FAUNA BURUANA

MICROLEPIDOPTERA III

by

A. DIAKONOFF, F.R.E.S.

(Zoölogisch Museum, Buitenzorg, Java)

This is the third account of the material of Microlepidoptera collected by Dr L. J. Toxopeus during the Buru Expedition 1921. Two previous papers appeared in this periodical vol. 18, pp. 213 — 216, 1941 and vol. 19, pp. 197 — 219, 1948.

ALUCITIDAE

Deuterocopus alopecodes MEYR. 1911.

Deuterocopus alopecodes MEYRICK, Journ. Bomb. Nat. Hist. Soc. 21: 105-106. Lepid. Catal. 17: 9, 1913. Ann. Transv. Mus. 8: 49, 1921. FLETCHER, Mem. Dept. Agr. Ind., Ent. 6: 16, 1921. Catal. Ind. Ins. 20: 16, 1931.

India, larva on Vitis sp.; Rhodesia.

Station 1, 1.I.1922. 1 ♀.

Sphenarches caffer (ZELL.) 1852.

Oxyptilus caffer Zeller, Linn, Ent. 6: 348-349.

Oxyptilus anisodactylus Walker 1864, List Lep. Het. B.M. 30: 934 - 935.

Pterophorus diffusalis Walker 1864, t.c.: 945.

Oxyptilus direptalis WALKER 1864 (nec WALKER), t.c.: 934 (= specimen b).

Oxyptilus walkeri Walsingham 1881, Trans. Ent. Soc. Lond. 1881: 279-280.

Sphenarches synophrys MEYRICK 1886, l.c. 1886: 17-18.

Sphenarches caffer, MEYRICK, l.c. 1887: 268. Gener. Ins. 100: 6, f. 3, 1910. Lepid. Catal. 17: 5, 1913. Ins. Samoa 3: 68-69, 1927. Trans. Ent. Soc. Lond. 87: 503, 1938. Hering, Stett. Ent. Ztg. 64: 96, 1903. Fletcher, Mem. Agr. Ind., Ent. 6: 9-13, pl. 2, 1921. Catal. Ind. Ins. 20: 10-11, 1931. Imper. Counc. Agr. Res. Sci. Mon. 2: 3-4, 1939 (Additional literature other than concerning records from the Malay Archipelago is omitted).

Circumtropical. In the Malay Archipelago recorded from Java, Sumatra, Tenimbar I., New Guinea.

Station 9, 19.V.1921. 1 d.

Alucita niveodactyla PAG. 1900.

Alucita niveodactyla PAGENSTECHER, Zoologica 29: 240. MEYRICK, Trans. Ent. Soc. Lond. 1907: 490, 1908. Gener. Ins. 100: 13, 1910. Catal. Lepid. 17: 17, 1913. Trans.

Ent. Soc. Lond. 87: 504, 1938. FLETCHER, Spol. Zeylan. 6: 36, pl. F, f. 9 (larva), 1909. Mem. Ind. Agric., Ent. 6: 30, 1921. Catal. Ind. Ins. 20: 53-54, 1931. Imper. Counc. Agr. Res. Sci. Mon. 2: 11, 1939. POULTON, Proc. Ent. Soc. Lond. 1909: 39-40, 1909. Corbett & Gates, Dept. Agric. Fed. Mal. St. Bull. 38: 11, 1926.

Aciptilia nivea Snellen 1903, Tijdschr. Ent. 46: 56, pl. 5, f. 17.

Aciptilus leucodactylus Walker (part.), Fletcher, Trans. Ent. Soc. Lond. 1925: 628, 1926.

India, Ceylon, Assam, Cochin China, Philippines, Solomon Is., Australia, Bismarck Is., New Guinea, Malaya, Borneo, Sumatra, Java. Larva on leaves of *Ipomoea*.

Station 4, IV; Station 9, 12.V., 16.V.; Station 13, 30.VIII. 3 of, 3 Q

Adaina montivola MEYR, 1937.

Adaina montivola MEYRICK, Iris 51: 170. Yunnan.

Station 13, 30.VIII. 2 .

Steganodactyla concursa WALS. 1891.

Steganodactyla concursa Walsingham, Ent. M. Mag. 27: 241-242, Novit. Lep. 1: 3, pl. 12, ff. 3, 3a, 3b. Hering, Stett. Ent. Ztg. 64: 96, 1903. Fletcher, Spol. Zeylan. 6: 9-10, pl. E, ff. 1, 2, 1909. Ind. Agr. Dept. Bull. 89: 81, note 183, 1919. Mem. Agr. Ind., Ent. 6: 30-31, 1921. Catal. Ind. Ins. 20: 55, 1931.

