

INFORMATION ON THE MACROLEPIDOPTERA FAUNA OF “DUMBRAVA SIBIULUI” OAK FOREST (SIBIU, ROMANIA)

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Abstract. In order to establish systematic, ecological and ethological studies, it is extremely important to know the composition of faunal species of Lepidoptera collected in the past and present from "Dumbrava Sibiului" Forest located on the outskirts of Sibiu in central Romania. To assess the current state of Lepidoptera species, we conducted a complex research which was carried out for over 13 years, based on our own samples collected: from March to November, but also on the data resulted from studying the species existing in the collections of the Natural History Museum of Sibiu. After the research we have identified a number of 243 species belonging to 14 families collected over time from "Dumbrava Sibiului" Forest.

Keywords: Macrolepidoptera, Heterocera, Forest "Dumbrava Sibiului", faunistics, ecology, zoogeography.

INTRODUCTION

The Inventory of the Macrolepidoptera species from “Dumbrava Sibiului” Forest began 144 years ago with the oldest specimen captured on July 22, 1871, the *Leptidea sinapis sinapis* species, Linnaeus, 1758 (Pieridae Family) which can be found in Dr. Daniel Czekelius’s Lepidoptera Collection in Transylvania [7, 8, 17] part of the heritage of the Natural History Museum from Sibiu [30, 31, 58]. Over the years, Macrolepidoptera species from “Dumbrava Sibiului” Forest have been collected by other Saxon naturalists from Sibiu such as: Eugen Worell [19], Viktor Weindel [20, 33], Heinrich von Hann Hannenheim, Rolf Weyrauch, W. Weber, their collections have been studied, and the species collected from the forest, along with the personal ones, are found in this article [26, 27, 55, 56].

The continuation of the research complements the data existing from the last century; this paper contains the updated systematic list [29] of all Macrolepidoptera species collected from the forest area from 1871 to 2014.

“Dumbrava Sibiului” Forest is found in Sibiu, the Sibiu Depression, being located in the south-west of the city (Fig. 1). It has a surface of 978 ha and lies

from the outskirts of Sibiu towards Rășinari and Poplaca and it is surrounded by pastures, meadows and arable land.

The oak forests within “Dumbrava Sibiului” Forest consist of *Quercus robur* and *Carpinus betulus*, as the dominant species, and other species mixture such as: *Cerasus avium*, *Acer campestre*, *Fraxinus excelsior*, *Populus tremula*, *Ulmus minor*, *Tilia platyphyllos* [32].

Dumbrava Sibiu Forest is characterized by a moderate continental climate, with specific forest climate, the annual average temperature being of 9.4°C [34, 35].

MATERIALS AND METHODS

The samplings and the eco-faunistic research from “Dumbrava Sibiului” Forest were conducted between 2001 and 2014 [6, 15, 16, 18-23, 36-54] by the author, annually in the period from March to November, and some of the data come from the collections of the above-mentioned species collected between 1871 and 1961, some of which were found again and some were no longer reported. There is a long period of time during which there weren’t performed any samplings in the forest.

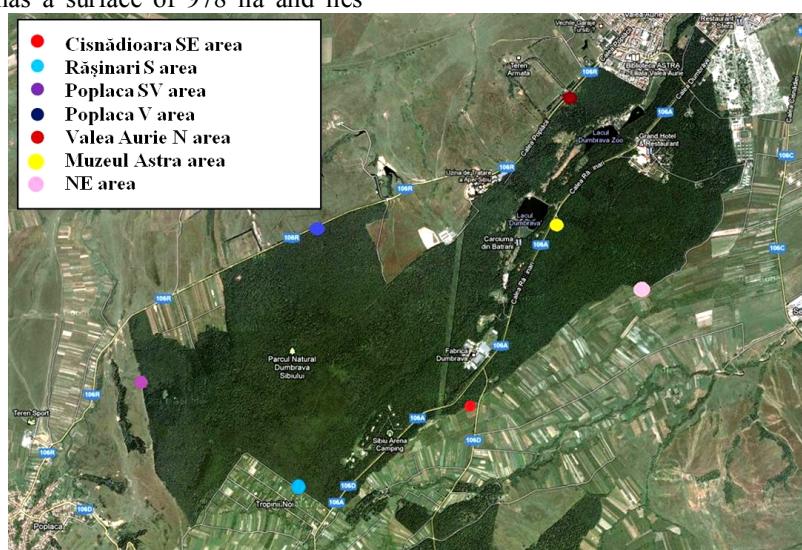


Fig. 1. The satellite map of the “Dumbrava Sibiului” oak forest, the circle mark the study plot (after <http://maps.google.ro>)

Catching butterflies is generally a difficult operation, their high flying speed as well as the fragility of their wings requires a lot of care and attention from the lepidopterologist. The diurnal butterflies subject to inventory were collected on routes using entomological net. Representative collection points have been chosen from "Dumbrava Sibiului" Forest as presented in (Fig. 1). Noctuidae species were caught with light trap.

Equipped with the field kit and the entomological net in order to collect the Macrolepidoptera from "Dumbrava Sibiului" Forest, I have usually sought open spaces with flowers (pastures and meadows in the north-east of Cisnădioara, Răşinari and Poplaca towns) but also fields with low vegetation from the edge of the forest where I observed and collected many diurnal species.

RESULTS

From the material collected and researched, there were identified 243 species belonging to 14 families and 1,698 specimens. The nomenclature adopted by [9, 10, 11, 14, 24, 25, 28, 29] was used to prepare the systematic list. The results of the research are presented in Table 1, which also contains the data on the geographic areas in Romania where the species have been found, the inventory numbers according to the "Catalogue of Romanian Lepidoptera", and the adopted IUCN classification representing the classifications in categories of endangered species according to the Red List [29].

The general faunal analysis (diversity, abundance, dominance) that I have performed reveals the considerable diversity and abundance of the Macrolepidoptera from the studied area. According to these analyzes and observations, six families are predominant in terms of diversity and abundance: *Pieridae* (22 species 92 specimens), *Nymphalidae* (22 species - 213 specimens), *Satyridae* (14 species - 275 specimens), *Plebejinae* (14 species - 82 specimens), *Lycenidae* (12 species - 67 specimens), *Hesperiidae* (10 species - 75 specimens).

The predominant and constant species specific to the studied area are: *Pieris brassicae brassicae* L.- *Pieridae* family (68 specimens), *Pieris rapae rapae* L., - *Pieridae* Family (92 specimens), *Melita cinxia cinxia* L.- *Nymphalidae* Family (148 specimens), *Melanargia galathea* Scolis- *Satyridae* Family (134 specimens). Therefore it can be said that the Macrolepidoptera entomofauna from "Dumbrava Sibiului" Forest is diverse, well structured with 71 constant species and 129 dominant species.

