, 1894)**

In Europe (sensu Fauna Europaea), occurrence in France, Spain, Portugal, taly, Croatia, Montenegro, North Macedonia [Kudrna et al. (2011), Albania, Romania, Greece, questionable occurrence in the European part of Türkiye. Africa: Deposits in Ceuta. *P. cecilia* is a species that is listed as present in North Macedonia in Kudrna et al. (2011): Distribution Atlas of Butterflies in Europe: Centar Župa (Debar), near v. Dolgash, 718 m, N 41°24’49.59” E 20°34’44.82”. Future research is needed for reliable evidence of the presence of the species in North Macedonia.

***Erebia epiphron* (Knoch, 1783) - *Erebia epiphron rossi* Arnscheid & Sterba, 1978**

Europe (sensu Fauna Europaea) occurrence in Germany, Switzerland, Austria, Liechtenstein, Poland, Czech Republic, Slovakia, Great Britain, France, Andorra, Spain, Italy, Slovenia, Croatia, Bosnia and Herzegovina, Serbia, Montenegro, North Macedonia in Huemer, Krpač, Plössl & Tarmann (2011), Albania, Greece (mainland and islands near the mainland). In North Macedonia this species is registered om the following localities: Tetovo, Šar Planina, 5 km on NE of v. Vejtse, 2444 m, N 42° 7’30.02” E 20°55’49.13”; Tearce (Tetovo), Šar Planina, 3 km NW of v. Odri, 1338 m, N 42° 8’17.29” E 21° 3’5.46”; Šipkovica (Tetovo), Šar Planina, v. Bozovtse, 1350 m, N 42° 3’4.49” E 20°48’57.62”; Korab, 1928 m, N 41°50’32.44” E 20°35’44.13”; Šar Planina, Lukovo Pole, 1949 m, N 41°50’45.59” E 20°41’35.21”; Studeničani (Skopje), Karadjica, 2 km S of v. Aldinci, 1528 m, N 41°46’52.67” E 21°24’36.94”; Čaška (Veles), 2 km NW of v. Gorno Vranovtsi, 1158 m, N 41°41’7.26” E 21°31’40.49”; NP Pelister over Shiroka, 2487 m, N 40°59’49.15” E 21°11’5.63”; National Park Pelister, 2 km SW of v. Brajchino, 1187 m, N 40°55’2.53” E 21°11’5.83” (Scheider & Jakšić 1989). Mt. Nidze, v. Skočivir, 08.07.2001.,573 m, N 40°58’21.57” E 21°38’15.33 1 ex., leg. N. Micevski; Mt. Baba, Pelister,Virovi, 10.07.2001., 2060 m, N 40°57’7.78” E 21°12’45.88” 2 ex., leg. N. Micevski; Mt. Baba, Pelister, Antena, 14.07.2001., 2582 m, N 41° 0’8.94” E 21°11’2.27”, 1 ex., leg. N. Micevski; Mt. Baba, Pelister, Golemo Ezero, Orlovi Bari, 14.07.2001., 2060 m, N 40°57’7.78” E 21°12’45.88” 5 ex., leg. N. Micevski; Mt. Baba, Pelister, below the peak in front of the Crossroads, 14.07.2001., 2156 m, N 40°59’50.75” E 21° 9’57.78” 1 ex., leg. N. Micevski; Mt. Jakupica, Ubava, 03.07.2007, 2056 m, N 41°46’2.78” E 21°21’56.89” 1 ex., leg. V. Krpač; Mt. Jakupica, Solunska Glava, 03.07.2007, 2504 m, N 41°42’11.03” E 21°24’12.10” 2 ex., leg. V. Krpač; Šar Planina: Kobilica, Gornovica, 26.07.2007., 2492 m, N 42° 5’45.52 E 20°53’1.77”1 ex., leg. V. Krpač; Šar Planina, Titov Vrv, Karabunar 31.07.2014., 2582 m, N 42° 0’2.45” E 20°49’16.51” 2 ex., leg. V. Krpač; Mt. Jakupica: Solunska Glava, 04.08.2014., 2504 m, N 41°42’11.03” E 21°24’12.10”, 1 ex., leg. V. Krpač (coll. SKO). Šar Mountain, Karabunar, 31.07.2014., 2382 m, N 41°54’05.20” E

20°48’32.51”, 1♂1♀, leg. Xh. Abdija; Karabunar, 31.07.2014., 2490 m, N 41°59’06.0” E 20°40’05.7”, 1ex., leg V. Krpač; Gorna Lešnica, 15.07.2017., 1820 m, N 42°01’41.8” E 20°49’39.2”, 1ex.,leg. V. Krpač; under Karanikoličko Lake, 04.08.2017., 1754 m, N 42°04’32.6” E 20°40’50.6”, 5ex.,leg. V. Krpač; Šar Mountain, road to Lešnica, 27.07.2021., 2025m, N 42.02 355° E 20.86 468,2ex, leg. V. Krpač; Šar Mountain, Titov Vrv, 28.07.2021., 2490m, N 41.98 440º, E 20.80 672º, 6ex., leg. V. Krpač (coll. IET). As. *Erebia epiphron* subsp. *rossi* from the Pelister Mountains in Arnscheid, W. & V. Šterba (1978). Mt Kozuf, road to Konsko ski resort, edge of beech forest, blueberry bushes, 27.07.2011., 1645 m, N 41°12’04.6” E 022°14’00.0” (obs. Ch. Darcemont).

