Contributions towards a revision of *Myrsidea* Waterston (Mallophaga : Menoponidae). II*

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Synopsis

A new species of *Myrsidea* is described from males and females taken in New Guinea, and notes on *Trinoton stramineum* Giebel, *M. crassipes* (Piaget), *M. conspicua* (Kellogg & Chapman) and *M. bakttitar* (Ansari) include the selection of lectotypes for *M. crassipes* and *M. conspicua.*

Myrsidea pectinata sp. n.

(Pl. I, figs. 1–6; text-figs. 1–5)

Host: *Malurus alboscapulatus* Meyer

This is a distinctive species, at once recognised by the dorsal U-shaped unpigmented area on the anterior region of the head, the single long spine-like seta at each latero-posterior corner of sternite II and the flattened pleural setae; in other characters the head is typical of *Myrsidea*, as are the gular plate, the mesothorax and the number of anterior mesonotal setae (Clay, 1965).

Female and male

Number and position of head setae as in figure 1; the longer seta at end of lateroventral fringe immediately before the long ventral setae, found in *M. thoracica* (Clay, 1965, fig. 1), absent; seta 10 (penultimate dorsal marginal seta of pre-ocular region) short (see measurements). Setae of lateroventral fringe: female—9–11, mean (20) 9·95; male—9–10, mean (20) 9·9. Gular setae: female—4–7 each side, mean (20) 5·35; male—5–6, mean (20) 5·5; a short seta each side of gular plate anterior to the usual gular setae (this is not present in *thoracica*); relative lengths of sensory setae on palp approximately as in *thoracica* (Clay, 1965, fig. 1, *P*). Hypopharyngeal sclerites reduced (Pl. I, fig. 1). Pronotum with 3 + 3 long posterior marginal setae; one of the 3 short pronotal setae that usually occur together near the anterolateral corner is on lateral margin near the posterolateral corner in this species, one male and one female having an additional seta near the 2 anterior ones on one side. Prosternal plate pointed and thickened posteriorly (fig. 3). Central marginal setae of metanotum: female—4–6 each side, mean (20) 4·7; male—2–6, mean (20) 4·6. Metasternal setae: female—4–5 each side, mean (20) 4·5; male—4–6, mean (20) 5·2. Metapleural marginal setae 3 each side, in addition male having 1–4 anterior setae each side. Outer dorsal setae of first tibia: 4; setae of femoral brush: female—13–17, mean (20) 14·75; male—14–18, mean (20) 15·85. In female, posterior margins of metanotum and terga III–VI slightly convex; sternite IV modified (Pl. I, fig. 4) and posterior sternites not arched. Pleurites and lateral margins of terga I–IX in female and I–VIII in male with a pattern of strong internal thickening (Pl. I, figs. 2–3). Spermatheca large and bilobed (fig. 5). Sculpturing of genital chamber as in *M. abidae* Ansari (Clay, 1965, fig. 24). Genital sclerite of male small and lightly sclerotised (Pl. I, fig. 5).

Abdominal chaetotaxy.—Post-spiracular setae as in figures 1 and 2. Last tergum in female with 8–10 marginal setae and in male with 4–7 instead of the 2 setae found in the majority of species; male with anterior tergal setae; range and mean of tergal setae shown in Table I. Sternite I without setae; II with single stout spine-like seta at each posterolateral corner and with only 8 short setae on posterior margin; anterior setae of II: female—14–21, mean (10) 17; male—23–35, mean (10) 27·9. Sternites III–VII in female and III–VIII in male with anterior median setae; male with 8 anal and 3 terminal setae. Setae of sternites I–IX as in Table I. Pleurites II–V each with a comb of flattened setae (fig. 4); pleurite VIII with 3 setae, lengths as shown in figure 2; pleurites III–VIII in male with anterior setae.

