NYCTERIGLYPHITES PENNSYLVANICUS n.g., n. sp. (Acari, Astigmata) FROM THE GUANO OF MYOTIS LUCIFUGUS, IN USA (1)

by A. FAIN (2), F.S. LUKOSCHUS (3) and J.O. WHITAKER (4)

The new species of mite described here was abundant in the guano of *Myotis lucifugus*, from a house in Entriken, Huntingdon Co., Pennsylvania, U.S.A It belongs to a new genus *Nycteriglyphites* (Rosensteiniidae, Nycteriglyphinae).

Genus **Nycteriglyphites** n. gen.

Definition : With the characters of the Nycteriglyphinae. Cuticle striated and scaly. A small median punctate propodonotal plate is present. Epimeres I in the female fused in a V or a Y with very short base and united behind to the epigynium. Dorsal setae modified : asymmetrical, flattened, more or less expanded apically and bearing very small teeth. Tarsi I-II with 3 apicoventral spines. There is only one solenidion on genu 1. In the female there are 5 pairs of anal setae, in the male 2 pairs. The copulatory tube in female is ventral, preterminal. Posterior extremity without a pair of very long simple setae (*l 5*), but with only short and barbed setae. Setae *d 5* lacking.

Type species : *Nycteriglyphites pennsylvanicus* n. sp.

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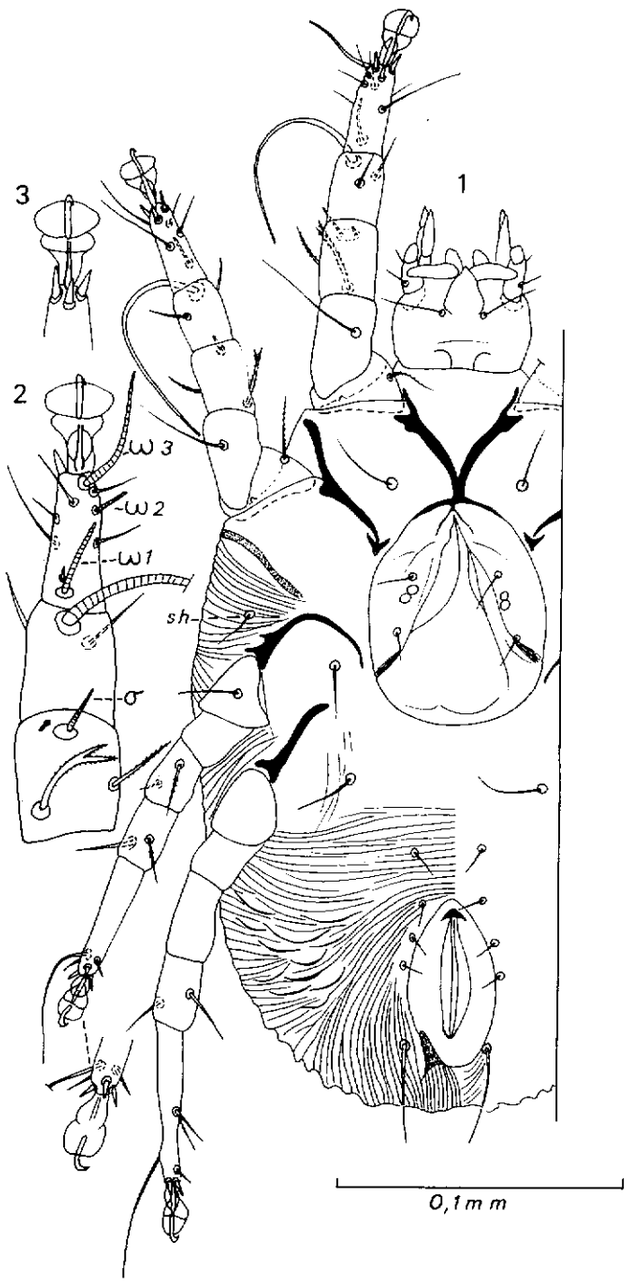