***Erebia triaria* (Prunner, 1798)** is a montane species distributed from the Iberian Peninsula (N Portugal, Spain, Andorra) through W and C Alps (France, Italy, S and E Switzerland, SW Austria) to the Balkans. Here, its range is extremely fragmented as it occurs very locally in Croatia, Bosnia and Herzegovina, Montenegro and Albania. In North Macedonia this species is extremely localised in onli one locality and with a very short flight period. It is registrated on Mt. Bistra, Mala Reka, 21.5.2013, near the Selce village, 1160 m, N 41° 34’ 30.86” E 20° 42’ 51.88” (Micevski, 2014).

***Proterebia phegea* (Borkhausen, 1788)** syn. *Proterebia afra* (Fabricius, 1787)

In Europe, *P. phegea* generally inhabits warm, rocky grassland slopes or vast steppe terrains with sparse vegetation on limestone substrates, ranging from sea level on the island of Pag in Croatia (Zakšek 2005; Mihoci & Šašić 2007) to much higher elevations of around 1400 m in Croatia (Koren et al. 2010). Some populations have also been recorded in Bosnia and Herzegovina (Koren & Trkov 2011.); on ophiolite terrain in northern Greece and Albania, where *P. phegea* occupies more closed habitats such as grasslands confined between forest areas. The butterfly species *P. phegea* has not previously been recorded in North Macedonia. Taymans & Cuvelier (2025) conducted field surveys of butterflies on Mount Žeden in April 2025 and discovered the presence of this species for the first time in North Macedonia.This finding extends the known range of the species in the Balkan Peninsula. In North Macedonia it has been registered at Žeden localities in summit zone above Boyanë (1000-1100 m a.s.l.). The discovery of *P. phegea* on Mount Žeden contributes to the understanding of the species' distribution and highlights the importance of this area for butterfly conservation.

***Hipparchia senthes* (Fruhstorfer, 1908) *Eumenissemele senthes* Fruhstorfer, 1908** in Europe (sensu fauna Europaea), occurrence in a fiev countries: Albania, Bulgaria, Greece (mainland and islands near the mainland) and European part of Türkiye. In North Macedonia is listed as present in Kudrna et al. (2011), In North Macedonia it has been registered at the following localities: Gazi Baba (Skopje), v. Trubarevo, 232 m, N 41°57’57.52” E 21°31’48.03”; Petrovec (Skopje), 2,5 km of v. Katlanovo, 465 m, N 41°52’21.78” E 21°39’20.14”; Veles, 1 km of v. Otovitsa, 294 m, N 41°46’54.97” E 21°45’46.38”; Veles, 2 km S of Veles, 312 m, N 41°41’34.77” E 21°45’47.83”; Čaška (Veles), v. Novo Selo, 364 m, N 41°36’30.80” E 21°39’9.87”; Berovo, 7 km SE of v. Dvorishte, 1188 m, N 41°31’45.30” E 22°57’30.26”; Prilep, 3 km S of Pletvar, 1348 m, N 41°20’11.51” E 21°39’17.96”; (Scheider and Jakšić 1989). Tetovo, v. Cerovo, 03.07.2000., 643 m, N 41°59’30.58” E 21° 8’17.48 leg. M. Ivanov; Skopje, v. Breznica, 04.07.2000., 1010 m, N 41°44’13.94” E 21°13’39.33” leg. M. Ivanov; Prilep, Pletvar, Derven Češma, 03.07.2009., 985 m, N 41°21’57.02” E 21°39’12.34” leg. M. Ivanov; Prilep, Pletvar, Derven Češma, 03.07.2009., 985 m, N 41°21’57.02” E 21°39’12.34”, leg. M. Krpač (coll. SKO). V. Ramne, 28.08.2009., 893 m, N 41°06’27.3” E 20°50’04.1”; v. Oblavce (eastern road from Kumanovo to Bulgaria), 25.06.2010., 460 m, N 42°09’24.2” E 21°55’43.6”; v. Staro Nagorichane, 02.06.2013.,368 m, N 42°12’14.5” E 21°50’20.8”; v. Drachevista, 06.06.2013., 366 m, N 41°22’07.4” E 022°12’55.2”; v. Drachevista, 06.06.2013., 440 m, N 41°22’04.9” E, 22°12’39.8”; Korita,

26.07.2013., 1520 m, N 41°48’05.4” E 21°01’01.9”; Above Lake Tikves, 27. 07.2013., 1096 m, N 41°20’40.5” E 21°54’41.4”; (obs. Ch. Darcemont).