Ochyrotica concursa, MEYRICK, Gener. Ins. 100: 20, 1910. Lepid. Catal. 17: 31, 1913.

Ceylon, S. India, Sumatra, Philippines, Tonkin, Comoro Is., Mauritius.

Station 9, 2.V, 16.V. 2 ...

EUCOSMIDAE

Procoronis swinhoeana (WALS.) 1890.

Grapholitha (Semasia) swinhoeana Walsingham, Trans. Ent. Soc. Lond. 1890: 294, pl. 8, f. 19.

Procoronis rhotias MEYRICK 1911, Proc. Linn. Soc. N.S. Wales 34, 251 - 252.

Procoronis swinhoeana, MEYRICK's notes.

Burma, Moluccas, New Guinea, Solomon Is., Fiji.

Station A, 30.VI, 25.XI. 1 $_{\circlearrowleft}$, 1 $_{\circlearrowleft}$. Basal segment of palpus in both sexes possesses a triangular tuft of appressed scales beneath, omitted in the descriptions of previous authors. Walsingham's statement that the cell in hind wing is not closed is erroneous. A very variable species as to colouring and markings; the semioval brown spot on upper angle of cell and the crescentic mark on lower angle are typical and mostly present.

Tegumen rounded, arms narrow. Uncus rigid, bifid, densely haired, points curved. Socii long, pending hairy pads. Gnathos tortricoid, robust, unpaired, point rising. Transtilla paired, two slightly curved projections. Valva narrow, cucullus elongate, with strong bristles and some spikes towards base below; sacculus angular, weakly bristled. Anellus strong. Vinculum short, triangular. Aedoeagus straight, rather long, chitinous. Cornuti a patch of spines (broken in our specimen). A slender strong rod connects base of aedoeagus with top of gnathos (Slide No. 1009 D).

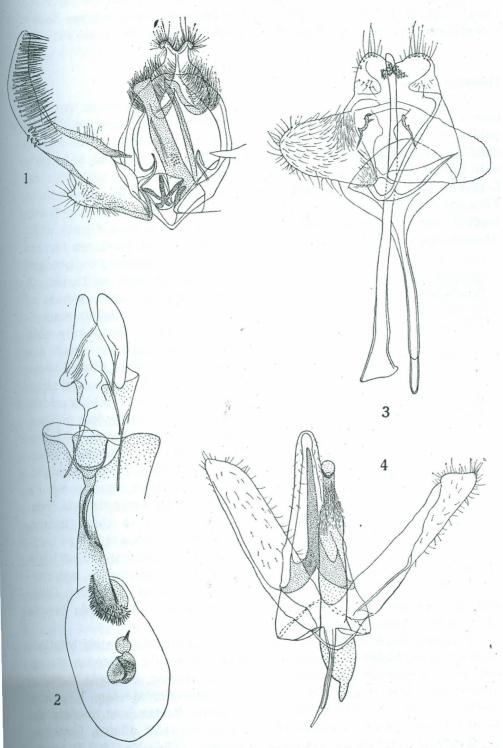


Fig. 1. Genitalia of Procoronis swinhoeana (WALS.), &; Fig. 2. Q. Fig. 3. Genitalia of Eucricostoma lanosa g.n. sp. n., &. Fig. 4. Genitalia of Tinea innocens sp. n., &.

Ostium cup-shaped. Colliculum short. Cestum a narrow spiraled band, much dilated, densely spinose below. Signa inequal: a large hollow compressed tooth and a much smaller curved short spine (Slide No 1010 D).

OECOPHORIDAE

Dolosaphes quadriscripta spec. nov.

Q 7 mm. Head pale ochreous, vertex mixed with brownish. Antenna over 1/2, serrulate, simple; pale ochreous faintly ringed brownish. Palpus pale ochreous, minute brownish dots: at apex of median segment and on middle of terminal segment. Thorax pale ochreous, suffused anteriorly with brownish. Abdomen swollen, greyish; broadly banded with fuscous. Legs pale ochreous, anterior leg infuscated above except on articulations. Fore wing elongate-ovate, costa gently curved throughout, apex obtusely pointed, termen rounded, moderately oblique; vein 7 to apex. Glossy whitish-ochreous, sparsely strewn with fine brownish points, markings formed

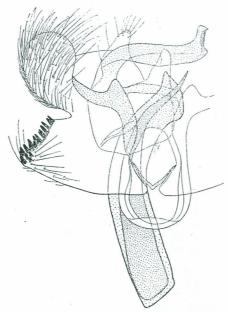


Fig. 5. Male genitalia of Dolosaphes quadriscripta sp. n.

by brownish irroration, faintly edged with golden-ochreous suffusion. A suffused triangular spot on base of costa, anterior edge slightly emarginate; two moderate outwardly oblique transverse streaks: first one from beyond 3/4, of costa, dilated above and connected with basal spot along wing edge, below not reaching middle of dorsum; second one less oblique. broader, from 2/3 of costa to below lower angle of cell, triangularly dilated on costa, anterior edge straight. posterior moderately concave; a more suffused and narrower strigula from costa before apex to above tornus. thence curved to dorsum before tornus; a terminal interrupted strigula from apex to above tornus, not connected with base of preceding, Cilia

whitish-ochreous with golden gloss, opposite apex and towards tornus mixed with brown except on base.

