# New genera and species of Diparini with notes on the tribe (Hym., Chalcidoidea)

# By Karl-Johan Hedqvist

In an early paper (1964) the author has treated the tribe *Diparini*. After studies of the types of some genera it seems better to split up *Diparini* into two tribes: *Diparini* and *Lelapini*. Some genera are excluded as not belonging to *Diparini*, for example, *Neolelaps* Ashm., *Calolelaps* Timbl., and *Stictolelaps* Timbl. from Hawaii. In the following the author is dealing only with *Diparini* (s.str.).

## Tribe Diparini

\$\partial\$. Mostly brachypterous species. Head large much wider than thorax and with 6 strong setae (in \$Myrmicolelaps\$ gen.n. wanted)\$. Antennae inserted on a level with or below a level with anterior edge of eyes, formula 11251—11173. Clypeus sometimes protruding with anterior margin straight, rounded or sinuated. In \$Spalangiolaelaps\$ Girlt. with a median tooth. Eyes large except in \$Trimicrops\$ Kieff. Mandibles with 2—4 teeth. Prothorax elongated longer than mesoscutum. Notauli distinct (in \$Pyramidophoriella\* gen.n. wanting) and often meeting in front of anterior margin of scutellum. Prepectus small to moderately large. Scutellum flat to conical and bearing 4 setae (in \$Myrmicolelaps\$ gen.n. lacking)\$. Propodeum elongate and narrow or with long nucha. Petiole short to much longer than wide. Gaster large with sometimes protruding terebra. Legs slender, hind tibiae with 1—2 spurs. Wings very short or wanted, very seldom winged specimens.

3. Very rare in collections and only few males described. Not all of them are winged. They have very long petioles, short gaster and long antennae,

often with long hairs.

Our knowledge of the biology is very poor and no host is known.

# Key to the genera of Diparini

1.	No ocelli, eyes very small and funicle joints transverse (fig. 1 B)	
		eff.
	Ocelli exist, eyes large and funicle joints longer than wide	2.
2.	Scutellum conical	3.
	Scutellum more or less flat, sometimes with a longitudinal lump or carina	5.
3.	Notauli distinct	4.

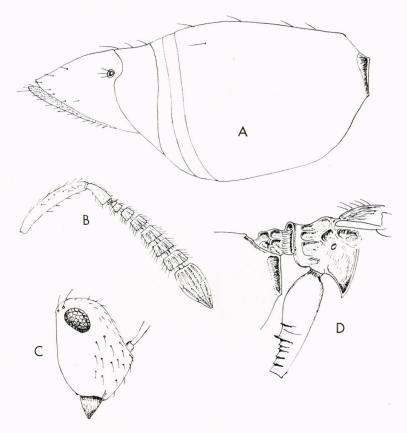


Fig. 1. Trimicrops claviger Kieff. female, A. Gaster, B. Antenna, C. Head in lateral view. and D. Propodeum and petiole in lateral view.

	Notauli wanted Pyramidophoriella gen.n.
	Propodeum with a gibbosity on the sides. Axillae normal Turneria gen.n.
	Propodeum without any gibbosity. Axillae very small Conophorisca gen.n.
5.	Scutellum with a longitudinal lump Dolichodipara gen.n.
	Scutellum flat without a longitudinal lump 6.
6.	Thorax very elongate with few sutures, metanotum very long and propodeum
	narrow, neck-shaped. No setae on vertex and scutellum
	Myrmicolelaps gen.n.
	Thorax not very elongated and with distinct sutures, propodeum not neck-
	shaped but with nucha (sometimes long) and metanotum normally long.
	Vertex and scutellum with setae
7.	Clypeus with a median tooth (fig. 7 F), mandibles with 4 teeth
	Spalangiolaelaps Girlt.
	Clypeus without a median tooth. Mandibles with 2 or 3 teeth
8.	Mandibles with 2 teeth. Antennae 10-jointed (11251) Diparisca Hedgy.
	Mandibles with 3 teeth. Antennae with more than 10 joints 9.
	Entomol. Ts. Arg. 90, H. 3 - 4, 1969

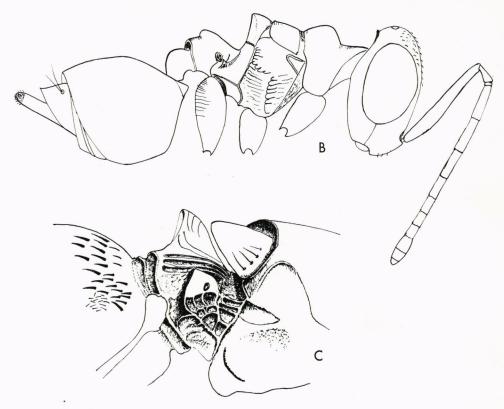


Fig. 2. B. Turneria gen.n. scutellata sp.n. female in lateral view. C. Pyramidophoriella gen.n. albiclava sp.n. propodeum in lateral view.