***Hipparchia volgensis* (Mazochin-Porchnjakov, 1952)** In Europe (sensu Fauna Europaea) occurrence in Russia (European part to Manych lowland), Serbia, Montenegro, Kosovo, Albania, Romania, Bulgaria, Greece (mainland and islands near the mainland), European part of Türkiye and North Macedonia Kudrna et al. (2011). In Macedonia, this species has been registered at the following localities: Tearce (Tetovo), Šar Planina, 3 km NW of v. Odri, 1338 m, N 42° 8’17.29” E 21° 3’5.46”; Šipkovica (Tetovo), Šar Planina, 3,5 km W of v. Brodets, 810 m, N 42° 7’51.59” E 21°23’56.69”; Tetovo, Šar Planina, 3,5 km S of v. Vejtse, 1346 m, N 42° 3’4.63” E 20°55’56.73”; Kondovo (Skopje), 5 km SW of v. Radusha, 640 m, N 42° 3’11.23” E 21°10’24.20”; Saraj (Skopje), Matka, 390 m, N 41°57’52.82” E 21°17’28.86”; Sopište (Skopje), v. Gorno Sonje, 833 m, N 41°57’24.81” E 21°24’5.54”; Veles, 2 km S of Veles, 312 m, N 41°41’34.77” E 21°45’47.83”; Kavadarci, near v. Drenovo, 259 m, N 41°25’26.51” E 21°53’41.67” (Scheider and Jakšić 1989). Skopje: v. Osinčani, 22.06.2012., 647 m, N41°53’19.54” E 21°22’8.39” leg. V. Krpač; Mt. Skopska Crna Gora, v. Blace, 24.06.2012., 819 m, N 42° 9’19.95” E 21°19’56.64” . leg. V. Krpač and Skopje, brana Kozjak, 27.06.2014. 464 m, N 41°52’41.43” E 21°11’40.09”, leg. V. Krpač (coll. SKO). Korito, 26.06.2013., 1520 m, N 41°48’05.4” E 21°01’01.9”; (obs. Ch. Darcemont). Šar Planina, v. Jažince, 25.06.2012., 677 m, N 42°08’61.65” E 21°07’60.77”, 1♂1♀, leg. Xh. Abdija (coll. IET).

***Pseudochazara gayeri* (Herrich-Schaeffer, 1846)** In Europe (sensu Fauna Europaea) occurrence in North Macedonia, Albania, Greece (mainland and islands near the mainland), Asian part of Türkiye and Iran. In Macedonia this species has been registered at the following localities: Kosel (Ohrid), near v. Kosel, 753 m, N 41° 9’36.30” E 20°49’51.44”; Ohrid, near v. Velestovo, 1187 m, N 41° 5’8.95” E 20°49’58.00”; Resen, v. Evla 4 km SW of Resen, 954 m, N 41° 4’28.18” E 20°57’10.83”; Capari (Bitolsko), 3 km SW of Kazhani, 848 m, N 41° 4’32.81” E 21°11’11.77”; NP Pelister, over Shiroka, 2487 m, N 40°59’49.15” E 21°11’5.63”; (Scheider and Jakšić 1989). pl.Galičica: Tomoros, 29.08.2009., 1657 m, N 40°59’26.00” E 20°52’36.00” leg. V. Krpač; pl. Galičica, Krstec, 29.8.2009., 1523 m, N 41° 4’45.00” E 20°50’56.00” leg. V. Krpač (coll. SKO). Galičica mt., Tomoros, 15.08.1976., 1659 m, N 40°59’26.00” E 20°52’36.00”; Petrovec (Skopje), v. Breznica, 10.07.1982., 532 m, N 41°52’14.11” E 21°43’29.81”; Ohrid, Galičica, v. Trpeica, 20.07.1982, 1561 m, N 40°56’30.00” E 20°48’23.00” (coll. Jakonov SKO). Galičica, Lipana livada, Pass between Ohrid and Prespa, 27.07. 2007., 1595 m, N 40°57’18.7” E 20°49’04.2”; Galičica, Lipana livada, Pass between Ohrid and Prespa, 01.08.2007., 1595 m, N 40°57’18.7” E 20°49’04.2”; Galičica, Suvo Pole, Ski station, 01.08.2007., 1489 m, N 40°59’13.8” E 20°52’04.7”; Galičica, Middle Peak, Gjafa, 29.08.2009., 1560 m, N 41°04’17.4” E 20°51’13.3”; Galičica, pic Tomoros, 29.08.2009., 1670 m, N 40°59’22.3” E 20°52’47.6”; Galičica, Lipana livada, Pass between Ohrid and Prespa, 31.08. 2009., 1596 m, N 40°57’21.8” E 20°49’09.5”; Galičica, above the pass, towards Lako Signoj, 31.08.2009., 1680 m, N 40°57’33.3” E 20°49’18.9”; Galičica, towards the top of Lako Signoj, 31.08.2009., 1814 m, N 40°57’48.2” E 20°49’39.2”; Galičica, the top of Lako Signoj, 31.08.2009., 1980 m, N 40°58’04.7” E 20°49’51.9”; Galičica, Samantska Cave, 19.08.2010., 1430 m, 41°01’35.1” E 20°50’41.7”; Galičica, 23.08.2010., 1600 m, N 40°57’20.6” E 20°49’06.1” (obs. Ch. Darcemont).

