

Skippers, Butterflies and a Harvester Moth recorded on the Greek island of Sími, late April 2010 (Lepidoptera: Hesperioidea, Papilionoidea, Zygaenidae)

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Abstract. The results of two days' collecting on the Greek Island of Sími are being presented together with an account of the island's previous lepidopterological records. *Gegenes pumilio* and *Nymphalis polychloros* are reported from Sími for the first time and *Jordanita anatolica* is reported as new to the Greek fauna. Moreover, unusual FW upperside and HW underside colour features in male *Satyrium ilicis* are being presented and discussed.

Samenvatting. Vlinders waargenomen op het Griekse eiland Sími einde april 2010 (Lepidoptera: Hesperioidea, Papilionoidea, Zygaenidae)

De resultaten van een tweedaagse trip naar het Griekse eiland Sími worden opgesomd samen met een verslag van de reeds bekende vlindersoorten van dit eiland. *Gegenes pumilio* en *Nymphalis polychloros* worden voor het eerst van Sími vermeld en *Jordanita anatolica* is nieuw voor de Griekse fauna. Verder worden ongewone kleurvormen op de bovenkant van de voorvleugels en de onderkant van de achtervleugels bij het maantje van *Satyrium ilicis* voorgesteld en besproken.

Résumé. Des papillons observés sur l'île grecque de Sími, fin avril 2010 (Lepidoptera: Hesperioidea, Papilionoidea, Zygaenidae)

Les résultats d'une excursion de deux jours sur l'île grecque de Sími, fin avril 2010 sont présentés, en y ajoutant des informations sur les espèces déjà connues de cette île. *Gegenes pumilio* et *Nymphalis polychloros* sont mentionnés pour la première fois de Sími; *Jordanita anatolica* est une espèce nouvelle pour la Grèce. De plus, des aberrations dans les couleurs du dessus des ailes antérieures et du dessous des ailes postérieures du mâle de *Satyrium ilicis* sont présentées et discutées.

Key words: Lepidoptera – Hesperioidea – Papilionoidea – Zygaenidae – *Syrichtus tessellum* – *Gegenes pumilio* – *Nymphalis polychloros* – *Satyrium ilicis* – *Jordanita anatolica* – Greece – Aegean – Sími Island – Faunistics

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Introduction

An account of the island's geography and geology is given by Olivier (1991), thus making it unnecessary to provide this information again. During our own two day stay on the island, April 23rd and 24th, 2010, we were able to repeat a number of the older published Lepidoptera records, as well as to add two records new to the island and one new to Greece. Sími's Lepidoptera were investigated at altitudes ranging from sea level to the island's highest peak, located at an elevation of about 600m.

List of species recorded by us

(Species new to Sími or Greece in bold lettering)

1. *Syrichtus tessellum* (Hübner, [1803]). A large number of both males and females was captured, and many more seen, at altitudes ranging from 400 to about 600 m. The skipper was always flying in the vicinity of an abounding yellow flowered *Phlomis*, being used both as a nectar source, as well as, presumably, a larval host-plant. The butterfly is on average a little smaller than its mainland Greek counterpart, and somewhat lighter coloured on HW underside. Its male genitalia (Figs 5–7) differ from those of the mainland population (Figs 1–4) by the somewhat heavier valval cuiller, as well as by the greater length of the cuiller's dorso-proximal spine [for anatomical terms see Higgins (1975)], but are similar to those of specimens from the Near East (Fig. 8). Out of the 60 or so secured specimens a single female has the HW upperside completely devoid of light spots, being dark throughout; a similar looking male previously recorded and figured by Olivier (1991).

2. *Thymelicus sylvestris* (Poda, 1761). A small number of males captured near sea level. Previously recorded by Olivier (1991).

3. *Gegenes pumilio* (Hoffmansegg, 1804). **New to Sími**. A single female captured at Pédi, near sea level. Determination based on wing colour and confirmed by genitalia. (Description of *Gegenes* female genitalia in press).