Also, there is a number of rare species in the studied area, such as: *Pyrgus alveolus* Hub., *Hesperia comma* coma L., *Neptis rivularis rivularis* Scop., *Neptis sappo* Pallas, *Nymphalis xanthomelas* D.&S., *Pararge achine* Scop., *Minois dryas* Scop., *Strymonidia pruni* L., *Lycaena tityrus* Poda.

Other ecological categories are represented by a small number of species: subtropical elements represented by migratory species: *Agrius convolvuli* L., *Acherontia atropos* L., *Macroglossum stellatarum* L., *Agrotis segetum* L., *Pieris brassicae* L., *Pontia daplidice* daplidice L., *Colias crocea* crocea f. *helice* Geoff.&Foerc., *Vanessa atalanta* L., *Vanessa cardui* L., *Aglais urticae* L. Elemente ubicviste (azonal): *Autorapha gamma* L., *Xestia c-nigrum* L., many of them are pests of the agricultural crops located in the northern and eastern part of the forest.

After performing the overall biological and ecological analysis (ecological groups, food regime, stage of development, flight periods), I obtained the following results: I found that the oligophagous species are predominant (58%); the polyphagous species (24%) are less numerous; and the monophagous species are rare (18%). Also, using the flight period of the reported species as a criterion I managed to classify these species according to the number of generations per year in: *univoltine* species which are the most numerous and represent 63% of all species, *bivoltine* species with a percentage of 33% and *trivoltine* species with only 4%.

From the observations made on field I have noticed that there is specialization by habitats and microhabitats, by host plant species, caused by the ecological valence of the species. There is a great diversity of ecological niches, a good use of the trophic base. I have also been able to study the mating behavior of the *Leptidia sinapis* and *Vanessa atalanta* species, the preference of the adults in terms of different host plants *Lotus corniculatus*, *Trifolium arvense*, *Vicia* sp., *Lathyrus aphaca*, *L. montanus*, *L. pratensis*, *L. tuberosus*, and other species, especially vegetables. The favorite flight hours are between 10-12 a.m. in the sunny days. After analyzing the flight periods of the studied species, and from the general dynamics I concluded that the period when most species fly are the months from May to August; these data are new for this area.

Following abbreviations were used: **CR**- Critically endangered, it is estimated that the survival of these species in the next 10-20 years is unlikely if not eliminate the factors that have caused this situation and after analysis of quantitative cost a decay rate of the population with at least 50% in the last 10 years. **EN**- Endangered, endangered taxa when there is a critical stage of threat, but shows high risk or threat extinction critical in the immediate future, it is estimated a probability of about 20% extinction in the next 20 years, **VU**-Vulnerable, a taxon is vulnerable when it is not in the critical threat or endangered, but have a high risk of extinction or critical threat in the near future, **NT**-Near threatened, **DD** -Data deficient, includes taxa not included in CR, EN or VU but by worsening the degree of threat, it may take one or other of the three categories. This category largely replaces **RL** variant category IUCN 2000 [28, 29].

Table 1

SYSTEMATIC LIST OF THE MACROLEPIDOPTERA (INSECTA: LEPIDOPTERA) FROM DUMBRAVA SIBIULUI FOREST (SIBIU COUNTY, ROMANIA)

No	No. Ro*	No. K.&R.**	TAXON	Area of România	Degree of endangerment
FAMILY LASIOCAMPIDAE (3306 Ro, K. & R. 6722)					
1	3309 Ro	K. & R. 6728	<i>Poecilocampa populi</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD	
2	3318 Ro	K. & R.6743	<i>Malacosoma neustria</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	NT
3	3323 Ro	K. & R. 6752	<i>Lasiocampa quercus</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DR	
4	3325 Ro	K. & R. 6755	<i>Macrothylacia rubi</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	NT
5	3327 Ro	K. & R. 6763	<i>Dendrolimus pini montana</i> Staudinger, 1871	BT, TR, MM, MT, MD	
6	3331 Ro	K. & R. 6769	<i>Cosmotriche lunigera</i> Esper, 1784 (sin. <i>C. lobulina</i> Denis&Schiffermüller, 1775)	BT, TR, MM, OT, MT, MD	
7	3334 Ro	K. & R. 6773	<i>Phyllodesma tremulifolia</i> Hübner, 1810	BT, CR, TR, OT, MT, MD; DB	NT
8	3336 Ro	K. & R. 6777	<i>Gastropacha quercifolia</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	NT
9	3339 Ro	K. & R. 6780	<i>Odonestis pruni pruni</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	NT
FAMILY SATURNIIDAE (3344 RO, K. & R. 6785)					
10	3347 Ro	K. & R. 6788	<i>Aglia tau</i> Linnaeus, 1758	BT, TR, MM, OT, MT, MD	
11	3350 Ro	K. & R. 6793	<i>Saturnia pyri pyri</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB	VU
12	3351 Ro	K. & R. 6794	<i>Saturnia pavonia</i> Linnaeus, 1758 (sin. <i>S. carpini</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD; DB	VU
FAMILY LEMONIIDAE (3356 RO, K. & R. 6803)					
13	3358 Ro	K. & R. 6805	<i>Lemonia dumii</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MD; DB	EN
FAMILY SPHINGIDAE (3361 RO, K. & R. 6812)					
14	3366 Ro	K. & R. 6819	<i>Mimas tiliae</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
15	3370 Ro	K. & R. 6824	<i>Laothoe populi</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
16	3373 Ro	K. & R. 6828	<i>Agrius convolvuli</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
17	3375 Ro	K. & R. 6830	<i>Acherontia atropos</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	VU
18	3377 Ro	K. & R. 6832	<i>Sphinx ligustri</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MD; DB	NT
19	3379 Ro	K. & R. 6834	<i>Hyloicus pinastri pinastri</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MD	
20	3388 Ro	K. & R. 6843	<i>Macroglossum stellatarum</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
21	3401 Ro	K. & R. 6863	<i>Deilephila porcellus</i> Linnaeus, 1758 (.)	BT, CR, TR, MM, OT, MT, MD; DB	
FAMILY HESPERIIDAE (3406 Ro, K. & R. 6875)					
22	3410 Ro	K. & R. 6879	<i>Erynnis tages tages</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
23	3413Ro	K. & R.6884	<i>Carcharodus laevatherae laevatherae</i> Esper,1783	BT, CR, TR, DB	VU
24	3414 Ro	K. & R. 6885	<i>Carcharodus floccifera</i> Zeller, 1847 (sin. <i>C. altheae</i> Hübner, 1803 n. praecocc.)	BT, CR, TR, OT, MT, MD; DB	VU