Material examined.—21 ♂, 23 ♀ from *Malurus alboscapulatus* Meyer (Malurinae, Muscicapidae), Netherlands New Guinea: Sibil Valley, 23.x.1961 (*L. W. Quate*, BBM–NG 169–170), and 31.x.1961 (*L. W. Quate*, BBM–NG 213 and 218); Archbold Lake, 29.xi.1961 (*L. W. Quate*, BBM–NG 428); Enarotali (*N. Wilson*, BBM–NG 21298 and 21311); without further data, 2.xi.1961 (*L. W. Quate*, BBM–NG 226) and 5.xi.1961 (*L. W. Quate*, BBM–NG 269).

* Part I will appear in *Bull. Brit. Mus. (nat. Hist.) Ent.* **17** (7), 1965, and should be consulted for terms used in this paper.

Proc. R. ent. Soc. Lond (B). **34** (9–10). Pp. 117–122, 5 figs., 1 Plate 1965.

Holotype ♀ and *paratype* (*allotype*) ♂ in U.S. National Museum, from *Malurus alboscapulatus*, NETHERLANDS NEW GUINEA: Sibil Valley, 31.x.1961 (♀, BBM–NG 218 and ♂, BBM–NG 213).

Other paratypes: 20 ♂, 22 ♀, from the same host with data as given above.

I am indebted to Dr. K. C. Emerson for the loan of the specimens on which this interesting new species is based.

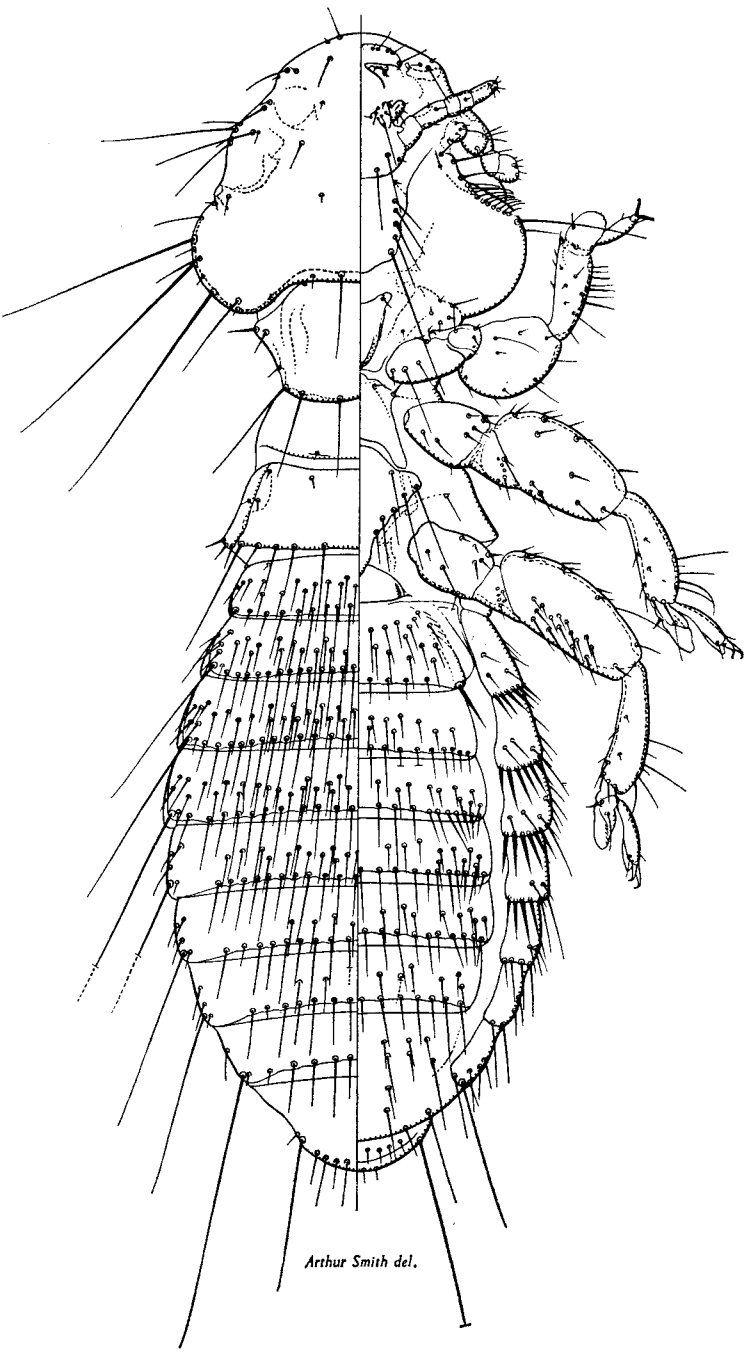


FIG. 1.—*Myrsidea pectinata* sp. n., ♂. Spiracles omitted.