Tegumen small, short. Uncus rather weak, blunt, moderately bristled. Gnathos strong, hook pending, top curved. Transtilla a slender strong rod. Valva broad at base, cucullus separate, clavate, bristled; sacculus with triangularly projecting, bristled and short-dentate top. Vinculum moderate, ovate. Anellus indefinite. Aedoeagus rather long, moderately narrowed and curved towards apex, orifice abruptly dilated. Cornutus apparently a very large spike, dilated proximad (Slide No. 1007 D, type).

Station 9, 12.VI. 1 specimen. This small insect agrees with the description of the genus *Dolosaphes*, except for the termination of vein 7 to apex (instead of to termen) and for shorter antennae. We place it here, pending further evidence.

TINEIDAE

Eucricostoma gen. nov.

 $ε\dot{v} = \text{true}, \, \varkappa \varrho \acute{\iota} \varkappa ο \varsigma = \text{hook}, \, \sigma \iota \acute{\circ} \mu \alpha = \text{mouth}.$

Head densely rough-haired, side-tufts rising. Ocellus posterior. Proboscis rudimentary. Antenna? (tips broken), somewhat thickened in o, serrulate, short-ciliated, scape moderately elongate, with strong pecten. Labial palpus long, subascending, strongly curved and directed laterad (much diverging), median segment strongly laterally compressed, with dense appressed scales forming a thick, slightly roughish, long fringe below, becoming longer towards apex, without setae, terminal segment ½, ovate, obtuse, strongly compressed. Thorax without crest. Anterior leg: coxa elongate, flattened dorso-ventrally, tibia short, thickened with hairs,

tarsus thickened with hairs throughout; median tibia thickened with dense long appressed hairs; posterior tibia thickened, with appressed scales above, with long bristly projecting scales beneath, tarsus with basal half roughly haired above, median and posterior tarsi with short bristly scales at apices of joints. Fore wing with indication of raised scale-tufts, clothed with

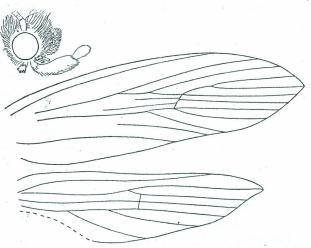


Fig. 6. Eucricostoma lanosa g.n. sp. n. Neuration and head of male (right labial palpus missing).

roughly appressed scales throughout, thickly scaled towards basal half of costa, lower surface with veins fringed with rows of scales above and beneath; lb simple, lc strong posteriorly, 2 from about $^5/_6$, 3 and 4 almost connate from angle, 7 and 8 stalked, 7 to apex, 9 about halfway towards 10 which originates from slightly beyond middle, 11 absent; cell narrow, lower and upper parting veins obliterate anteriorly, terminating above and below 5, respectively, rather weak. Hind wing under 1, elongate-lanceolate, cilia $^3/_4$, lower surface with veins fringed with scales, 2 from middle of cell, 3 from $^4/_5$, 4 from angle, 4 - 6 parallel and equidistant, 5

from middle of transverse vein, 6 from upper angle of cell, 7 from before angle, to apex, 8 straight, to well before apex.

Genotype Eucricostoma lanosa spec. nov., J.

An interesting specialised form of dubious affinity. Perhaps it belongs in the vicinity of the very heterogeneous *Eumasia* CHRÉT.

Eucricostoma lanosa spec. nov.

of 18.5 mm. Head, antenna and palpus whitish-ochreous, hair-tuft on face with two suffused fuscous spots laterally, palpus with a narrow blackish streak along upper edge of median segment. Thorax whitishochreous, suffused longitudinal tawny-ochreous streaks: one on tegula, median, becoming fainter and narrower posteriorly and two more on thorax, submedian, narrow. Abdomen hairy, whitish-ochreous. Legs whitish-ochreous, top of anterior tibia fuscous below, median tarsus dark fuscous above. Fore wing elongate-ovate, costa little curved anteriorly, more so towards apex, apex pointed, termen rounded, oblique; densely scaled towards base, posteriorly with appressed scales making roughish appearance. Whitish-ochreous, costa faintly suffused with light ochreous; base of costal edge dark fuscous; an elongate irregular subcostal spot of sparse yellowish irroration mixed with dark brown beyond middle, with two small projections below; irregular elongate longitudinal yellowish spots scattered over disc and two moderate streaks of this colour towards base: at 1/4 of disc and in fold, respectively; some dark brown irroration along lower edge of cell towards angle of latter; interrupted faint yellowish streaks along veins beyond cell, slightly mixed with brown posteriorly, this colour forming an irrorated spot on middle of termen; an irregular elongate spot of deep brown irroration on 1/3 of dorsum. Cilia whitish-ochreous, apical half opposite apex and middle of termen suffused with yellowish and slightly mixed with brown. Hind wing semipellucent glossy whitish-ochreous, cilia concolorous, duller.