25	3417 Ro	K. & R.6891	<i>Spialia sertorius sertorius</i> Hoffmannsegg, 1804 (sin. <i>S. sao</i> Hübner, 1803) (6.V. 8.VII.1963 HH)	TR	DD
26	3427 Ro	K. & R. 6904	<i>Pyrgus (P) malvae malvae</i> Linnaeus, 1758 (<i>P. althaea</i> Esper, 1783)	BT, CR, TR, MM, OT, MT, MD; DB	
27	3438 Ro	K. & R. 6923	<i>Thymelicus lineola</i> Ochsenheimer, 1808	BT, CR, TR, MM, OT, MT, MD; DB	
28	3439 Ro	K. & R. 6924	<i>Thymelicus sylvestris</i> Poda, 1761 (sin. <i>T. thaumas</i> Hufnagel, 1766, <i>T. linea</i> Müller, 1764)	BT, CR, TR, MM, OT, MT, MD; DB	NT
29	3440 Ro	K. & R. 6925	<i>Thymelicus acteon acteon</i> Rottemburg, 1775	BT, CR, TR, OT, MD; DB	NT
30	3442 RO	K. & R. 6928	<i>Hesperia comma</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
31	3444 Ro	K. & R. 6930	<i>Ochlodes venatus faunus</i> Turati, 1905 (sin. <i>O. sylvanus</i> Esper, 1777)	BT, CR, TR, MM, OT, MT, MD; DB	
			FAMILY PAPILIONIDAE (3446 RO, K. & R. 6939)		
32	3458 Ro	K. & R. 6958	<i>Iphiclides podalirius podalirius</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	VU
33	3460 Ro	K. & R. 6960	<i>Papilio machaon machaon</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	EN
			FAMILY PIERIDAE (3461 RO, K. & R. 6963)		
34	3464 Ro	K. & R. 6966	<i>Leptidea sinapis sinapis</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
35	3466 Ro	K. & R. 6969	<i>Leptidea morsei major</i> Grund, 1907 (VW, IV.1920, 21.V.1921)	BT, TR, MM, MD; DB	EN
36	3469 Ro	K. & R. 6973	<i>Anthocaris cardamines meridionalis</i> Verity, 1908	BT, CR, TR, MM, OT, MT, MD; DB	
37	3474 Ro	K. & R. 6993	<i>Aporia crataegi crataegi</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	NT
38	3476 Ro	K. & R. 6995	<i>Pieris brassicae brassicae</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	VU
39	3478 Ro	K. & R. 6998	<i>Pieris rapae</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
40	3480 Ro	K. & R. 7000	<i>Pieris napi meridionalis</i> Heyne, 1895	BT, CR, TR, MM, OT, MT, MD; DB	
41	3489 Ro	K. & R. 7015	<i>Colias croceus</i> Fourcroy, 1785 (sin. <i>C. edusa</i> Fabricius, 1787)	BT, CR, TR, MM, OT, MT, MD; DB	
42	3490 Ro	K. & R. 7017	<i>Colias myrmidone myrmidone</i> Esper, 1780 (29.V.1921 VW, 12.27.VII.1907, DC)	BT, CR, TR, MM, OT, MT, MD; DB	VU
43	3491 Ro	K. & R. 7018	<i>Colias crysotheme crysotheme</i> Esper, 1781	BT, TR, MT, MD; DB	VU
44	3492 Ro	K. & R. 7021	<i>Colias hyale hyale</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
45	3493 Ro	K. & R. 7022	<i>Colias alfacariensis</i> Ribbe, 1905 (sin. <i>C. australis</i> Verity, 1911)	BT, CR, TR, MM, OT, MT, MD; DB	NT
46	3495 Ro	K. & R. 7024	<i>Gonepteryx rhamni rhamni</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
			FAMILY LYCAENIDAE (3496 Ro, K. & R. 7027)		
47	3499 Ro	K. & R. 7030	<i>Hamearis lucina</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
48	3502 Ro	K. & R. 7034	<i>Lycaena phlaeas phlaeas</i> Linnaeus, 1761	BT, CR, TR, MM, OT, MT, MD; DB	
49	3504 Ro	K. & R. 7036	225. <i>Lycaena dispar</i> Haworth, 1802 (sin. <i>L. dispar rutila</i> Werneburg, 1864)	BT, CR, TR, MM, OT, MT, MD; DB	VU
50	3505 Ro	K. & R. 7037	<i>Lycaena virgaureae virgaureae</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	NT
51	3506 Ro	K. & R. 7039	<i>Lycaena tityrus tityrus</i> Poda, 1761 (sin. <i>L. tityrus argentifex</i> Balint, 1990)	BT, CR, TR, MM, OT, MT, MD; DB	NT
52	3510 Ro	K. & R. 7043	<i>Lycaena thersamon</i> Esper, 1784	BT, CR, TR, MM, OT, MT, MD; DB	VU

53	3514 Ro	K. & R. 7049	<i>Neozephyrus quercus quercus</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	VU
54	3518 Ro	K. & R. 7058	<i>Callophrys rubi</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
55	3521 Ro	K. & R. 7063	<i>Strymonidia pruni</i> Linnaeus, 1758 (sin. <i>Satyrium pruni</i> Linnaeus, 1758)	BT, CR, TR, MM, OT, MT, MD; DB	NT
56	3522 Ro	K. & R. 7064	<i>Strymonidia spini</i> Denis&Schiffermüller, 1775 sin. <i>Satyrium spini</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD; DB	NT
57	3524 Ro	K. & R. 7067	<i>Satyrium acaciae</i> Fabricius, 1787	BT, CR, TR, MM, OT, MT, MD; DB	VU
58	3547 Ro	K. & R. 7107	<i>Glaucopsyche alexis</i> Poda, 1761 (sin. <i>Lycena cyllarus</i> Rottenburg, 1775)	BT, CR, TR, MM, OT, MT, MD; DB	
59	3551 Ro	K. & R. 7112	<i>Maculinea arion</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	NT
60	3554 Ro	K. & R. 7115	<i>Maculinea alcon</i> Denis&Schiffermüller, 1775 (29.VI.1907 DC, 12.VIII.1940 EW)	BT, CR, TR, MM, OT, MD; DB	EN
61	3560 Ro	K. & R. 7127	<i>Plebeius argus argus</i> Linnaeus, 1758) (sin. <i>P. aegon</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD; DB	
62	3562 Ro	K. & R. 7129	<i>Lycaedes (Plebeius) argyrogynomon</i> Bergsträsser, [1779] (sin. <i>L. ismenias</i> Meigen, 1830, homonim invalidat)	BT, CR, TR, MM, MT, MD; DB	
63	3567 Ro	K. & R.7145	<i>Aricia agestis agestis</i> Denis&Schiffermüller, 1775 (sin. <i>A. astrache</i> Bergsträsser, 1779)	BT, CR, TR, MM, OT, MT, MD; DB	
64	3573 Ro	K. & R.7152	<i>Polyommatus semiargus semiargus</i> Rottemburg, 1775	BT, CR, TR, MM, OT, MT, MD; DB	
65	3578 Ro	K. & R. 7163	<i>Polyommatus icarus</i> Rottemburg, 1775	BT, CR, TR, MM, OT, MT, MD; DB	
66	3580 Ro	K. & R. 7171	<i>Melegeria daphnis</i> Denis&Schiffermüller, 1775,	BT, CR, TR, OT, MT, MD; DB	NT
67	3581 Ro	K. & R. 7172	<i>Melegeria bellargus</i> Rottemburg, 1775	BT, CR, TR, OT, MT, MD; DB	NT
FAMILY NYMPHALIDAE (3587 Ro, K. & R. 7196)					
68	3593 Ro	K. & R. 7202	<i>Argynnис (Argynnис) paphia paphia</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	NT
69	3594Ro	K. & R.7203	<i>Pandoriana (Argynnис) pandora</i> Denis&Schiffermüller, 1775 (sin. <i>P. maja</i> Cramer, 1775)	BT, CR, TR, MM, OT, MT, MD; DB	VU
70	3595 Ro	K. & R. 7204	<i>Argynnис (Mesoacidalia) aglaja aglaja</i> Linnaeus, 1758 (sin. <i>M. charlotta</i> Haworth, 1803)	BT, CR, TR, MM, OT, MT, MD; DB	
71	3596Ro	K. & R.7205	<i>Argynnис (Fabriciana) addipe</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB	NT
72	3597 Ro	K. & R. 7206	<i>Argynnис (Fabriciana) niobe niobe</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	NT
73	3600 Ro	K. & R. 7210	<i>Issoria lathonia</i> Linnaeus, 1758 (sin. <i>Argynnис lathoria</i> Linnaeus, 1758)	BT, CR, TR, MM, OT, MT, MD; DB	
74	3607 Ro	K. & R. 7220	<i>Clossiana euphrosyne</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
75	3609 Ro	K. & R. 7222	<i>Clossiana selene</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB	
76	3610 Ro	K. & R. 7228	<i>Clossiana dia dia</i> Linnaeus, 1767	BT, CR, TR, MM, OT, MT, MD; DB	
77	3616 Ro	K. & R. 7243	<i>Vanessa atalanta</i> Linnaeus, 1758 (sin. <i>V. amiralis</i> Retzius, 1783)	BT, CR, TR, MM, OT, MT, MD; DB	
78	3617 Ro	K. & R. 7245	<i>Vanessa cardui</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
79	3619 Ro	K. & R. 7248	<i>Inachis io</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	