Notes on Some Species of *Myrsidea*

As it may be some time before revisions of all the known species of *Myrsidea* are completed, comments on the following species may be useful.

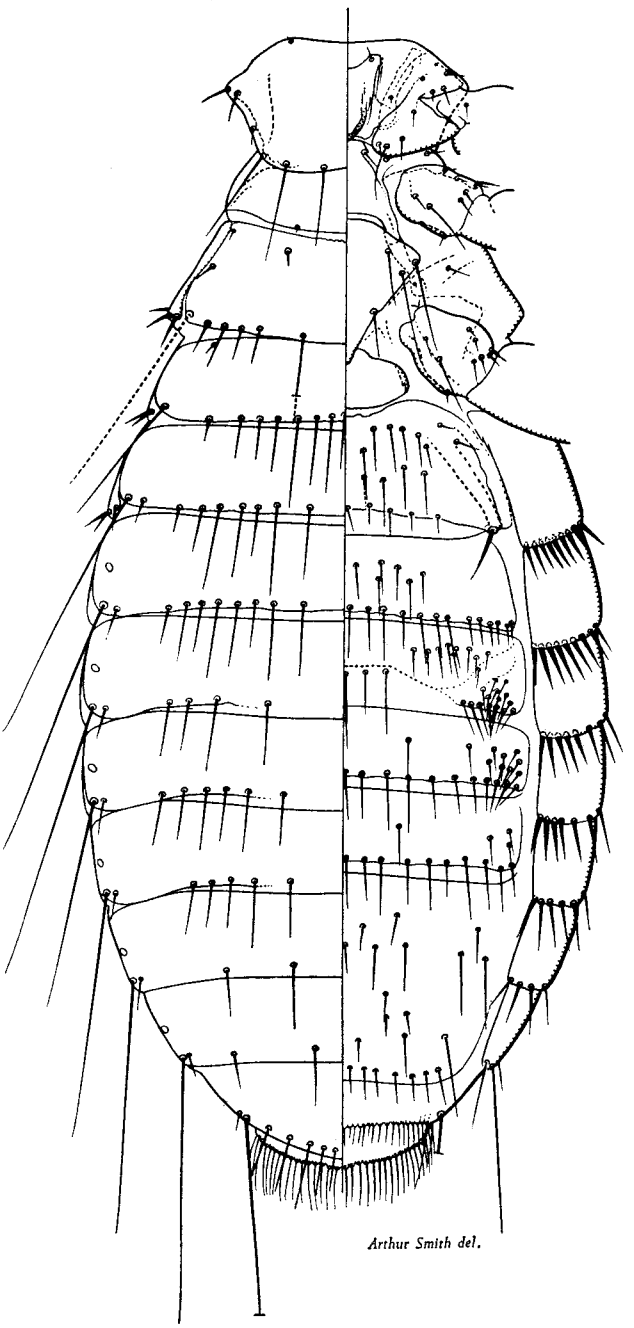


Fig. 2.—*Myrsidea pectinata* sp. n., ♀.

TABLE I.—*Myrsidea pectinata*

MEASUREMENTS (in mm.)

	Female				Male			
	Length			Breadth	Length			Breadth
		Range (10)	Mean			Range (10)	Mean	
Head[1]	.	.	.	0·39	.	.	.	0·36
	0·37	0·35–0·38	0·36	.	0·34	0·33–0·35	0·34	.
Head[2]	.	.	.	0·51	.	.	.	0·45
Prothorax	.	.	.	0·33	.	.	.	0·29
Metanotum	.	.	.	0·44	.	.	.	0·34
Abdomen	1·07	.	.	0·71*	0·82	.	.	0·50*
Total	1·86	.	.	.	1.53	.	.	.