***Pseudochazara cingovskii* Gross, 1973** in Europe (sensu fauna Europaea) occurrence in North Macedonia: Prilep, 3 km S of Pletvar, 21.07.1979. and 10.7.1980., 977 m, N 41°22’9.42” E 21°38’58.84”; (Scheider and Jakšić 1989); surroundings of Prilep, approx. 1100 m. 26.7.1971, leg. P. Gros (paratype) (coll. SKO). Pletvar Pass region, 1030-1240 m, approx. N 41.37523 E 21.64252, 11.07.2019; Prilep, Pletvar, 21.07.1979. and 10.07.1980. 972 m, N 41°22’8.86” E 21°38’56.53” (coll. Jakonov SKO). Pletvar, pass between Prilep and Negotino, 25.07.2011.,

1050 m, N 41°22’07.7” E 21°39’21.2”; Pletvar, pass between Prilep and Negotino, 26.07.2011., 1080 m, N 41°22’12.0” E 21°39’23.5”; Pletvar, pass between Prilep and Negotino, 26.07.2011., 1115 m, N 41°22’15.5” E 21°39’28.6”; above Lake Tikves, 27.07.2011., 1126 m, N 41°20’41.5” E 21°54’28.1” (obs. Ch. Darcemont). Prilep, Pletvar, 26.07.2011., 972 m, N 41°22’8.86” E 21°38’56.53” 2ex., leg. Ch. Darcemont; Prilep, Pletvar, 15.07.2023., 1050 m, N 41 37 16.3° E 21 65 19.5°, 2 ex., leg. V. Krpač; (coll. IET).

Updated Check List of Butterflies (Lepidoptera: Hesperioidea and Papilionoidea) in North Macedonia

ID number	Serial number	LATIN NAME OF SPECIES
		Order **LEPIDOPTERA**
6875		Superfamily **HESPERIOIDEA**
6876		Family **HESPERIIDAE** Latreille, 1809 **(**Willy De Prins & Finn Iversen)
6877		Subfamily **PYRGINAE** Burmeister, 1878
6878		Genus *Erynnis* Schrank, 1801
6879	1.	*Erynnis tages* (Linnaeus, 1758)
6880	2.	*Erynnis marloyi* (Boisduval, 1834)
6881		Genus *Carcharodus* Hübner, 1819
6882	3.	*Carcharodus alceae* (Esper, 1780)
6884	4.	*Carcharodus lavatherae* (Esper, 1783)
6885	5.	*Carcharodus flocciferus* (Zeller, 1847)
6886	6.	*Carcharodus orientalis* Reverdin, 1913
6889		Genus *Spialia* Swinhoe, 1912
6890	7.	*Spialia phlomidis* (Herrich-Schäffer, 1845)
6892	8.	*Spialia orbifer* (Hübner, 1823)
6894		Genus *Muchampia* Tutt, 1906
6895	9.	*Muchampia proto* (Ochsenheimer, 1808)
6896	10.	*Muchampia tessellum* (Hübner, 1803)
6897	11.	*Muchampia cribrellum* (Eversmann, 1841)
6898		Genus *Pyrgus* Hübner, 1819
6899	12.	*Pyrgus carthami* (Hübner, 1813)
6900	13.	*Pyrgus sidae* (Esper, 1784)
6901	14.	*Pyrgus andromedae* (Wallengren, 1853)
6904	15.	*Pyrgus malvae* (Linnaeus, 1758)
6906	16.	*Pyrgus serratulae* (Rambur, 1839)
6910	17.	*Pyrgus cinareae* (Rambur, 1839)
6911	18.	*Pyrgus armoricanus (*Oberthür, 1910)
6912	19.	*Pyrgus alveus* (Hübner, 1803)
5915		Subfamily **HETEROPTERINAE** Aurivillius, 1925
6918		Genus *Carterocephalus* Lederer, 1852
6919	20.	*Carterocephalus palaemon* (Pallas, 1771)
6921		Subfamily **HESPERIINAE** Latreille, 1809
6922		Genus *Thymelicus* Hübner, 1819
6923	21.	*Thymelicus lineola* (Ochsenheimer, 1808)
6924	22.	*Thymelicus sylvestris* (Poda, 1761)
6925	23.	*Thymelicus acteon* (Rottemburg, 1775)