80	3621 Ro	K. & R. 7250	<i>Aglais urticae</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	NT
81	3623 Ro	K. & R. 7252	<i>Polygona c-album</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	NT
82	3626 Ro	K. & R. 7255	<i>Araschnia levana</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	NT
83	3630 Ro	K. & R. 7259	<i>Nymphalis xanthomelas</i> Esper, 1781 (9.VI.1947 EW, 9.VII.1904 VW)	BT, CR, TR, MM, MT, MD	CR
84	3636 Ro	K. & R. 7270	<i>Melitaea cinxia cinxia</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	NT
85	3637 Ro	K. & R. 7271	<i>Melitaea phoebe</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB	NT
86	3641 Ro	K. & R. 7275	<i>Melitaea didyma didyma</i> Esper, [1778]	BT, CR, TR, MM, OT, MT, MD; DB	
87	3645 Ro	K. & R. 7283	<i>Melitaea athalia athalia</i> Rottenburg, 1775	BT, CR, TR, MM, OT, MT, MD; DB	NT
88	3648 Ro	K. & R. 7286	<i>Limenitis populi</i> Linnaeus, 1758 (5.VI.1902 DC, 10.VI.1906 DC, 12.VI.1904 VW)	BT, CR, TR, MM, OT, MT, MD	VU
89	3652 Ro	K. & R. 7290	<i>Neptis sappo</i> Pallas, 1771 (sin. <i>N. aceris</i> Esper, 1783) (7.V.1902, DC)	BT, CR, TR, MM, OT, MT, MD; DB	VU
90	3653 Ro	K. & R. 7291	<i>Neptis rivularis</i> Scopoli, 1763 (sin. <i>N. coenobita</i> Stoll, 1782; <i>N. lucilla</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, MT, MD; DB	NT
91	3657 Ro	K. & R. 7298	<i>Apatura ilia ilia</i> Denis&Schiffermüller, 1775 (1.VII.1954 EW)	BT, CR, TR, MM, OT, MT, MD	VU
92	3658 Ro	K. & R. 7299	<i>Apatura iris</i> Linnaeus, 1758 (28.VI.1821 DC, 14.VII.1904 VW)	BT, TR, MM, OT, MT, MD	VU
93	3665 Ro	K. & R. 7307	<i>Pararge (Pararge) aegeria tircis</i> Butler, 1867 (sin. <i>P. aegeria</i> Linnaeus, 1758, <i>P.</i> <i>aegeria egerides</i> Staudinger, 1871)	BT, CR, TR, MM, OT, MT, MD; DB	
94	3667 Ro	K. & R. 7309	<i>Pararge (Lisiommata) megera megera</i> Linnaeus, 1767	BT, CR, TR, MM, OT, MT, MD; DB	
95	3670 Ro	K. & R. 7315	<i>Parage (Lopinga) achine achine</i> Scopoli, 1763 (sin. <i>L. deianira</i> Linnaeus, 1764)	BT, CR, TR, MM, OT, MT, MD	VU
96	3674 Ro	K. & R. 7325	<i>Caenonympha arcania arcania</i> Linnaeus, 1761 (sin. <i>C. amyntas</i> Poda, 1761)	BT, CR, TR, MM, OT, MT, MD; DB	
97	3675 Ro	K. & R. 7326	<i>Caenonympha glycerion glycerion</i> Borkhausen, 1788 (sin. <i>C. iphis</i> Denis&Schiffermüller, 1775, homonym invalidat)	BT, CR, TR, MM, OT, MT, MD; DB	NT
98	3677 Ro	K. & R. 7334	<i>Coenonympha pamphilus</i> Linnaeus, 1758 (sin. <i>C. lyllus</i> Esper, 1805)	BT, CR, TR, MM, OT, MT, MD; DB	
99	3682 Ro	K. & R. 7344	<i>Aphantopus hyperanthus</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
100	3684 Ro	K. & R. 7350	<i>Maniola jurtina jurtina</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
101	3690 Ro	K. & R. 7361	<i>Erebia euryale</i> Esper, 1805 (sin. <i>E. euryale</i> <i>syrmia</i> Fruhstorfer, 1919)	BT, CR, TR, MM, OT, MT, MD; DB	NT
102	3695 Ro	K. & R. 7372	<i>Erebia aethiops aethiops</i> Esper, 1777 (sin. <i>E aethiops fogarasica</i> Warren, 1931, <i>E.</i> <i>aethiops jigodini</i> Popescu-Gorj, 1955, <i>E. f. mesorubria</i> , Popescu-Gorj, 1955)	BT, CR, TR, MM, OT, MT, MD; DB	NT
103	3696 Ro	K. & R. 7379	<i>Erebia medusa medusa</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB	NT
104	3704 Ro	K. & R. 7415	<i>Melanargia galathea scolis</i> Fruhstorfer, 1917	BT, CR, TR, MM, OT, MT, MD; DB	
105	3706 Ro	K. & R. 7427	<i>Minois dryas</i> Scopoli, 1763	BT, CR, TR, MM, OT, MT, MD; DB	NT