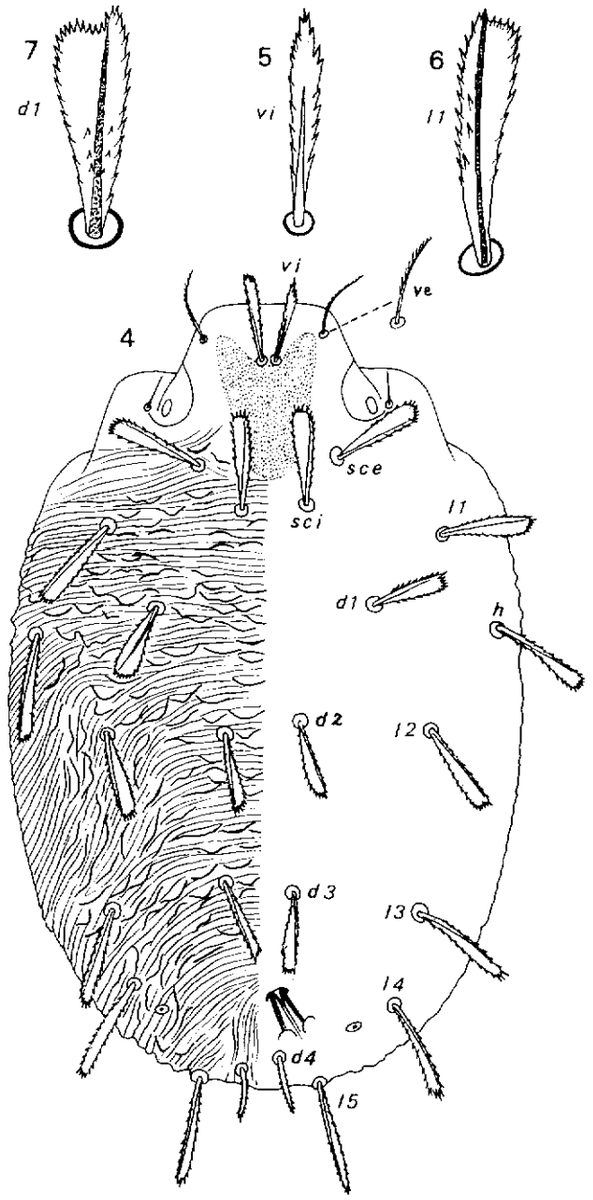

FIG. 1-7. — *Nycteriglyphites pennsylvanicus* n. sp. Female : -1, in ventral view ; -2, leg I dorsally ; -3, apex of tarsus I ventrally ; -4, female in dorsal view ; 5-7, setae of dorsum.

Remark : This genus differs from the other genera in the Nycteriglyphinae by the following combination of characters : presence of one solenidion on genu I, absence of setae *d 5*, absence of a pair of long simple setae (*l 5*) at posterior extremity, these setae being replaced by short, flattened and toothed setae. By the absence of long *l 5* setae this genus resembles *Nycteriglyphoides* Fain, 1968 ; however, in this genus there are 2 solenidia on genu I, the tarsi bear many more setae and in the male the genital organ is strongly displaced anteriorly.

Nycteriglyphites pennsylvanicus n. sp.

Female (figs. 1-7) : Idiosoma in the holotype 270 µ long and 175 µ wide (maximum). In 3 paratypes these measurements are 300 × 183 µ, 290 × 180 µ and 265 × 170 µ. *Dorsum* : Cuticle with irregular transverse striations forming numerous scales except in two areas : the propodonotum which bears a small, slightly punctate plate and the posteromedian part of the hysteronotum which only bears very thin non-scaly striations. All dorsal setae, except *v e* and *d 4* flattened, asymmetrical and denticulate. Setae *v e* very thin and shortly barbed in their apical two thirds ; setae *d 4* thick, more or less cylindrical and shortly barbed. *Venter :* Epimeres fused in a V (or in a Y with a very short sternum) fused behind to the epigynium, other epimeres free. Opisthogaster with irregular striations mostly transverse, and with scales laterally. There is a narrowly conical ventral and subterminal copulatory papilla 20 µ long.

Chaetotaxy of idiosoma : Dorsal setae measuring 20 to 42 µ long. Setae *v i, v e, sc e, sc i, l 1 to l 5, d 1 to d 4, h, sh. cx I. cx III, sc x. ga, gm. gp, a 1* to *a 5* present. The *d 5* is lacking. The *l 5* is thick, barbed and relatively short (42 µ). The *a 5* is distinctly longer (21 µ) than the other anals. Gnathosoma moderately developed with a pair of ventral poorly developed membranous lobes. *Legs* relatively long. Tarsus I with 5 very thin and short setae and 3 apico-ventral spines. Tarsus II similar to I but with only 4 thin setae. Tarsi III-IV with 3 simple setae and 3 apical spines. Tibiae with 2-2-1-1 setae. Genua 2-2-1-0 setae. The dorsal setae of genua I-II are barbed and forked apically. *Solenidiotaxy :* Tarsus I with *ω 1* narrow ; the *ώ 2* is narrow, short