Breadth

	Female		Male	
	Range (10)	Mean	Range (10)	Mean
Head[1]	0·37–0·40	0·38	0·35–0·37	0·36
Head[2]	0·49–0·51	0·50	0·45–0·49	0·46
Prothorax	0·30–0·33	0·32	0·29–0·32	0·30

Length

Head seta 10	0·018–0·022	0·020	0·016–0·024	0·020
Head seta 11+	0·114–0·124	0·117	0·108–0·122	0·115

TERGAL SETAE

	Female (10)		Male (10)			
	Tergocentral		Tergocentral		Anterior	
	Range	Mean	Range	Mean	Range	Mean
I.	13–16	14·5	18–22	19·8	20–41	27·6
II.	18–21	18·7	22–29	25·2	34–59	43·2
III.	15–20	18·2	25–31	26·8	41–60	47·6
IV.	10–14	11·6	22–29	25·5	36–67	46·6
V.	8–11	9·5	22–28	24·9	28–58	36·7
VI.	6–10	8·2	17–27	20·1	9–44	21·4
VII.	4–6	4·2	12–19	15·5	7–29	12·8
VIII.	4	4	9–12	10·3	0–14	5·0
IX.	8–10	8·4	4–7	5·3	.	.

STERNAL SETAE

Female (10)

	Marginal**		Lateral anterior†		Median anterior	
	Range	Mean	Range	Mean	Range	Mean
III.	17–25	20·7	0–3	0·85	6–13	9·2
IV.	15–19	16·8	5–9	7·00	9–17	14·3
V.	18–24	21·9	5–9	6·70	1–8	3·7
VI.	16–22	18·5	1–6	3·60	2–4	3·2
VII.	8–10	7·0	1–2	1·20	5–6	4·2
VIII–IX.	.	.	.	.	14–20	16·4
Vulval	13–16	14·6	.	.	.	.

Male (10)

	Marginal**		Anterior	
	Range	Mean	Range	Mean
III.	19–22	20·4	15–23	19·8
IV.	16–22	19·8	19–33	25·5
V.	19–24	22·1	19–28	21·9
VI.	19–21	19·4	12–20	16·0
VII.	12–15	12·9	9–16	10·7
VIII.	4–8	6·4	5–11	7·2
IX.	.	.	8–12	9·4

Head[1] = breadth at widest part anterior to eye; Head[2] = breadth at temples.

* Tergum IV. + last dorsal marginal seta anterior to eye.

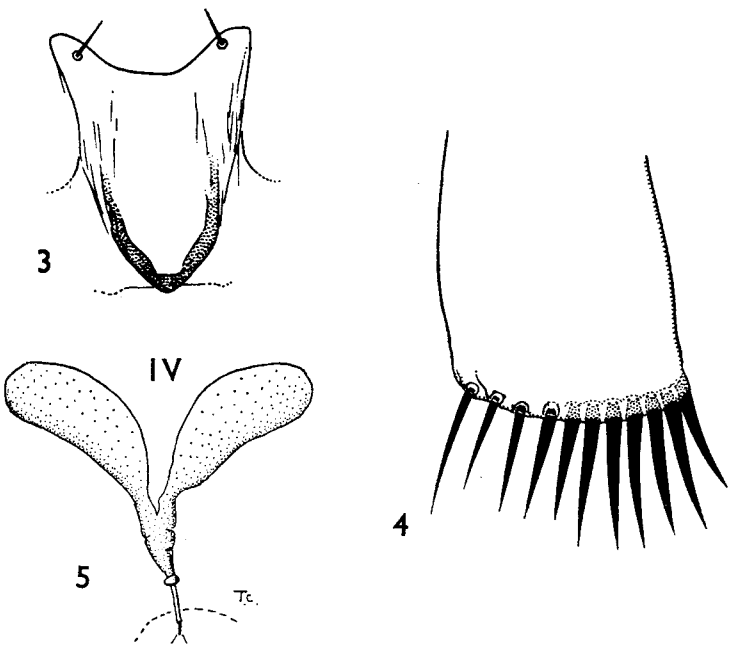
** Includes marginal setae of brushes. † Lateral brushes excluding marginal setae.