6927		Genus *Hesperia* Fabricius, 1793
6928	24.	*Hesperia comma* (Linnaeus, 1758)
6929		Genus *Ochlodes* Scudder, 1872
6930	25.	*Ochlodes venata* (Bremer & Grey, 1853)
6931		Genus *Gegenes* Hübner, 1819
6932	26.	*Gegenes pumilio* (Hoffmannsegg, 1804)
6933	27.	*Gegenes nostradamus* (Fabricius, 1793)
6936		Genus *Pelopidas* Walker, 1870
6937	28.	*Pelopidas thrax* (Hübner, 1821)
6938		Superfamily **PAPILIONOIDEA** (Willy De Prins & Finn Iversen)
6939		Family **PAPILIONIDAE** Latreille,1802
6940		Subfamily **PARNASSIINAE** Duponchel, 1835
6941		Tribe Luehdorfini Chapman, 1895
6942		Genus *Zerynthia* Ochsenheimer, 1816
6945	29.	*Zerynthia polyxena* (Denis & Schiffermüller, 1775)
6946		Genus *Allancastria* Bryk, 1934
6947	30.	*Allancastria cerisyi* (Godart, 1824)
6939		Tribe Parnassiini Duponchel, 1835
6952		Genus *Parnassius* Latreille,1804
6953	31.	*Parnassius mnemosyne* (Linnaeus, 1758)
6955	32.	*Parnassius apollo* (Linnaeus, 1758)
6957		Genus *Iphiclides* Hübner, 1819
6958	33.	*Iphiclides podalirius* (Linnaeus, 1758)
6959		Genus *Papilio* Linnaeus, 1758
6960	34.	*Papilio machaon* Linnaeus, 1758
6962	35.	*Papilio alexanor* Esper, 1800
6963		Family **PIERIDAE** Swainson, 1820 (Willy De Prins & Finn Iversen)
6964		Subfamily **DISMORPHIINAE** Schatz, 1887
6965		Genus *Leptidea* Billberg, 1820
6966	36.	*Leptidea sinapis* (Linnaeus, 1758)
6968	37.	*Leptidea duponcheli* (Staudinger, 1871)
6970		Subfamily **PIERINAE** Swainson, 1820
6971		Tribe Anthocarini Scudder, 1889
6972		Genus *Anthocharis* Boisduval, Rambur, Duméril & Graslin, 1833
6973	38.	*Anthocharis cardamines* (Linnaeus, 1758)
6975	39.	*Anthocharis damone* Boisduval, 1836
6976	40.	*Anthocharis gruneri* Herrich-Schäffer, 1851
6980		Genus *Euchloe* Hübner, 1819
6985	41.	*Euchloe ausonia* (Hübner, 1804)
6990	42.	*Euchloe penia* (Frayer, 1852) *Elphinstonia penia* (Frayer, 1852)
6991		Tribe Pierini Swainson, 1820
6992		Genus *Aporia* Hübner, 1819
6993	43.	*Aporia crataegi* (Linnaeus, 1758)
6994		Genus *Pieris* Schrank, 1801
6995	44.	*Pieris brassicae* (Linnaeus, 1758)

6996	45.	*Pieris krueperi* Staudinger, 1860
6997	46.	*Pieris mannii* (Mayer, 1851)
6998	47.	*Pieris rapae* (Linnaeus, 1758)
6999	48.	*Pieris ergane* (Geyer, 1828)
7000	49.	*Pieris napi* (Linnaeus, 1758)
7002	50.	*Pieris balcana* Lorković, 1970
7003		Genus *Pontia* Fabricius, 1807
7005	51.	*Pontia edusa* Fabricius, 1777 (sub. *Pontia daplidice* (Linnaeus, 1758))
7006	52.	*Pontia chloridice* (Hübner, 1813)
7009		Subfamily **COLIADINAE** Swainson, 1827
7010		Genus *Colias* Fabricius, 1807
7014	53.	*Colias erate* (Esper, 1805)
7015	54.	*Colias croceus* (Foureroy, 1785)
7020	55.	*Colias caucasica* Staudinger, 1871 *balcanica* Rebel, 1903
7021	56.	*Colias hyale* (Linnaeus, 1758)
7022	57.	*Colias alfacariensis* Ribbe, 1905
7023		Genus *Gonepteryx* Leach, 1815
7024	58.	*Gonepteryx rhamni* (Linnaeus, 1758)
7025	59.	*Gonepteryx farinosa* (Zeller, 1847)
7026	60.	*Gonepteryx cleopatra* (Linneaus, 1767)
7027		Family **LYCAENIDAE** Leach, 1815 (Willy De Prins & Finn Iversen)
7028		Subfamily **RIODININAE** Grote, 1895
7029		Genus *Hamearis* Hübner, 1819
7030	61.	*Hamearis lucina* (Linnaeus, 1758)
7031		Subfamily **LYCENINAE** Leach, 1815
7032		Tribe Lycenini William Elford Leach, 1815
7033		Genus *Lycaena* Fabricius, 1807
7034	62.	*Lycaena phlaeas* (Linnaeus, 1761)
7036	63.	*Lycaena dispar* (Haworth, 1802)
7037	64.	*Lycaena virgaureae* (Linnaeus, 1758)
7038	65.	*Lycaena ottomanus* (Lefebvre, 1830)
7039	66.	*Lycaena tityrus* (Poda, 1761)
7040	67.	*Lycaena alciphron* (Rottemburg, 1775)
7042	68.	*Lycaena candens* (Herrich-Schäffer, 1844)
7043	69.	*Lycaena thersamon* (Esper, 1784)
7045		Tribe Theclini Swainson, 1830
7046		Genus *Thecla* Fabricius, 1807
7047	70.	*Thecla betulae* (Linnaeus, 1758)
7048		Genus *Neozepyirus* Sabatani & Ito, 1942
7049	71.	*Neozepyirus quercus* (Linnaeus, 1758)
7057		Genus *Callophrys* Billberg, 1820
7058	72.	*Callophrys rubi* (Linnaeus, 1758)
7061		Genus *Satyrium* Scudder, 1876
7062	73.	*Satyrium w-album* (Knoch, 1782)
7063	74.	*Satyrium pruni* (Linnaeus, 1758)