FAMILY DREPANIDAE (3720 RO, K. & R. 7478)

106	3723 Ro	K. & R. 7481	<i>Thyatira batis</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
107	3725 Ro	K. & R. 7483	<i>Habrosyne pyritooides</i> Hufnagel, 1766 (sin. <i>H. derasa</i> Linnaeus, 1787)	BT, CR, TR, MM, OT, MT, MD; DB	
108	3727 Ro	K. & R. 7485	<i>Tethea ocularis</i> Linnaeus, 1767, (sin. <i>Cymatophora octogesima</i> Hübner, 1796)	BT, CR, TR, MM, OT, MT, MD; DB	NT
109	3728 Ro	K. & R. 7486	<i>Tethea or</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB	NT
110	3730 Ro	K. & R. 7488	<i>Tetheella fluctuosa</i> Hübner, 1803	BT, TR, MM, MT, MD	NT
111	3734 Ro	K. & R.7492	<i>Cymatophorima diluta</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, MD; DB	NT
112	3743 Ro	3743, K. & R. 7501	<i>Falcaria lacertinaria</i> Linnaeus, 1758	BT, TR, MM, MD	NT
113	3745 Ro	K. & R. 7503	<i>Watsonalla binaria</i> Hufnagel, 1767	BT, CR, TR, MM, OT, MT, MD; DB	
114	3746 Ro	K. & R. 7505	<i>Watsonalla cultraria</i> Fabricius, 1775 (<i>W. hanula</i> Denis&Schiffermüller, 1775, <i>W. unguicula</i> Hübner, 1803)()	BT, TR, MM, OT, MT, MD; DB	
115	3749 Ro	K. & R. 7508	<i>Drepana falcataria</i> Linnaeus, 1758 (sin. <i>D. sicula</i> Denis&Schiffermüller, 1775, <i>D. falcata</i> Denis&Schiffermüller, 1775) ()	BT, CR, TR, MM, OT, MT, MD	NT
116	3751 Ro	K. & R. 7510	<i>Sabra harpagula</i> Esper, 1786	BT, CR, TR, MM, MT, MD; DB	NT
117	3753Ro	K. & R. 7512	<i>Cilix glaucata</i> Scopoli, 1763 (sin. <i>C. spinula</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD; DB	
			FAMILY GEOMETRIDAE (3755 RO, K. & R. 7514)		
118	3758 Ro	K. & R. 7517	<i>Archiearis parthenias</i> Linnaeus, 1761	BT, TR, OT, MT, MD	NT
119	3759 Ro	K. & R. 7518	<i>Archiearis notha</i> Hübner, [1803]	BT, CR, TR, MM, OT, MD	NT
120	3760 Ro	K. & R. 7519	<i>Archiearis puella</i> Esper, 1787	BT, CR, TR, MM, MT, MD	VU
121	3767 Ro	K. & R. 7527	<i>Lomaspilis marginata</i> Linnaeus, 1758 (sin. <i>pollutaria</i> Hübner, 1799)	BT, CR, TR, MM, OT, MT, MD; DB	
122	3772 Ro	K. & R. 7534	<i>Lomographa dilectaria</i> Hübner, 1790	BT, CR, TR, MM, OT, MD; DB	NT
123	3807 Ro	K. & R. 7607	<i>Plagodis dolabraria</i> Linnaeus, 1767	BT, CR, TR, MM, MT, MD; DB	NT
124	3816 Ro	K. & R. 7620	<i>Pseudopanthera macularia</i> Linnaeus, 1758 (sin. <i>P. maculata</i> Scopoli, 1763)	BT, CR, TR, MM, OT, MT, MD; DB	
125	3833 Ro	K. & R. 7642	<i>Selenia lunularia</i> Hübner, 1788	BT, CR, TR, MM, OT, MT, MD; DB	NT
126	3834 Ro	K. & R. 7643	<i>Selenia tetralunaria</i> Hufnagel, 1767	BT, CR, TR, MM, OT, MT, MD; DB	NT
127	3849 Ro	K. & R. 7663	<i>Colotois pennaria</i> Linnaeus, 1761	BT, CR, TR, MM, MT, MD; DB	
128	3851 Ro	K. & R. 7665	<i>Angerona prunaria</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	NT
129	3856 Ro	K. & R. 7674	<i>Lycia hirtaria hirtaria</i> Clerck, 1759	BT, CR, TR, MM, OT, MT, MD; DB	NT
130	3860 Ro	K. & R. 7685	<i>Biston strataria strataria</i> Hufnagel, 1767 (<i>B. prodromaria</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD; DB	NT
131	3861 Ro	K. & R. 7686	<i>Biston betularia</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
132	3865 Ro	K. & R. 7695	<i>Agriopsis aurantiaria</i> Hübner, 1799	BT, CR, TR, MM, OT, MT, MD; DB	