9.	Scutellum without frenum, and with 4 setae, flat and propodeum with longi-
	tudinal carinae Boeria gen.n.
	Scutellum with frenum 10.
	Notauli meet in the middle of mesonotum
	Notauli not meeting before anterior margin of scutellum
	Petiole anterior with a strong bristle on each side Pondia gen.n.
	Petiole anterior without a strong bristle on each side Grahamisia Del.
	Antennae with 13 joints, 11173 Dipara Walk.
	Antennae with 12 joints, 11073 Apterolelaps Ashm.

## Trimicrops Kieff.

Kieffer, Ann. Soc. Sci. Bruxelles. 30, p. 142, 1906.

This genus is characterized by small eyes (fig. 1 C), no ocelli, antennae (fig. 1 B) with transverse funicle joints and hind coxae with a tooth (fig. 1 D). About gaster see fig. 1 A.

Type: T. claviger Kieff.

# Trimicrops claviger Kieff.

Kieffer, Ann. Soc. Sci. Bruxelles. 30, p. 142, 1906.

Synonyms: Two colour subspecies described by Kieffer. *T. claviger dorsalis* Kieffer, ibid., p. 144, Syn.n. *T. claviger abdominalis* Kieffer, ibid., p. 144, Syn.n.

Distribution: Italy, Jugoslavia, Korfu, Rumania. Host: Unknown. Collected with sieve from soil.

# Trimicrops depressiceps Kieff.

Kieffer, in André: Spec. Hym. Eur. vol. 10, p. 122, 1907.

Distribution: the Caucasia (Suanethi).

Host: Unknown.

## Turneria gen.n.

Head large (fig. 2B) with large eyes. Antennae ( $\ ^{\circ}$  11173,  $\ ^{\circ}$  11092) inserted just below a level with anterior edge of eyes. Clypeus with anterior margin straight. Head with occiput carinated. Pronotum long with a neck-shaped anterior part (fig. 2B). Mesoscutum short, half as long as pronotum. Notauli distinct. Scutellum conical. Propodeum long (fig. 2B) with two gibbosities on each side. Petiole curved (fig. 2B). Gaster (fig. 2B) short with protruding terebra. Hind tibia with one spur.

Type: T. scutellata sp.n.

# Turneria scutellata sp.n.

- 2. Brownish red with petiole and gaster dark brown. Antennae with scape, pedicel, 1st—2nd and basal part of 3rd funicle joints and apex of clava pale yellowish brown, the rest of antennae dark brown. Legs yellowish brown with femora distally darker, fore and hind coxae yellowish white. Head (fig. 2B) large, wider than thorax and with lenticular puncturation. Antennae, 11173 inserted just below a level with anterior edge of eyes, ring joint small. Antennal furrow exist and between antennal sockets a sharp longitudinal carina. Clypeus anterior a little protruding and with anterior margin stright. Occiput with a sharp carina. Malar space 1/3 of the breadth of an eve. Pronotum anterior with a neck, mesoscutum very short 1/3 of the length of pronotum. Notauli distinct not meeting in front of the anterior margin of scutellum. Scapulae large much larger than mesoprescutum. Scutellum conical with a carina on the top. Propodeum elongate with two gibbosities on each side. Prepectus small, mesopleura areolated. Thorax with lenticular puncturation. Petiole curved with longitudinal rugose puncturation. Gaster (fig. 2B) short with 1st segment very large and very little is seen of the rest of segments. Terebra protruding. All coxae with transverse striation. Hind tibia with 1 spur.
- Similar to female, but antenna more elongate with stronger sensillae and formula 11092.

Length: 2.4-3.3 mm, 3.2-3.3 mm.