7064	75.	*Satyrium spini* (Denis & Schiffermüller, 1775)
7065	76.	*Satyrium ilicis* (Esper, 1779)
7067	77.	*Satyrium acaciae* (Fabricius, 1787)
7071		Tribe Polyommatini Swainson, 1827
7072		Genus *Lampides* Hübner, 1819
7073	78.	*Lampides boeticus* (Linnaeus, 1767)
7076		Genus *Leptotes* Scudder, 1867
7077	79.	*Leptotes pirithous* (Linnaeus, 1767)
7080		Genus *Tarucus* Moore, 1881
7082	80.	*Tarucus balkanica* (Freyer, 1844)
7086		Genus *Cupido* Schrank, 1801 s.str.
7088	81.	*Cupido minimus* (Fuessly, 1775)
7089	82.	*Cupido osiris* (Meigen, 1829)
7092		Genus *Everes* Hübner, 1819
7093	83.	*Everes argiades* (Pallas, 1771)
7094	84.	*Everes decolorata* (Staudinger, 1886)
7095	85.	*Everes alcetas* (Hoffmannsegg, 1804)
7096		Genus *Celastrina* Tutt, 1907
7097	86.	*Celastrina argiolus* (Linnaeus, 1758)
7098		Genus *Pseudophilotes* Beuret, 1958
7100	87.	*Pseudophilotes schiffermuelleri* (Hemming, 1929) (*Pseudophilotes vicrama schiffermuelleri* Hemming, 1929)
7103	88.	*Pseudophilotes bavius* (Eversmann, 1832)
7104		Genus *Scolitantides* Hübner, 1819
7105	89.	*Scolitantides orion* (Pallas, 1771)
7106		Genus *Glaucopsyche* Scudder, 1872
7107	90.	*Glaucopsyche alexis* (Poda, 1761)
7109		Genus *Iolana* Baker, 1914
7110	91.	*Iolana iolas* (Ochsenheimer, 1816)
7111		Genus *Maculinea* Eecke, 1915
7112	92.	*Maculinea arion* (Linnaeus, 1758)
7115	93.	*Maculinea alcon* (Denis & Schiffermuller, 1775) (*Maculinea rebeli* Hirschke, 1904)
7122		Genus *Plebejides* Sauter, 1968
7123	94.	*Plebejides pylaon* (Fischer v. Waldheim, 1832)
7126		Genus *Plebejus* Kluk, 1870 s. Str.
7127	95.	*Plebeijus argus* (Linnaeus, 1758)
7128	96.	*Plebejus idas* (Linnaeus, 1761)
7129	97.	*Plebejus argyrognomon* (Bergsträsser, 1779)
7130		Genus *Vacciniina* Tutt, 1909
7131	98.	*Vacciniina optilete* (Knoch, 1781)
7137		Genus *Agriades* Hübner, 1819
7138	99.	*Agriades dardanus* (Freyer, [1843])
7142		Genus *Aricia* Reichenbach, 1817
7143	100.	*Aricia eumedon* (Esper, [1780])
7145	101.	*Aricia agestis* (Denis & Schiffermüller, 1775)
7146	102.	*Aricia artaxerxes* (Fabricius, 1793)
7148	103.	*Aricia anteros* (Freyer, 1838)

7151		Genus *Cyaniris* Dalman, 1816
7152	104.	*Cyaniris semiargus* (Rottemburg, 1775)
7155		Genus *Polyommatus* Latreille, 1804 s. str.
7156	105.	*Polyommatus escheri* (Hübner, 1823)
7157	106.	*Polyommatus dorylas* (Denis & Schiffermüller, 1775)
7160	107.	*Polyommatus amandus* (Schneider, 1792)
7162	108.	*Polyommatus thersites* (Cantener, 1835)
7163	109.	*Polyommatus icarus* (Rottemburg, 1775)
7167	110.	*Polyommatus eros* (Ochsenheimer, 1808)
7182	111.	*Polyommatus ripartii* (Freyer, 1830) (*Agrodiaetus ripartii* (Freyer, 1830)
7185	112.	*Polyommatus aroaniensis* (Brown, 1976) (*Agrodiaetus aroaniensis* (Brown, 1976)
7193	113.	*Polyommatus damon* (Denis & Schiffermüller, 1775) (*Agrodiaetus damon* (Denis & Schiffermüller, 1775)
7179	114.	*Polyommatus admetus* (Esper, [1783]) *Agrodiaetus admetus* (Esper, 1783)
7170		Genus *Meleageria* Sagarra, 1925
7171	115.	*Meleageria daphnis* (Denis & Schiffermüller, 1775)
7172	116,	*Meleageria bellargus* (Rottemburg, 1775)
7173	117.	*Meleageria coridon* (Poda, 1761)
7196		Family **NYMPHALIDAE** Rafinesque, 1815 (Willy De Prins & Finn Iversen)
7197		Subfamily **LIBYTHEINAE** Boisduval, 1833
7198		Genus *Libythea* Fabricius, 1807
7199	118.	*Libythea celtis* (Laicharting, 1782)
		Subfamily **HELICONIINAE** Swainson, 1822
7201		Genus *Argynnis* Fabricius, 1807
7202	119.	*Argynnis paphia* (Linnaeus, 1758)
7203	120.	*Argynnis pandora* (Denis & Schiffermüller, 1775)
7204	121.	*Argynnis aglaja* (Linnaeus, 1758)
7205	122.	*Argynnis adippe* (Denis & Schiffermüller, 1775)
7206	123.	*Argynnis niobe* (Linnaeus, 1758)
7209		Genus *Issoria* Hübner, 1819
7210	124.	*Issoria lathonia* (Linnaeus, 1758)
7212		Genus *Brenthis* Hübner, 1819
7213	125.	*Brenthis ino* (Rottemburg, 1775)
7214	126.	*Brenthis daphne* (Denis & Schiffermüller, 1775)
7215	127.	*Brenthis hecate* (Denis & Schiffermüller, 1775)
7219		Genus *Clossiana*, Reuss, 1920
7220	128.	*Clossiana euphrosyne* (Linnaeus, 1758)
7228	129.	*Clossiana dia* (Linnaeus, 1767)
7216		Genus *Boloria* Moore, 1900
7235	130.	*Boloria pales* (Denis & Schiffermüller, 1775)
7238	131.	*Boloria graeca* (Staudinger, 1870)
7200		Subfamily **NYMPHALINAE** Swainson, 1827
		Tribe Nymphalini Rafinesque, 1815