4. *Iphiclides podalirius* (Linnaeus, 1758). Three observed at altitudes ranging from sea level to 300 m. Previously recorded by Koutsaftikis (1974) and Olivier (1991).

5. *Pieris brassicae* (Linnaeus, 1758). A few observed at sea level and one at about 600 m. Previously recorded by Koutsaftikis (1974) and Olivier (1991).

6. *Colias crocea* (Fourcroy, 1785). A small number observed at sea level and a few others at about 300 m. Previously recorded by Koutsaftikis (1974).

7. *Satyrium ilicis* (Esper, [1779]). A few males captured near sea level, all of which exhibit discal orange-tawny scaling on FW upperside, expressed either as mere traces, or as a clear-cut patch (Figs 9, 10). Similar male specimens (f. *cerri*) commonly occur in Spain (Manley & Allcard 1970, Gómez-Bustillo & Fernández-Rubio 1974), often in south France (Lafranchis 2000), and less often in N Italy (Verity 1943), but so far have never been recorded from either mainland Greece, or any other Greek island on which *S. ilicis* is known to occur. Another item of interest is that in S1c of HW underside, and just distad of orange lunule, the butterflies have macroscopically evident silver-blue scaling (Fig. 11), a feature that is absent in specimens from other parts of Greece. Turkish specimens also carry this silver-blue scaling on a regular basis, but apparently lack the orange-brown scaling on male FW upperside (Hesselbarth *et al.* 1995). Previously recorded by Thomson (1985).

8. *Lycaena phlaeas* (Linnaeus, 1761). One second brood male captured at sea level. Previously recorded by Olivier (1991).

9. *Vanessa atalanta* (Linnaeus, 1758). A few observed at all altitudes. Previously recorded by Koutsaftikis (1974).

10. *Vanessa cardui* (Linnaeus, 1758). A few observed at all altitudes. Previously recorded by Koutsaftikis (1974).

11. *Nymphalis polychloros* (Linnaeus, 1758). **New to Sími.** Two fresh ones recorded, one at sea level in a lush, rather well watered locality, and the other at about 500 m, within a rather extensive, natural forest of the spreading form of *Cupressus sempervirens* L.

12. *Maniola telmessia* (Zeller, 1847). Found in great numbers, mostly at low levels. All but a few captures were fresh males, the bulk of females having not quite yet made their appearance. Previously recorded by Turati (1929), Koutsaftikis (1974), Thomson (1985) and Olivier (1991).

13. *Jordanita anatolica* (Naufock, 1929). **New to Greece.** A single male recorded at Pédi, near sea level. Identification based on genitalia (Figs 12–14). The occurrence of this species on the island was not unexpected, as it is common and widespread in much of the Near East, including Turkey's southern coasts, parts of which are only a few miles away from Sími. Previously not reported from Greece (Coutsis 1976; Efetov & Tarmann 1999; Nauman, Tarmann & Tremewan 1999; Efetov 2001).

Previous published records by others, but missed by present authors

1. *Syrichthus proto* (Ochsenheimer, 1808). Recorded by Thomson (1985).

2. *Zerynthia cerisy* (Godart, [1824]). Recorded by Koutsaftikis (1974), Ondrias, Koutsaftikis & Douma-Petridou (1979) and Olivier (1991).

3. *Papilio machaon* Linnaeus, 1758. Recorded by Koutsaftikis (1974).

4. *Pieris rapae* (Linnaeus, 1758). Recorded by Koutsaftikis (1974), and Olivier (1991).