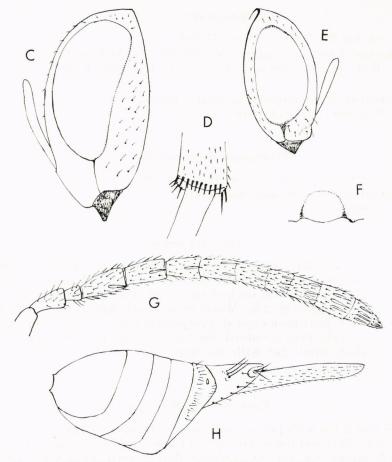


Fig. 3. C. Pyramidophoriella gen.n. brunnea sp.n. head in lateral view, D. P. brunnea sp.n. part of hind tibia, E. P. albiclava sp.n. head in lateral view, F. P. albiclava sp.n. clypeus, G. P. albiclava sp.n. antenna and H. P. albiclava sp.n. gaster in lateral view.

Holotype: (Brit. Mus. Nat. Hist.) S. Africa, Pondoland, Port St. John, Jan. 1924, leg. R. E. Turner.

Paratypes: 29  $\,^{\circ}$  21  $\,^{\circ}$  (Brit. Mus. Nat. Hist. and coll. mea), from the same locality, Jan. 1924 (6  $\,^{\circ}$  6  $\,^{\circ}$ ), 6—25 Febr. 1924 (15  $\,^{\circ}$  4  $\,^{\circ}$ ), 1—17 Mar. 1924 (2  $\,^{\circ}$  4  $\,^{\circ}$ ), 29.I.—5.II.1924 (6  $\,^{\circ}$  6  $\,^{\circ}$ ) and Nov. 1923 (1  $\,^{\circ}$ ), all specimens leg. R. E. Turner.

T. scutellata sp.n. differs from all known species of Diparini except Pyramidophoriella albiclava sp.n. and P. brunnea having conical scutellum. From the both species of Pyramidophoriella gen.n. T. scutellata sp.n. differs having distinct notauli in Pyramidophoriella gen.n. notauli wanted.

## Pyramidophoriella gen.n.

Head very large. Antennae, 11173, inserted just above or at a level with anterior edge of eyes. Clypeus with anterior margin rounded (arched). Malar *Entomol. Ts. Arg. 90. H. 3-4, 1969* 

space short 1/3—1/4 of the breadth of an eye. Eyes large (fig. 3 C, E). Occiput not with margin. Pronotum as long as mesoscutum. Notauli lacking. Scutellum conical with a carina on the top. Propodeum (fig. 2 C) with a tooth shaped gibbosity on each side, spiracle on the outside of the gibbosity (fig. 2 C). Petiole shorter than wide. Gaster elongate with protruding terebra.

Type: P. albiclava sp.n.

# Pyramidophoriella albiclava sp.n.

\$\textsquare\$. Dark yellowish brown with the base of scape, clava and all coxae pale yellowish white. The rest of legs, apex of gaster and terebra pale yellowish brown, apex of terebra dark brown. It is variation in the colour and among paratype specimens the colour dorsally on thorax and gaster is dark brown.

Head (fig. 3 E) very large and much wider than thorax. Eyes large long oval. Malar space 1/3 of the breadth of an eye. Antennae (fig. 3 G), 11173, inserted just above a level with anterior edge of eyes. Clypeus (fig. 3 F) with anterior margin arched. Pronotum a little longer than mesoscutum. Notauli wanting. Scutellum conical (fig. 2 C) with a fine carina on the top. Prepectus small. Head and thorax reticulated. Propodeum (fig. 2 C) with nucha and a gibbosity on each side. On the outside of the gibbosity is the spiracle placed. Petiole short, rugose. Gaster (fig. 3 H) as long as thorax+head, terebra longer than half the length of gaster; basal segment of gaster dorsally with more or less scale shaped hairs.

♂. Unknown.

Length: 2.4—2.6 mm.

Holotype: (Brit. Mus. Nat. Hist.), S. Africa, Pondoland, Port St. John,

July 10-31, 1923, leg. R. E. Turner.