133	3866 Ro	K. & R. 7696	<i>Agriopsis marginaria</i> Fabricius, 1776 (sin. <i>progemmaria</i> Hübner, 1799)	BT, CR, TR, MM, OT, MT, MD; DB
134	3903 Ro	K. & R. 7783	<i>Boarmia roboraria</i> Denis&Schiffermüller, 1775 (<i>Hypomecis</i> Hübner, 1821)	BT, CR, TR, MM, MT, MD; DB
135	3920 Ro	K. & R. 7804	<i>Ematurga atomaria atomaria</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
136	3929 Ro	K. & R. 7824	<i>Cabera pusaria</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
137	3932 Ro	K. & R. 7828	<i>Lomographa bimaculata</i> Fabricius, 1775	BT, CR, TR, MM, OT, MT, MD; DB
138	3937 Ro	K. & R. 7836	<i>Campaea margaritata</i> Linnaeus, 1767 (<i>C. margaritaria</i> Denis&Schiffermüller, 1775, <i>C. autumnata</i> Alexinschi & Peiu, 1960)	BT, CR, TR, MM, OT, MT, MD; DB
139	3980 Ro	K. & R. 7916	<i>Siona lineata</i> Scopoli, 1763	BT, CR, TR, MM, OT, MT, MD; DB
140	3997 Ro	K. & R. 7953	<i>Alsophila aescularia</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB
141	3998 Ro	K. & R. 7954	<i>Alsophila quadripunctaria</i> Esper, 1801 (sin. <i>Anisopteryx aceraria</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, MT, MD; DB
142	4006 Ro	K. & R. 7965	<i>Pseudoterpnna pruinata</i> Hufnagel, 1767	BT, CR, TR, MM, MT, MD
143	4008 Ro	K. & R. 7969	<i>Geometra papilionaria</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
144	4010 Ro	K. & R. 7971	<i>Comibaena pustulata</i> Hufnagel, 1767 (sin. <i>C. bajularia</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD; DB
145	4013 Ro	K. & R. 7975	<i>Thetidia smaragdaria</i> Fabricius, 1787	BT, CR, TR, MM, OT, MT, MD; DB
146	4015 Ro	K. & R. 7980	<i>Hemithea aestivaria</i> Hübner, 1789 () (sin. <i>H. strigata</i> Müller, 1764)	BT, CR, TR, MM, OT, MT, MD; DB
147	4017 Ro	K. & R. 7982	<i>Chlorissa viridata</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
148	4018 Ro	K. & R. 7983	<i>Chlorissa cloraria</i> Hübner, [1813] (sin. <i>C. porrinata</i> Zeller, 1848)	BT, CR, TR, MM, OT, MT, MD; DB
149	4020 Ro	K. & R. 7984	<i>Phaiogramma pulmentaria</i> Guenée, 1858 (sin. <i>P. etruscaria</i> Zeller, 1849)	BT, CR, TR, MM, MT, MD; DB
150	4026 Ro	K. & R. 8000	<i>Hemistola chrysoprasaria</i> Esper, 1795 (sin. <i>H. imaculata</i> auct.)	BT, CR, TR, MM, OT, MT, MD; DB
151	4032 Ro	K. & R. 8012	<i>Cyclophora pendularia</i> Clerck, 1759	BT, CR, TR, MM, OT, MT, MD; DB
152	4034 Ro	K. & R. 8014	<i>Cyclophora annulata</i> Schulze, 1775 (sin. <i>C. annularia</i> Fabricius, 1775, <i>C. omicronaria</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD; DB
153	4037 Ro	K. & R. 8018	<i>Cyclophora ruficiliaria</i> Herrich & Schäffer, 1855	BT, CR, TR, MM, MT, MD; DB
154	4040 Ro	K. & R. 8022	<i>Cyclophora punctaria</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
155	4042 Ro	K. & R. 8024	<i>Cyclophora linearia</i> Hübner, 1799 (sin. <i>C. trilinearia</i> Borkhausen, 1794, nec. Hübner, 1787)	BT, CR, TR, MM, OT, MT, MD; DB
156	4044 Ro	K. & R. 8028	<i>Timandra griseata</i> W. Petersen, 1902 (sin. <i>T. comae</i> A. Schmidt, 1931, <i>Calothysanis amata</i> auct.)	BT, CR, TR, MM, OT, MT, MD; DB
157	4046 Ro	K. & R. 8036	<i>Scopula immorata</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
158	4052 Ro	K. & R. 8042	<i>Scopula nigropunctata</i> Hufnagel, 1767 (sin. <i>S. strigilaria</i> auct., <i>S. prataria</i> Boisduval, 1840)	BT, CR, TR, MM, OT, MT, MD; DB

159	4056 Ro	K. & R. 8051	<i>Scopula decorata decorata</i> Denis&Schiffermüller, 1775 (sin. <i>Acidalia violata</i> Thunberg, 1784)	BT, CR, TR, OT, MT, MD; DB	NT
160	4077 Ro	K. & R. 8099	<i>Idaea ochrata</i> Scopoli, 1763 (sin. <i>ochrearia</i> Schrank, 1802 nec. Rossi, 1794)	BT, CR, TR, MM, OT, MT, MD; DB	NT
161	4105 Ro	K. & R. 8184	<i>Idaea versata versata</i> Linnaeus, 1758 (sin. <i>I. remulata</i> Linnaeus, 1758)	BT, CR, TR, MM, OT, MT, MD; DB	
162	4118 Ro	K. & R. 8221	<i>Lythria purpuraria</i> Linnaeus, 1758 (sin. <i>L. cruentata</i> Hufnagel, 1767, nec. <i>Scopoli</i> , 1763)	BT, CR, TR, MM, OT, MT, MD; DB	NT
163	4132 Ro	K. & R. 8241	<i>Scotopteryx luridata</i> Hufnagel, 1767 (sin. <i>S. plumbaria</i> Denis&Schiffermüller, 1775)	BT, TR, MM, MT, MD; DB	NT
164	4141 Ro	K. & R. 8253	<i>Xanthorhoe ferrugata</i> Clerck, 1759 (sin. <i>X. unidentaria</i> Haworth, 1809, <i>X. ferrugaria</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD; DB	
165	4154 Ro	K. & R. 8274	<i>Epirrhoë tristata</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
166	4155 Ro	K. & R. 8275	<i>Epirrhoë alternata</i> Müller, 1764	BT, CR, TR, MM, OT, MT, MD; DB	
167	4162 Ro	K. & R. 8289	<i>Camptogramma bilineata</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
168	4177 Ro	K. & R. 8314	<i>Pelurga comitata</i> Linnaeus, 1758 (sin. <i>P. moldavinata</i> Caradja, 1896)	BT, CR, TR, MM, OT, MT, MD; DB	NT
169	4257 Ro	K. & R. 8432	<i>Philereme vetulata</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB	
170	4269 Ro	K. & R. 8447	<i>Operophtera brumata</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
171	4274 Ro	K. & R. 8458	<i>Perizoma alchemillata</i> Linnaeus, 1758 (<i>P. rivulata</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD	
172	4276 Ro	K. & R. 8456	<i>Perizoma lugdunaria</i> Herrich-Schäffer, 1855	BT, CR, TR, MM, OT, MT, MD; DB	NT
173	4392 Ro	K. & R. 8631	<i>Odezia atrata</i> Linnaeus, 1758 (sin. <i>chaerophyllaria</i> Boisduval, 1840) (sin. <i>O. chaerophyllaria</i> Boisduval, 1840)	TR, MM, MT, MD	NT
174	4398 Ro	K. & R. 8639	<i>Lithostege farinata</i> Hufnagel, 1767 (sin. <i>L. illibata</i> Denis&Schiffermüller, 1775, <i>L. nivearia</i> Hübner, 1799)	BT, CR, TR, MM, OT, MT, MD; DB	
FAMILY NOTODONTIDAE (4429 RO, K. & R. 8686)					
175	4455 Ro	K. & R. 8719	<i>Notodonta ziczac</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
176	4457 Ro	K. & R. 8721	<i>Drymonia dodonaea</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB	
177	4514 Ro	K. & R. 8787	<i>Acronicta rumicis</i> Linnaeus, 1758 (sin. <i>A. salicis</i> Curtis, 1826)	BT, CR, TR, MM, OT, MT, MD; DB	
178	4516 Ro	K. & R. 8789	<i>Craniophora ligustri ligustri</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB	
179	4542 Ro	K. & R. 8837	<i>Simplicia rectalis</i> Eversmann, 1842	BT, CR, TR, MM, OT, MT, MD; DB	
180	4544 Ro	K. & R. 8839	<i>Paracolax derivalis</i> Hübner, 1796 (sin. <i>P. tristalis</i> Fabricius, 1794, <i>P. glaucinalis</i> sensu Denis&Schiffermüller, 1775, <i>P. tristis</i> Fabricius, 1798)	BT, CR, TR, MM, OT, MT, MD; DB	
181	4552 Ro	K. & R. 8849	<i>Polypogon tentacularia</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB	
182	4570 Ro	K. & R. 8871	<i>Catocala sposa</i> Linnaeus, 1767	BT, CR, TR, MM, OT, MT, MD; DB	NT
183	4574 Ro	K. & R. 8877	<i>Catocala elocata elocata</i> Esper, 1787	BT, CR, TR, MM, OT, MT, MD; DB	NT
184	4576 Ro	K. & R.8882	<i>Catocala promissa promissa</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB	NT