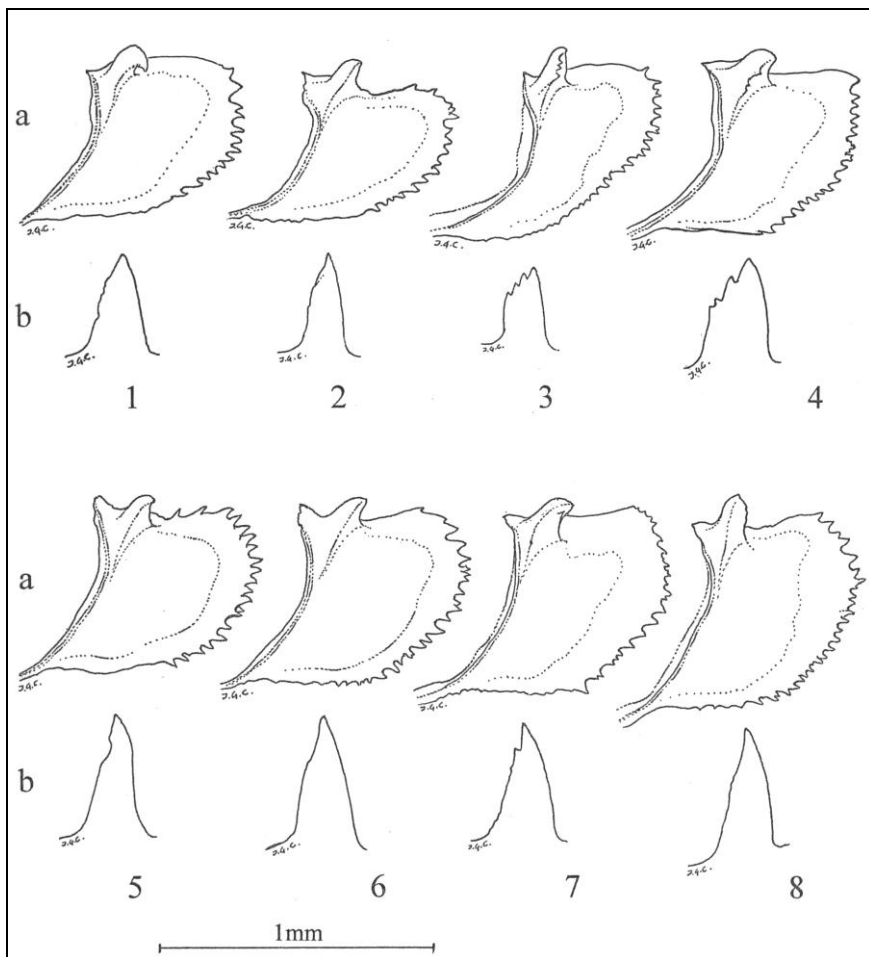
5. *Leptotes pirithous* (Linnaeus, 1767). Recorded by Koutsaftikis (1974).

6. *Hipparchia fatua* (Freyer, [1845]). Recorded by Turati (1929).

7. *Ypthima asterope* (Klug, 1832). Recorded by Koutsaftikis (1974), and Olivier (1991).

8. *Lasiommata megera* (Linnaeus, 1767). Recorded by Thomson (1985).

9. *Lasiommata maera* (Linnaeus, 1758). Recorded by Thomson (1985), and Olivier (1991).



Figs 1–8. Male genitalia components of *Syrictus tessellum*. **a.**– Lateral aspect of inner face of cuiller. **b.**– Lateral aspect of dorsal spine of cuiller. **1–7.**– Greece. **1–3.**– Makedonía. **1.**– Halkidiki, Mt. Holomón, 800 m, 24.vi.1976. **2, 3.**– Mt. Ólimbos. **2.**– 1000 m, 11.vi.1966. **3.**– 800 m, 28.vi.1970. **4.**– Thessalía, Mt. Pílio, 1000 m, 28.vi.1978. **5–7.**– Sími Island, 500–560 m, 24.iv.2010. **8.**– Israel, N of Dishon, 700 m, 19.iv.1975.