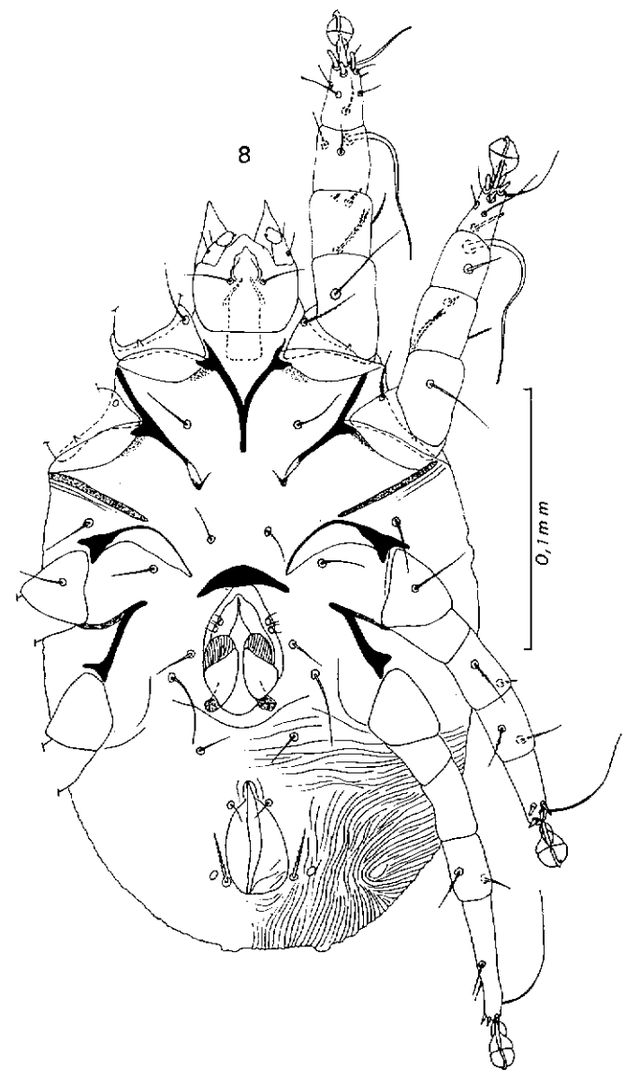

FIG. 8. — *Nycteriglyphites pennsylvanicus* n. sp. Male in ventral view.

and close to the apex ; *ω 3* is subapical. thicker and long. Tibial solenidia I-II long ; those of tibiae III-IV short. Genu I with only one, short solenidion.

Male (fig. 8) : Allotype 260 μ long and 162 μ wide (maximum). *Dorsum* : Cuticle and setae as in female except that the posteromedian area of opisthonotum bears a few scales. *Venter* : Epimeres I fused in Y with a sternum 15 μ long. Thick epigynium present. Sex organ situated between coxae IV. There are 3 pairs of anal setae, the posterior pair slightly barbed and 21 μ long. Legs as in the female but slightly thicker, especially legs I-II.

Tritonymph : Length of idiosoma 250 μ, width 160 μ. Dorsum as in female but with less cuticular scales and narrower setae. Venter as in female except that the vulva and the copulatory tube are absent and there are only 3 pairs of anal setae. Epimeres very sclerotized. Epimeres I fused in a sternum.

Protonymph : Length 180 μ, width 120 μ. Dorsal cuticle and setae as in tritonymph. Venter as in tritonymph except that there is only one pair of genital suckers and trochanters I-III are devoid of setae. Solenidion *ω 3*, which is generally lacking in the protonymphs of the Astigmata. is present here.

Habitat : Holotype female from the guano of *Myotis lucifugus*. from Entriken. Huntingdon Co., Pennsylvania. U.S.A. 26 July 1981. Paratypes 39 females, 20 males. 7 nymphs, from the same habitat. Holotype in U.S.N. Museum, Washington. D.C.

Acknowledgements

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Abstract

Nycteriglyphites pennsylvanicus n.g., n.sp. (Acari, Astigmata) is described from the guano of *Myotis lucifugus,* in U.S.A.

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ONYCHOGOMPHUS UNCATUS (CHARPENTIER, 1840) (Odonata, Gomphidae), A NEW SPECIES FOR THE BELGIAN FAUNA*

by K. MARTENS**

Discussion

In the Odonata-collection of the State Faculty of Agronomical Sciences, Gembloux, a male of *Onychogomphus uncatus,* recorded from Roisin, Belgium, was found. The specimen was collected on 20.06.1979 by Mr. Ph. Brohez, who kindly forwarded me detailed information on the capture site. The male was captured near the edge of an artificial fishpond, situated in the centre of the village, about one km from the French border.

I visited this site on 02.06.1981, but no other specimens were found. It appeared, however, that a small streamlet runs from the French border towards the fishpond. This may have been the dispersing pathway of the specimen, if not the site where a small population of the species was established. At the moment of my visit, however, the streamlet was heavely polluted, probably by herbicides and fertilizers, and no dragonflies at all were seen. Through the information of Mr. Brohez, we can be certain that the specimen was captured on Belgian territory.

Although this is the first authentic Belgian capture of *Onychogomphus uncatus,* former records had made it very likely that the species would occur in Belgium. Two males were collected in August 1967 at Fampoux, valley of the river Scorpe, Pas-de-Calais, France (CAMMAERTS, 1979), which is very close to the Belgian border. The same author also mentions a female of the species,

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