In the male all the anterior setae are counted together, as there is often no demarcation between those of brushes and the median anterior setae.

Trinoton stramineum Giebel, 1874

Trinotum stramineum Giebel, 1874, *Insecta epizoa* : 302. Host: *Hirundo americana.*
Myrsidea straminea Giebel; Ferris, 1916, *Canad. Ent.* **48** : 308.

It is difficult to know what prompted the authors of *A check list of genera and species of Mallophaga* (Hopkins & Clay, 1952) to include this name in *Myrsidea*, unless it was an uncritical acceptance of Ferris, who placed it in *Myrsidea* without comment. It is obvious that the size given in the original description makes this species too large for any from *Hirundo* and probably for any other species of *Myrsidea*.



FIGS. 3–5.—*Myrsidea pectinata* sp. n., ♀: (3) prosternal plate; (4) pleural comb; (5) spermatheca. IV = Sternite IV. (3–4 Arthur Smith *del.*)

The description, although not recognisable generically, does not seem to be applicable to a *Myrsidea*, and the original specimens may in fact have been *Trinoton* nymphs. The specific identification of this name will never be possible, and it should be considered as a *nomen dubium* and no longer used.

Myrsidea crassipes (Piaget, 1880)

Menopon crassipes Piaget, 1880, *Pediculines* : 450, pl. 35, fig. 7.
Myrsidea crassipes (Piaget); Clay, 1949, *Ann. Mag. nat. Hist.* (12) **2** : 285.

Clay did not designate a lectotype for this name, as more than one species was represented in the male type material and it was not certain to which male the female belonged. Through the kindness of Dr. K. C. Emerson, it has been possible to examine a series of *Myrsidea* from the type host and this, together with specimens in the British Museum (Natural History) taken from skins, suggests that one of the males on Piaget slide no. 790 is the usual species found on the type host. This specimen differs from the other males in the type material in the reduction of the hypopharynx and the form of the genital sclerite; it is possible that Piaget's figure is composite. The male with the reduced hypopharynx will be designated as lectotype. The single Piaget female has the hypopharynx fully developed and is not the same species as the lectotype. The female of *crassipes* is distinguished by the reduced hypopharynx, the elongated abdomen, the knob-like form of the postero-

lateral corners of segment I, the median division of the anterior tergites and the presence of two to three stout setae on the posterolateral corners of sternite III.

Lectotype of *Menopon crassipes* Piaget: male in the British Museum (Natural History) on slide 790.

Myrsidea conspicua (Kellogg & Chapman, 1902)

Colpocephalum conspicuum Kellogg & Chapman, 1902, *J.N.Y. ent. Soc.* **10** : 163, pl. 15, fig. 4. Host: *Carpodacus mexicanus obscurus* = *C. mexicanus frontalis* (Say).

The description of this species was based on specimens said to have come from *Carpodacus mexicanus obscurus* from Kahuli and Pau (?) Olai, Maui Island, Hawaii, and consists of a 30-line description of the female and a five-line one of the male; the figure represents a male. Type material, kindly lent by the University of California (Division of Entomology) comprises two males, two females and one nymph; the two males are on one slide marked "fig.", denoting that one or both were used for the published figure. It has been the custom to make the figured specimen the lectotype and, other things being equal, this seems to be the correct procedure. The two males are however not conspecific: one has the genital sclerite typical of some of the species parasitic on the Fringillidae and therefore probably originated from the type host; the other has the genital sclerite as found in *M. cyrtostigma*, described in the same paper, and was probably a straggler from one of the Drepanidae. It seems possible that both specimens were used for the published figure, but this does not include the large and conspicuous genital sclerite found in *cyrtostigma* and shown by Kellogg & Chapman (*t.c.*, Pl. 15, fig. 3) in their figure of that species. As the host of the *cyrtostigma*-like male on the type slide of *conspicua* is unknown, and as *conspicua* has page priority over *cyrtostigma*, the choice of lectotype is important if confusion is to be avoided. Therefore the male with the genital sclerite typical of the Fringillidae-infesting specimens will be designated as lectotype. The two females are in poor condition, and it is not at present possible to say to which male they belong.