Tegumen rather short, strong, fused with vinculum and forming a ring together with latter. Saccus long, slender. Uncus: two broad separate clavate lobes, bristled distally, each with a denticulate subapical knob medianly. Gnathos, transtilla absent. Valva cardinate, elongate-triangular, obtuse, bristled, base with a transverse, sinuate rim, dentate in middle. Aedoeagus very long, slender. Cornuti absent (Slide Nρ. 1008 D, type).

Station 9, medio VII. 1 specimen.

Setomorpha rutella ZELL. 1852.

Setomorpha rutella Zeller, Lepid. Micropt. Caffr.: 94-95 (For numerous synonyms and distribution cf. Diakonoff, Treubia 16: 405-408 and 413-414).

Circumtropical, in dry vegetable matter, a notorious pest in dry tobacco leaf. In the Malay Archipelago recorded from Sumatra, Java, Celebes.

Station 1, V. 1 Q.

Scardia maculosa spec. nov.

717 mm. Head and antenna greyish-fuscous, scape pale ochreous. Palpus pale ochreous, median segment with a dorsal streak and a large triangular spot on ventral tuft not reaching apex: fuscous, terminal segment with pale fuscous tip. (Abdomen missing). Legs pale ochreous densely irrorated with fuscous. Fore wing elongate-ovate, costa moderately curved towards extremities, apex obtuse, termen rounded; 7 separate, to costa just above apex, 8 and 9 stalked, from angle of cell. Glossy pale ochreous, costa narrowly whitish-ochreous; densely irrorated and dotted with fuscous, dots more or less arranged in longitudinal rows, more distinct posteriorly and along costa; these costal marks roundish to 3/4, narrowly transverse beyond this; an outwardly oblique transverse straight streak of ground colour before apex, narrowly edged anteriorly with fuscous, limiting dark fuscous small apical spot which becomes paler towards extreme apex: fuscous suffusion indicating a patch which occupies anterior half of wing and a moderate wedge-shaped costal spot at 3/5 with obtuse point strongly curved posteriorly. Cilia pale ochreous mixed with fuscous, a dark fuscous antemedian fuscia around apex and along termen, becoming interrupted towards tornus. Hind wing bronze-fuscous, basal half with purplish, apical with brassy gloss. Cilia pale whitishfuscous, a broad dark fuscous basal streak around apex.

Station 1, 18.I. 1 specimen. Nearest to S. sistrata MEYR.

Tinea innocens spec. nov.

♂ 8 mm. Head, palpus and thorax rather light greyish-fuscous. Antenna dark greyish-fuscous. Legs fuscous-whitish. Fore wing lanceolate, rather narrow, costa gently curved throughout, apex pointed, termen little curved, long, extremely oblique. Pale glossy ochreous-fuscous, irrorated with fuscous. Base of costa with a suffused blackish spot, an indication of a fuscous dot on dorsum beyond base; a short fuscous streak in middle of fold; an irregular ovate fuscous spot in middle of disc before 3/4 (on end of cell); fuscous irroration beyond cell tending to form 2-3 irregular outwardly convex transverse strigulae. Cilia pale ochreous-fuscous, glossy, mixed with a few fuscous scales. Hind wing glossy, pale greyish-fuscous. Cilia pale fuscous-ochreous.

Tegumen small, trapezoid. Uncus very long, erect-triangular. Gnathos with strong thick arms and a very long slender porrect point. Valva elongate, not dilated, simple, cardinate. Saccus slender, moderate. Aedoea-

gus long, thick, apex shaped as a narrow secondary tube. Cornuti fine spines in a dense patch, narrowed apically (Slide No. 544 D, type).

Station 9, 16.V. 1 specimen. In appearance near the common T. fuscedinella, but with σ genitalia considerably differing.

Correction

We are satisfied that the genus *Psygmomorpha* DIAK. 1948 described in the preceding part of this paper (Treubia 19: 207 - 208) as a Copromorphid must be removed from *Microlepidoptera* and transferred to the family *Arctiidae*, subfamily *Nolinae*.