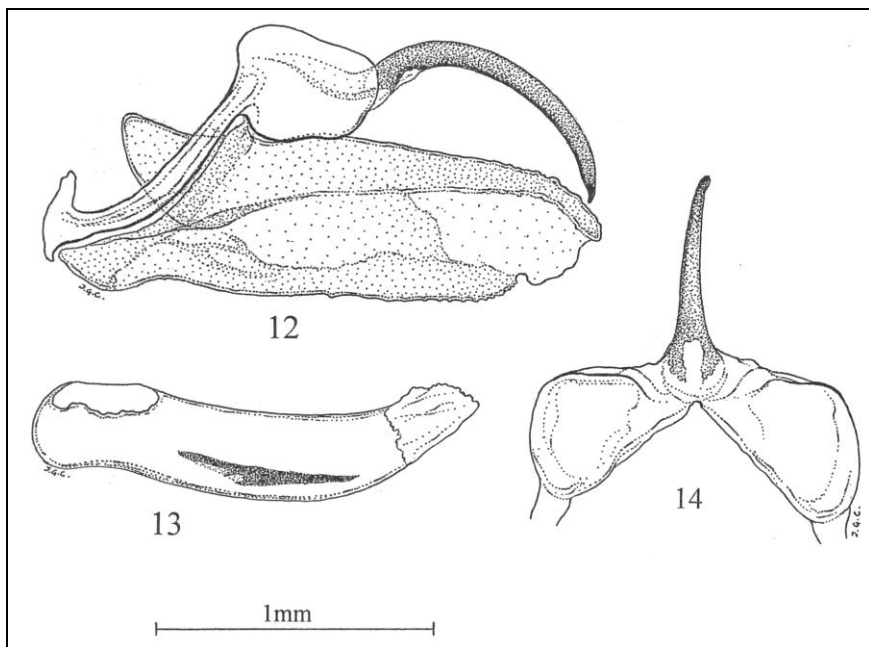
Figs 9-11. Male *Satyrium ilicis* from Greece, Sími Island, Pédi, near sea level, 24.iv.2010. **9, 10.**– Upperside. **11.**– Underside. **9.**– White spot near HW anal angle due to dried abdominal fluid. Scale bar equal to 1 cm.

A hitherto unpublished record

1. *Carcharodus stauderi* Reverdin, 1913. A single male – identified as such by genitalia – originally from the Olivier collection and presently deposited in the collection of Nick Ghalvalas, Athens, Greece, bears the following data: Sími Island, Greece, 50 m, 2.vi.1993, leg. Alain Olivier. This specimen was given personally and directly by Olivier to Ghalvalas and its data are of unquestionable validity. So far as we are able to tell, this is the first time that this record is being published.

Discussion

Our own original plans were to look primarily for *Z. cerisy* and *Y. asterope*, but both were quite over by the time of our visit, due to an exceptionally early emergence caused by a very mild winter. Fortunately we were on time for *S. tessellum*, which was to us the third species of primary interest.



Figs. 12–14. Male genitalia components of *Jordanita anatolica*, Greece, Sími Island, vicinity of Pédi, near sea level, 24.iv.2010. **12.**– Left side aspect of genitalia, with left valva and aedeagus removed. **13.**– Left side aspect of aedeagus. **14.**– Dorsal aspect of tegumen and uncus.

The total number of hitherto recorded Hesperioidea and Papilionoidea from Sími Island amounts to 22 species, while just one single member of the Zygaenidae family has so far been found there.

It is of interest to note that common spring species, such as *Euchloe ausonia* (Hübner, [1804]), *Callophrys rubi* (Linnaeus, 1758) and *Glaucopsyche alexis* (Poda, 1761), still remain unrecorded on Sími Island. In the case of the former butterfly in particular, which is widespread and common throughout Greece and most of its islands, its absence remains puzzling, but could conceivably be attributed to the scarcity or lack of larval host plants (Cruciferae: *Isatis*, *Sinapis*, *Aethionema*, *Iberis*, *Biscutella*, etc.), none of which were observed on Sími by the present authors.

Despite the paucity of species found on the island, we believe that it is still a place calling for further lepidopterological investigation; species such as *Carcharodus orientalis* Reverdin, 1913, *Thymelicus hyrax* (Lederer, 1861), *Gegenes nostrodamus* (Fabricius, 1793) and *Pelopidas thrax* (Hübner, [1821]) stand a good chance of eventually being found on the island, making future collecting a worthwhile endeavour.

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