185	4585 Ro	K. & R. 8879	<i>Minucia lunaris lunaris</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB
186	4617 Ro	K. & R.8969	<i>Euclidia glyphica</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
187	4626 Ro	K. & R. 8984	<i>Scoliopteryx libatrix</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
188	4633 Ro	K. & R. 8994	<i>Hypena (H) proboscidalis</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
189	4638 Ro	K. & R. 9006	<i>Phytometra viridaria</i> Clerck, 1759 (sin. <i>P. laccata</i> Scopoli, 1763, <i>P. aenea</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD; DB
190	4803 Ro	K. & R. 9307	<i>Amphipyra pyramidea</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
191	4813 Ro	K. & R. 9331	<i>Diloba caeruleocephala</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
192	4871 Ro	K. & R. 9450	<i>Hoplodrina blanda</i> Denis&Schiffermüller, 1775 (sin. <i>H. taraxaci</i> Hübner, 1813)	BT, CR, TR, MM, OT, MT, MD; DB
193	4892 Ro	K. & R. 9483	<i>Rusina ferruginea</i> Esper, 1785 (,) (sin. <i>R. umbratica</i> Goeze, 1781, nec. Linnaeus, 1758, <i>R. tenebrosa</i> Hübner, 1803)	BT, CR, TR, MM, OT, MT, MD; DB
194	4901 Ro	K. & R. 9496	<i>Thalpophila matura</i> Hufnagel, 1776 (,) (sin. <i>T. texa</i> Esper, 1787)	BT, CR, TR, MM, OT, MT, MD; DB
195	4905 Ro	K. & R. 9501	<i>Trachea atriplicis</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
196	4907 Ro	K. & R. 9503	<i>Euplexia lucipara</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
197	4938 Ro	K. & R. 9540	<i>Mesogona oxalina</i> Hübner, 1813	BT, CR, TR, MM, OT, MT, MD; DB
198	4945 Ro	K. & R. 9549	<i>Cosmia pyralina</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB
199	4946 Ro	K. & R. 9550	<i>Cosmia trapezina</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
200	4948 Ro	K. & R. 9748	<i>Apamea monoglypha</i> Hufnagel, 1766	BT, CR, TR, MM, OT, MT, MD; DB
201	4980 Ro	K. & R. 9789	<i>Mesapamea secalis</i> Linnaeus, 1758 (sin. <i>M. lamda</i> Vieweg, 1790, <i>M. leucostigma</i> Esper 1791, <i>M. secalina</i> Hübner, 1809)	BT, CR, TR, MM, OT, MT, MD; DB
202	5000 Ro	K. & R. 9828	<i>Amphipoea ocella</i> Linnaeus, 1761	BT, CR, TR, MM, OT, MT, MD
203	5052 Ro	K. & R. 9993	<i>Polia nebulosa</i> Hufnagel, 1766 (sin. <i>P. grandis</i> Donovan, 1801)	BT, CR, TR, MM, OT, MT, MD; DB
204	5058 Ro	K. & R. 9912	<i>Lacanobia w-latinum</i> Hufnagel, 1766	BT, CR, TR, MM, OT, MT, MD; DB
205	5080 Ro	K. & R. 9987	<i>Mamestra brassicae</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
206	5102 Ro	K. & R. 9928	<i>Hecatera bicolorata</i> Hufnagel, 1766	BT, CR, TR, MM, OT, MT, MD; DB
207	5133 Ro	K. & R. 10000	<i>Mythimna conigera</i> Denis&Schiffermüller, 1775 (sin. <i>M. floccida</i> Esper, 1788)	BT, CR, TR, MM, OT, MT, MD
208	5134 Ro	K. & R. 10007	<i>Mythimna pallens</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
209	5144 Ro	K. & R. 10002	<i>Mythimna albipuncta</i> Denis&Schiffermüller, 1775 (sin. <i>Hyphilare flecki</i> Cradja, 1896)	BT, CR, TR, MM, OT, MT, MD; DB
210	5147 Ro	K. & R. 10022	<i>Mythimna l-album</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
211	5168 Ro	K. & R. 10039	<i>Orthosia cruda</i> Denis&Schiffermüller, 1775 (sin. <i>Monima pulverulenta</i> Esper, 1786)	BT, CR, TR, MM, OT, MT, MD; DB