Lectotype of *Colpocephalum conspicuum* Kellogg & Chapman, 1902: male (marked) in the Division of Entomology, University of California on slide labelled: "1226a = 1225b. fig. *Colpocephalum* n. sp. Type, *Carpodacus mexicanus frontalis*, Kahului, Maui".

Myrsidea bakttitar (Ansari, 1951)

Neomenopon bakttitar Ansari, 1951, *Proc. nat. Inst. Sci. India* **17** : 169, fig. 17. Host: *Pterocles exustus erlangeri* (Neumann). *Error.*

The type material comprises a male and female. The male has the genital sclerite typical of many of the corvine-infesting species (Clay, 1965); the female has the modifications of the tergites as in specimens from *Corvus splendens*; there seems little doubt that the type material is conspecific with these specimens and that the type host is *Corvus splendens* Vieillot. *Myrsidea splendens* Ansari (1955) from the same host may prove to be a synonym, but is at present unrecognisable.

References

Ansari, T., 1955, *Proc. VIIth Pakistan Sci. Conf.* : 52.

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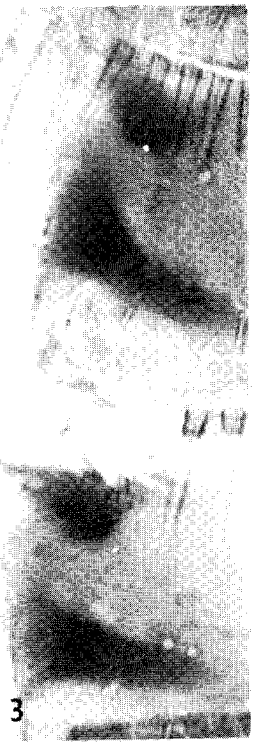
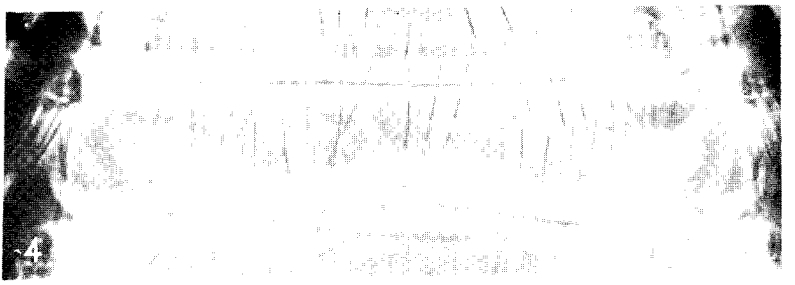
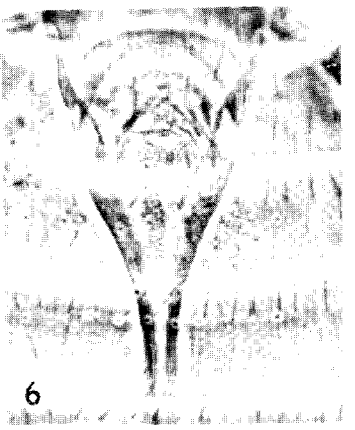
PLATE I

Myrsidea pectinata sp. n. Phase Contrast.

Fig. 1.—Part of anterior region of head, to show U-shaped unpigmented area and hypopharynx.
Fig. 2.—Internal lateral tergal thickening.
Fig. 3.—Internal pleural thickening.
Fig. 4.—Sternite IV of female, to show pigment pattern.
Fig. 5.—Male genital sclerite.
Fig. 6.—Male genitalia (figure reversed).







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