7242		Genus *Vanessa* Fabricius, 1807
7243	132.	*Vanessa atalanta* (Linnaeus, 1758)
7245	133.	*Vanessa cardui* (Linnaeus, 1758)
7247		Genus *Inachis* Hübner, 1819
7248	134.	*Inachis io* (Linnaeus, 1758)
7249		Genus *Aglais* Dalman, 1816
7250	135.	*Aglais urticae* (Linnaeus, 1758)
7251		Genus *Polygonia* Hübner, 1819
7252	136.	*Polygonia c-album* (Linnaeus, 1758)
7253	137.	*Polygonia egea* (Cramer, 1775)
7254		Genus *Araschnia* Hübner, 1819
7255	138.	*Araschnia levana* (Linnaeus, 1758)
7256		Genus *Nymphalis* Kluk, 1780
7257	139.	*Nymphalis antiopa* (Linnaeus, 1758)
7258	140.	*Nymphalis polychloros* (Linnaeus, l758)
7259	141.	*Nymphalis xanthomelas* (Esper, 1781)
7260	142.	*Nymphalis vaualbum* ([Denis & Schiffermüller], 1775)
7261		Tribe Melitaeini Newman, 1870
7262		Genus *Euphydryas* Scudder, 1872
7266	143.	*Euphydryas maturna* (Linnaeus, l758)
7268	144.	*Euphydryas aurinia* (Rottemburg, 1775)
7269		Genus *Melitaea* Fabricius, 1807
7270	145.	*Melitaea cinxia* (Linnaeus, 1758)
7271	146.	*Melitaea phoebe* (Denis & Schiffermüller, 1775)
7273	147.	*Melitaea arduinna* (Esper, 1783)
7274	148.	*Melitaea trivia* (Denis & Schiffermüller, 1775)
7275	149.	*Melitaea didyma* (Esper, 1778)
7276	150.	*Melitaea diamina* (Lang, 1789)
7280	151.	*Melitaea* (*Mellicta*) *aurelia* (Nickerl, 1850)
7283	152.	*Melitaea athalia* (Rottemburg, 1775)
	153.	*Melitaea ornata* Christoph, 1893
7285		Genus *Limenitis* Fabricius, 1807
7286	154.	*Limenitis populi* (Linnaeus, 1758)
7287	155.	*Limenitis camilla* (Linnaeus, 1764)
7288	156.	*Limenitis reducta* Staudinger, 1901
7289		Genus *Neptis* Fabricius, 1807
7290	157.	*Neptis sappho* (Pallas, 1771)
7291	158.	*Neptis rivularis* (Scopoli, 1763)
7295		Subfamily **APATURINAE** Boisduval, 1840
7296		Genus *Apatura* Fabricius, 1807
7297	159.	*Apatura metis* Freyer, 1829
7298	160.	*Apatura ilia* (Denis & Schiffermüller, 1775)
7299	161.	*Apatura iris* (Linnaeus, 1758)
7300		Subfamily **SATURINAE** Boisduval, 1833
7301		Tribe Elymniini Herrich-Schäffer, 1864
7302		Genus *Kirinia* Moore, 1893
7303	162.	*Kirinia roxelana* (Cramer, 1777)
7304		Genus *Esperarge* Nekrutenko, 1988