Paratypes: 19  $\ \$  (Brit. Mus. Nat. Hist. and coll. mea), Pondoland, Port St. John, Feb. 6—25, 1924 (5  $\ \$ ), from the same locality Jan. 1924 (5  $\ \$ ), 18—31 Mar. 1924 (1  $\ \$ ), 1—17 Mar. 1924 (1  $\ \$ ), July 10—31 1923 (1  $\ \$ ), Sept. 1923 ( $\ \$ ), E. Cape Prov. Katberg, 4000 ft. Oct. 1932 (1  $\ \$ ), Cape Prov., Somerset East, 1—26, i. 1931 (1  $\ \$ ) and Cape Prov., Somerset East, Nov. 1930 (2  $\ \$ ) and 10—22.XII 1930 (1  $\ \$ ). All paratypes leg. R. E. Turner.

# Pyramidophoriella brunnea sp.n.

Q. Yellowish brown; antennae yellowish brown except scape which is yellowish white beneeth (lateral side), 5th—6th funicle joints dark brown and 7th funicle joint and clava yellowish white. Apex of gaster dark brown, terebra yellowish with apex dark brown. Legs: Coxae pale yellowish white,

femora and tibiae pale brown and tarsi pale yellowish brown.

Head (fig. 3 C) very large and much wider than thorax. Antennae, 11173, inserted just on a level with anterior edge of eyes. Anellus longer than wide, funicle joints with few rhinariae. Occiput not margined. Clypeus with anterior margin a little arched. Malar space short about 1/4 of the breadth of an eye. Ocelli in an isosceles triangle. Head very fine reticulated and with scattered pits on face. Pronotum as long as mesoscutum. Notauli lacking. Scutellum conical with a carina on the top. Thorax with fine reticulation, on pronotum striato-reticulate and mesoscutum with scale-shaped hairs.

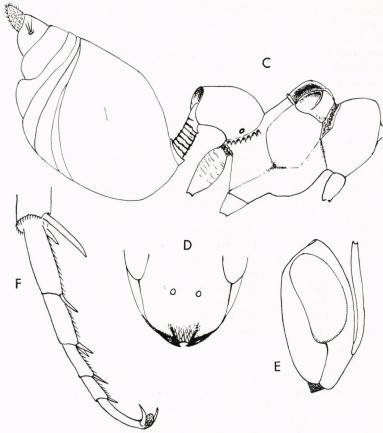


Fig. 4. Dolichodipara gen.n. scutellata sp.n. female, C. Thorax and gaster in lateral view, D. Head in frontal view, E. Head in lateral view and F. Mid tarsus.

Prepectus small. Propodeum with nucha and one large tooth-shaped gibbosity on each side. Petiole shorter than wide. Gaster elongate longer than head+thorax and with protruding terebra. Hind tibia (fig. 3 D) with 2 spurs.

#### ♂. Unknown.

Length: 4.1 mm.

Holotype: (Brit. Mus. Nat. Hist.), S. Africa, Pondoland, Port St. John, 6—25 Febr. 1924, leg. R. E. Turner.

#### Dolichodipara gen.n.

Head large. Antennae, 11073, inserted below a level with anterior edge of eyes. Clypeus a little protruding with anterior margin sinuate. Malar space longer than the breadth of an eye. Occiput rounded not margined. Pronotum 3 times as long as mesoscutum. Notauli lacking. Scutellum small and with a longitudinal gibbosity, the gibbosity with a median carina. Prepectus small.

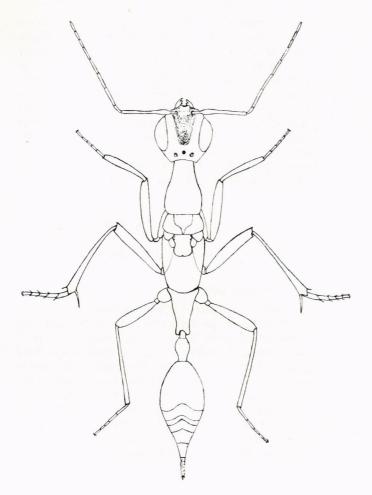


Fig. 5. Myrmicolelaps gen.n. paradoxus sp.n. female.

Propodeum tube shaped (fig.  $4\,\mathrm{C}$ ). Petiole longer than wide. Gaster short with protruding terebra.

Type: D .scutellata sp.n.

# Dolichodipara scutellata sp.n.

♀. Head blueish black with tint of green and purple, metallic. Mandibles reddish brown. Scape yellowish brown, the rest of antenna change from brown on pedicel to dark brown on clava. Thorax and legs yellowish brown, hind tibiae darker (brown). Gaster dark brown with metallic lustre.