212	5171 Ro	K. & R. 10048	<i>Orthosia gracilis</i> Denis&Schiffermüller, 1775 (sin. <i>Cororthosia gracilis</i> Berio, 1980)	BT, CR, TR, MM, MT, MD
213	5174 Ro	K. & R. 10038	<i>Orthosia gothica</i> Linnaeus, 1758 (sin. <i>Semiophora gothica</i> Stephens, 1829)	BT, CR, TR, MM, OT, MT, MD; DB
214	5176 Ro	K. & R. 10050	<i>Orthosia munda</i> Denis&Schiffermüller, 1775 (sin. <i>Anorthoa munda</i> Berio, 1980)	BT, CR, TR, MM, OT, MT, MD; DB
215	5181 Ro	K. & R. 10054	<i>Egira conspicillaris</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
216	5216 Ro	K. & R. 9600	<i>Conistra (C.) vaccinii</i> Linnaeus, 1761 (sin. <i>C. spadicea</i> Denis&Schiffermüller, 1775, <i>C. polita</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD; DB
217	5218 Ro	K. & R. 9603	<i>Conistra rubiginosa</i> Scopoli, 1763 (<i>C. silene</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, MT, MD; DB
218	5224 Ro	K. & R. 9611	<i>Dasycampa erythrocephala</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB
219	5233 Ro	K. & R. 9660	<i>Lithophane ornitopus</i> ornitopus Hufnagel, 1766 (<i>L. rizolitha</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD; DB
220	5257 Ro	K. & R. 9694	<i>Dichonia aprilina</i> Linnaeus, 1758 (sin. <i>Griposia aprilina</i> Tams, 1939)	BT, CR, TR, MM, OT, MT, MD; DB
221	5313 Ro	K. & R. 10096	<i>Noctua pronuba</i> Linnaeus, 1758 (<i>N. innuba</i> Treitschke, 1825)	BT, CR, TR, MM, OT, MT, MD; DB
222	5365 Ro	K. & R. 10204	<i>Xestia baja</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD
223	5379 Ro	K. & R. 10228	<i>Naenia typica</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
224	5423 Ro	K. & R. 10346	<i>Agrotis epsilon</i> Hufnagel, 1766 (sin. <i>A. suffusa</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD; DB
225	5427 Ro	K. & R. 10351	<i>Agrotis segetum</i> Denis&Schiffermüller, 1775	BT, CR, TR, MM, OT, MT, MD; DB
			FAMILY LYMANTRIIDAE (5438 RO, K. & R. 10373)	VU
226	5456 Ro	K. & R. 10397	<i>Orgyia antiqua</i> Linnaeus, 1758 (sin. <i>O. gonostigma</i> Scopoli, 1763)	BT, CR, TR, MM, OT, MT, MD; DB
227	5460 Ro	K. & R. 10406	<i>Euproctis similis</i> Fuessly, 1775 (sin. <i>E. auriflua</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD; DB
228	5468 Ro	K. & R.10416	<i>Arctornis l-nigrum</i> l-nigrum Müller, 1764	BT, CR, TR, MM, OT, MT, MD; DB
			FAMILY ARCTIIDAE (5498 RO, K. & R. 10461)	NT
229	5505 Ro	K. & R. 10475	<i>Miltocrista miniata</i> Forster, 1771	BT, CR, TR, MM, OT, MT, MD; DB
230	5507 Ro	K. & R. 10477	<i>Cybosia mesomella</i> Linnaeus, 1758 (sin. <i>C. eborina</i> Denis&Schiffermüller, 1775)	BT, CR, TR, MM, OT, MT, MD
231	5512 Ro	K. & R. 10483	<i>Atolmis rubricollis</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
232	5518 Ro	K. & R. 10489	<i>Eilema lurideola</i> Zincken, 1817	BT, CR, TR, MM, MT, MD
233	5519 Ro	K. & R. 10490	<i>Eilema complana</i> Linnaeus, 1758 (,) (sin. <i>E. balcanica</i> Daniel, 1939)	BT, CR, TR, MM, OT, MT, MD; DB
234	5525 Ro	K. & R. 10499	<i>Eilema sororcula</i> Hufnagel, 1766 (sin. <i>E. aureola</i> Hübner, [1803])	BT, CR, TR, MM, OT, MT, MD; DB
235	5527 Ro	K. & R. 10509	<i>Setina irrorella</i> Linnaeus, 1758	BT, CR, TR, OT, MT, MD
236	5531 Ro	K. & R. 10517	<i>Amata phegea</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
237	5552 Ro	K. & R. 10552	<i>Phragmatobia caesarea</i> Göeze, 1781 (sin. <i>Phragmatobia caesarea</i> Göeze, 1781)	BT, CR, TR, MM, OT, MT, MD; DB

238	5559 Ro	K. & R.	<i>Spilosoma menthastris</i> Denis&Schiffermüller, 1775 (sin. <i>S. lubricipeda</i> Linnaeus, 1758)	BT, CR, TR, MM, OT, MT, MD; DB
239	5564 Ro	K. &	<i>Diaphora mendica</i> Clerck, 1759	BT, CR, TR, MM, OT, MT, MD; DB
		R.10572	(sin. <i>Spilosoma</i> m. Clerck, 1759, <i>Cycnia</i> m. Clerck, 1759)	
240	5568 Ro	K. & R.	<i>Rhyptaria purpurata</i> Linnaeus, 1758 (, sin. <i>R. purpurea</i> Linnaeus, 1758)	BT, CR, TR, MM, MT, MD; DB
241	5572 Ro	K. & R.	<i>Diacrisia sannio</i> Linnaeus, 1758	BT, CR, TR, MM, OT, MT, MD; DB
		10583	(sin. <i>D. russula</i> Linnaeus, 1758, <i>D. vulpinaria</i> Linnaeus, 1758)	
242	5576 Ro	K. & R.	<i>Pericallia matronula</i> Linnaeus, 1758	CR, TR, MT, MD
		10595		VU
243	5584 Ro	K. & R.	<i>Euplagia quadripunctaria</i> Poda, 1761	BT, CR, TR, MM, OT, MT, MD; DB
		10605	(sin. <i>Euplagia hera</i> Linnaeus, 1767)	

*Corresponding serial number from the catalog of butterfly species Romania (Rákosy L., Goia M., Kovács Z., 2003)

** Classification and nomenclature proposed by (Karsholt O., Razowski J., 1996)

Abbreviations: Lepidoptera Collection in Transylvania: Daniel Czekelius (DC), Eugen Worell (EW), Viktor Weindel (VW), Heinrich von Hann Hannenheim (HH), Rolf Weyrauch (RW), CR- Critically endangered, EN- Endangered, VU-Vulnerable, NT-Near threatened, DD -Data deficient, BT-Banat, CR-Crișana, TR-Transilvania, MM-Maramureș, OT-Olt, MT-Muntenia, MD-Moldova, DR-Dobrogea.

DISCUSSION

The researched area, "Dumbrava Sibiului" Forest, includes biocoenosis of semi-natural environments (meadows, pastures, forest edges) and artificial environments (agricultural crops, fruit trees). An important factor in the distribution and structure of the Lepidoptera fauna is also the presence of pollution sources, roads crossing the forest, providing access to the neighboring towns (Cisnadioara, Rasinari Poplaca, Sibiu).

Also, over time and depending on the agroforestry-pastoral interests, there were performed tree cutting works, the surrounding areas being converted into agricultural lands [1-3]. Due to the accelerated urbanization, the construction of a residential neighborhood behind the Hilton Hotel in the forest area has led to the degradation of the biotope; many species that were collected in the past and that exist in the collections mentioned in this paper were not reported in my samplings.

Sibiu County contains some of the earliest information on butterflies in Romania [58, 59] in 1850, Karl Fuss publishes the first Lepidoptera checklist of Transylvania [57] and lays the foundation, along with Michael Fuss, Eduard Bielz, Ludwig Neugeboren and other naturalists, of the Transylvanian Society for Natural Sciences (Siebenbürgische Verein für Naturwissenschaften zu Hermannstadt) [30, 31].

The specificity of forest, its important mediogene function and that of biodiversity conservation are the main reasons based on which it has been declared a natural park in 1994. This decision has also been based on the results of the research performed in "Dumbrava Sibiului" Forest on various groups of insects [4, 5].

Comparing the number of 243 identified species to the 5.586 existing species in Romania we can say that the species collected in "Dumbrava Sibiului" Forest represent 4.35% of the total species in our country.

Considering that the samplings in the area continue, the systematic list is expected to be significantly expanded in the future years. At the same time, the

focus will be on reporting any changes in the structure of Lepidoptera population [12, 13].

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