7305	163.	*Esperarge climene* (Esper, 1783)
7306		Genus *Pararge* Hübner, 1819
7307	164.	*Pararge aegeria* (Linnaeus, 1758)
7308		Genus *Lasiommata* Westwood, 1841
7309	165.	*Lasiommata megera* (Linnaeus, 1767)
7311	166.	*Lasiommata petropolitana* (Fabricius, 1787)
7312	167.	*Lasiommata maera* (Linnaeus, 1758
7319		Tribe Coenonymphini Tutt, 1896
7320		Genus *Coenonympha* Hübner, 1819
7324	168.	*Coenonympha rhodopensis* Elwes, 1900
7325	169.	*Coenonympha arcania* (Linnaeus, 1761)
7326	170.	*Coenonympha glycerion* (Borkhausen, 1788)
7333	171.	*Coenonympha leander* (Esper, 1784)
7334	172.	*Coenonympha pamphilus* (Linnaeus, 1758)
7339		Genus *Pyronia* Hübner, 1819
7340	173.	*Pyronia tithonus* (Linnaeus, 1767)
7341	174.	*Pyronia cecilia* (Vallantin, 1894)
7343		Genus *Aphantopus* Wellengren, 1753
7344	175.	*Aphantopus hyperantus* (Linnaeus, 1758)
7345		Genus *Maniola* Schrank, 1801
7350	176.	*Maniola jurtina* (Linnaeus, 1758)
7352		Genus *Hyponephele* Muschamp, 1915
7353	177.	*Hyponephele lycaon* (Rottemburg 1775)
7354	178.	*Hyponephele lupinus* (O. Costa, 1836)
7356		Tribe Erebini Leach, [1815]
7357		*Proterebia* Ross & Arnscheid, 1980
7358	179.	*Proterebia phegea* (Borkhausen, 1788) syn. *Proterebia afra* (Fabricius, 1787)
7359		Genus *Erebia* Dalman, 1816
7360	180.	*Erebia ligea* (Linnaeus, 1758)
7361	181.	*Erebia euryale* (Esper, 1805)
7366	182.	*Erebia epiphron* (Knoch, 1783) *Erebia epiphron rossi* Arnscheid & Sterba, 1978
7372	183.	*Erebia aethiops* (Esper, 1777)
7373	184.	*Erebia triaria* (Prunner, 1798)
7379	185.	*Erebia medusa* (Denis & Schiffermüller, 1775)
7382	186.	*Erebia alberganus* (de Prunner, 1798)
7384	187.	*Erebia gorge* (Hübner, 1804)
7385	188.	*Erebia rhodopensis* Nicholl, 1900
7390	189.	*Erebia ottomana* Herrich-Schäffer, 1847
7394	190.	*Erebia cassioides* (Reiner & Hochenwarth, 1792)
7396	191.	*Erebia pronoe* (Esper, 1780)
7404	192.	*Erebia melas* (Herbst, 1796)
7405	193.	*Erebia oeme* (Hübner, 1804)
7410	194.	*Erebia pandrose* (Borkhausen, 1788)
7412		Tribe Melanargiini Wheeler, 1903
7413		Genus *Melanargia* Meigen, 1828
7414	195.	*Melanargia russiae* (Esper, 1784)

7415	196.	*Melanargia galathea* (Linnaeus, 1758)
7417	197.	*Melanargia larissa* (Geyer, 1828)
7422		Tribe Satyrini Boisduval, 1833
7423		Genus *Satyrus* Latreille, 1810
7424	198.	*Satyrus ferula* (Fabricius, 1793)
7426		Genus *Minois* Hübner, 1819
7427	199.	*Minois dryas* (Scopoli, 1763)
7428		Genus *Hipparchia* Fabricius, 1807
7429	200.	*Hipparchia fagi* (Scopoli, 1763)
7431	201.	*Hipparchia syriaca* (Staudinger, 1871)
7436	202.	*Hipparchia* senthes (Fruhstorfer, 1908) *Eumenis semele senthes* Fruhstorfer, 1908
7438	203.	*Hipparchia volgensis* (Mazochin-Porchnjakov, 1952)
7441	204.	*Hipparchia statilinus* (Hufnagel, 1766)
7442	205.	*Hipparchia fatua* (Freyer, 1844)
7444		Genus *Arethusana* Lesse, 1951
7445	206.	*Arethusana arethusa* (Denis & Schiffermüller, 1775)
7446		Genus *Brintesia* Fruhstorfer, 1911
7447	207.	*Brintesia circe* (Fabricius, 1775)
7448		Genus *Chazara* Moore, 1893
7449	208.	*Chazara briseis* (Linnaeus, 1764)
7452		Genus *Pseudochazara* Lesse, 1951
7453	209.	*Pseudochazara gayeri* (Herrich-Schaeffer, 1846) 90
7454	210.	*Pseudochazara graeca* (Staudinger, 1870)
7460	211.	*Pseudochazara cingovskii* Gross,1973
7461	212.	*Pseudochazara anthelea* (Hübner, 1824)

Conclusion

A revised checklist of Lepidoptera: Hesperioidea and Papilionoidea in North Macedonia for 2025 are now presented. Changes in this Checklist compared to the last version of the checklist (Krpach et all., 2008), 7 species more have been added for the territory of the Republic of North Macedonia, so far is checked the list of 212 species, arranged in to 85 genera, 14 tribusis, 14 subfamilies and 5 families. The family Hesperiidae – Skippers is represented by 28 species; family Papilionidae – Swallowtail butterflies by 7 species and family Pieridae – Whites, Yellows, and Sulphurs by 25 species; family Lycaenidae – Gossamer-Winged Butterflies (Blues, Coppers, Hairstreaks, Harvesters) is presented by 57; family Nymphalidae – Brush-footed Butterflies or Four-footed Butterflies (Emperors, Admirals, Tortoiseshells and Fritillaries) by 95 species. This is followed by a comparison with the butterflies from the faunas of other countries in the region. Of the 496 butterfly species on the European checklist, 212 have been identified in North Macedonia, representing 42.74% of the European fauna.

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