Head (fig. 4 D, E) large elongate. Eyes large, long oval. Malar space longer than the breadth of an eye. Clypeus (fig. 4 D) a little protruding with anterior margin a little sinuate. Mandibles with 3 teeth. Antennae, 11073, inserted below a level with anterior edge of eyes. Scape long reach median ocellus,

1st—4th funicle joints much longer than wide, 5th—7th funicle joints twice as long as wide. Antennal furrow exist but shallow. Ocelli in an obtuse triangle (ca  $140^{\circ}$ ). Occiput rounded not margined. Pronotum much longer (3 times) than mesoscutum. Between pronotum and mesoscutum a deep transverse furrow. Scutellum with a longitudinal gibbosity and on the gibbosity a median carina. Metanotum very long. Head with reticulation, thorax with much finer puncturation on pronotum transverso striated. Prepectus small. Propodeum elongate, tube shaped and longitudinal striated, spiracle lateral and near anterior margin. Petiole (fig. 4 C) much longer than wide with transverse carinae. Gaster (fig. 4 C) with 1st segment large, terebra protruding. Legs long and slender, mid tibia (fig. 4 F) with 2 spurs also on the trasal joints, hind tibia with one (1) spurs. Wings wanted.

♂. Unknown.

Length: 3.7 mm.

Holotype: (Brit. Mus. Nat. Hist.), S.W. Africa, Aus. 8-30.XI, 1929, leg.

R. E. Turner.

Paratype: 1 \( \text{in coll. mea} \), S.W. Africa, Aus. Dec. 1929, leg. R. E. Turner.

# Myrmicolelaps gen.n.

Complete apterous. Head large with very distinct antennal furrows. Occiput margined. Eyes large, nude. Ocelli near the posterior margin of occiput and sitting in a triangle of 160°. Mandibles with 3 teeth. Antennae, (♀ 11073 ♂ 11082) inserted slightly below a level of anterior edge of eyes, scape long and reach to the margin of occiput. Pedicel 1/3 shorter than the first funicle joint, all funicle joints very long. Clypeus with anterior margin sinuate. Pronotum elongate, conical. Notauli traceable about half way across the mesoscutum, the latter very short. Scutellum rectangular, incised medially on both sides. Pronotum large with oval and very small spiracle. Petiole long, fusiform. Gaster oval with acute end and with 6 segments, terebra protruding. Legs slender with very elongate coxae, hind tibia with 1 spur.

Type: M. paradoxus sp.n.

# Myrmicolelaps paradoxus sp.n.

Q. Head blue, metallic with aerugineous tint. Mandibles reddish brown. Antennae reddish brown with the distal segments dark brown. Thorax, petiole and legs reddish brown, distal segments of tarsi darker. Gaster with reddish brown colour, anterior with tint of blue, posterior with tint of blue,

violet and green mixed. Terebra reddish brown.

Head large, elongate with large, oval eyes. Antennae (fig. 6G), 11073, inserted a little below a level of anterior edge of eyes. Scape long and swollen at base, reach behind median ocellus. All funicle joints much longer than wide, no distinct clava. Clypeus (fig. 6F) with anterior margin sinuate. Mandibles with 3 teeth. Malar space a little shorter than half the breadth of an eye. Head fine reticulate. Occiput with a sharp margin. Thorax (fig. 5, 6D) all over with fine lenticular puncturation. Pronotum very long and elongate, mesoscutum short with notauli traceable to the anterior margin of scutellum. Scutellum rectangular with incised sides, metanotum very long. Propodeum very long and tube shaped, spiracles lateral and near anterior

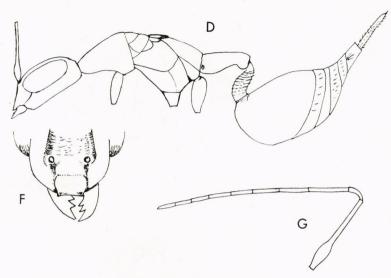


Fig. 6. Myrmicolelaps gen.n. paradoxus sp.n. female, D. In lateral view, F. Head in frontal view and G. Antenna.

margin. Petiole (fig. 6 D) long and with transverse carinae, gaster see fig. 6 D. Legs slender (fig. 5), hind tibia with 1 spur, mid tibia as in *Dolichodipara* scutellata sp.n.

3. Similar to female, but scutellum a little convex and clypeus not so

protruding. Antenna 11082.

Length: ♀ 5 mm. ♂ 3.7 mm.

Holotype: (Brit. Mus. Nat. Hist.), S. Africa, Orange F. State, Harrismith, March 1—20, 1927, leg. R. E. Turner.

Paratype: 1 & (Brit. Mus. Nat. Hist.) S. Africa, Cape Prov. Aliwal North,

Dec. 1922, leg. R. E. Turner.

M. paradoxus sp.n. is a extreme modified species and related to Dolicho-dipara scutellata sp.n.

## Spalangiolaelaps Girlt.

Girault, Ent. News. 28, pp. 22-23, 1917.

Spalangiolaelaps Girlt. is similar to Dipara Walk. but differs as follows: Scutellum has no frenum, clypeus has a tooth (fig. 7 F) on anterior margin, mandibles with 4 teeth and propodeum has a long nucha (fig. 7 E). See also fig. 7 D.

Type: S. argenticoxa Girlt.

## Spalangiolaelaps argenticoxa Girlt.

Girault, Ent. News. 28, p. 23, 1917.

Distribution: U.S.A., Maryland.

Host: Unknown. Captured by sweeping the foliage of oaks and other trees of various species in the woods.

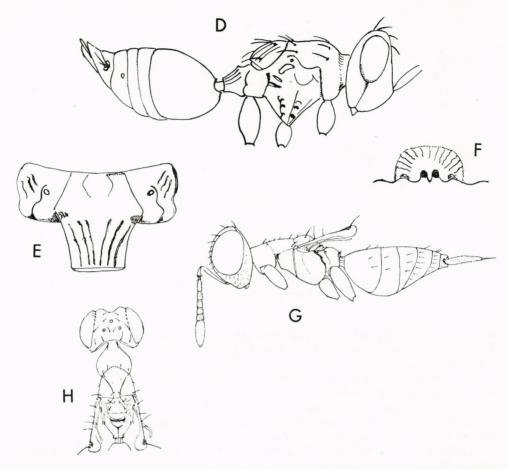


Fig. 7. Spalangiolaelaps argenticoxa Girlt. (D—F) female, D. In lateral view, E. Propodeum and F. Clypeus (D—F sketched of the type). Diparisca ferrierei Hedqv. (G—H) female, G. In lateral view and H. Head and thorax in dorsal view.

# Diparisca Hedqv.

Hedqvist, Entomophaga. 9, pp. 54-55, 1964.

"Antennae 10-jointed, 11251, inserted on a level with the anterior margin of eyes. Clypeus with sinuated anterior margin. Mandibles with 2 teeth. A deep cavity above the base of antennae. Head semi-globular. Eyes very large. Notauli converging and complete. Scutellum with frenum and 4 setae. Propodeum with a weak median carina. Petiole shorter than wide. Gaster with protruding stout ovipositor. Wings brachypterous and with 4 large setae." See fig. 7 G, H.

Type: D. ferrierei Hedqv. Entomol. Ts. Arg. 90. H. 3-4, 1969

# Diparisca ferrierei Hedqv.

Hedqvist, Entomophaga. 9, pp. 55-56, 1964.

Distribution: Brazil. Host: Unknown.

## Boeria gen.n.

Head large (fig. 8 F). Antennae, 11073, inserted just below a level with anterior edge of eyes. Clypeus with anterior margin straight. Mandibles with 3 teeth. Malar space a little more than half the breadth of an eye. Antennal furrows shallow. Pronotum much longer than mesoscutum. Notauli complete. Scutellum (fig. 8 G) with 4 setae. Prepectus very small. Propodeum (fig. 8 G) with short nucha. Petiole shorter than wide. Gaster (fig. 8 E) short with short protruding terebra and long first segment. Hind tibia with two short spurs.

Type: B. saetosa sp.n.

## Boeria saetosa sp.n.

♀. Reddish brown; scape, 7th funicle joint, clava, fore and hind coxae pale

yellowish white. Gaster partly dark brown except apex.

Head (fig. 8 F) large and a little wider than thorax. Antennae, 11073, inserted just below a level with anterior margin of eyes. Clypeus with anterior margin straight. Mandibles with 3 teeth. Above antennal sockets a wide, shallow furrow. Malar space a little more than half the breadth of an eye. Occiput with rounded margin. Pronotum much longer than mesoscutum and with 4 strong setae along posterior margin. Mesoscutum very short with notauli complete. Scutellum (fig. 8 G) with 4 setae. Thorax and head with equal fine rugose reticulation. Prepectus very small, mesopleura (fig. 8 E) with longitudinal carinae. Propodeum (fig. 8 G) with longitudinal carinae, very short nucha, incomplete plica and costula and a deep sulcus spiracularis. Petiole shorter than wide with rugose puncturation. Gaster (fig. 8 E) with 1st segment large, terebra protruding. Legs slender with hind femora a little swollen, hind tibia with 2 short spurs.

♂. Unknown. Length: 2.3 mm.

Holotype: (Brit. Mus. Nat. Hist.) S. Africa, Pondoland, Port St. John, Jan.

1924, leg. R. E. Turner.

Paratypes: 4  $\,^{\circ}$  (Brit. Mus. Nat. Hist. and in coll. mea). S. Africa, Pondoland, Port St. John, Dec. 1923 (1  $\,^{\circ}$ ), 29.I—15.II.1924 (1  $\,^{\circ}$ ), 1—17.III.1924 (1  $\,^{\circ}$ ) and Cape Prov., Somerset East, 1—26.I.1921 (1  $\,^{\circ}$ ). All paratypes leg. R. E. Turner.

Boeria gen.n. is a genus near Spalangiolaelaps Girlt. and Dipara Walk. but differs as follows: from Spalangiolaelaps having anterior margin of clypeus without a tooth and very short mesoscutum, from Dipara having scutellum without frenum and the very short mesoscutum.

## Grahamisia Del.

Delucchi, Ann. Mus. Roy. Afr. Centr., in-8°, Zool. 110, pp. 379—380, 1962.

Syn: Afrolelaps Hedqvist, Publ. cult. co. Diam. Ang., Lisboa, 63, p. 47, 1963.

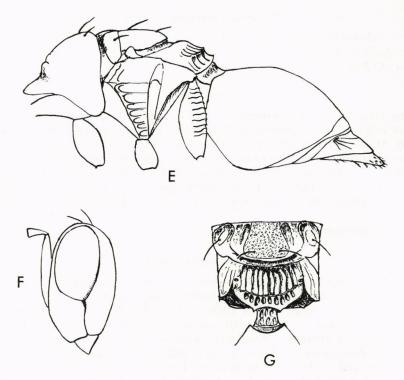


Fig. 8. Boeria gen.n. saetosa sp.n. female, E. In lateral view, F. Head in lateral view and G. Propodeum.

*Grahamisia* Del. is characterized as follows: Notauli meet in the middle of mesoscutum. Antennae, 11173, inserted just on a level or just above a level with anterior margin of eyes.

Type: G. saetosa Del.

# Key to the species of Grahamisia Del.

1.	Head rugose reticulated. Propodeum with longitudinal striation
	Head more or less smooth. Propodeum smooth or with reticulation not striation
	2.
2.	Pronotum with a sharp transverse carina (fig. 9 B)
	G. albomaculata (Hedqv.)
	Pronotum without a sharp transverse carina
3.	Wings (fig. 9 A) short reach to petiole or longer G. maculata (Hedqv.)
	Wings very short and never reaching to petiole
4.	Each of scapulae and scutellum with a black, smooth area G. saetosa Del.
	Only each of scapulae with a black, smooth area G. straminea sp.n.
Ent	omol. Ts. Arg. 90, H. 3 - 4, 1969

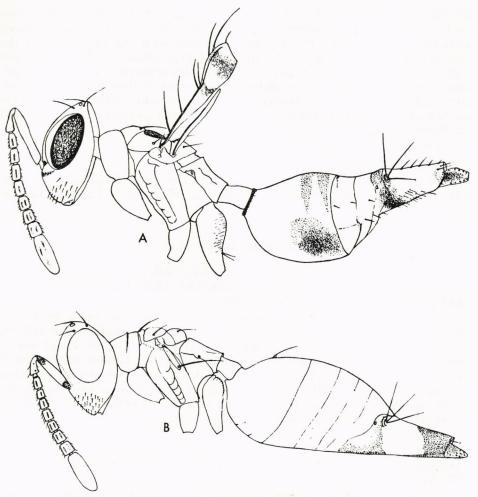


Fig. 9, A. Grahamisia maculata (Hedqv.) female in lateral view and B. Grahamisia albomaculata (Hedqv.) female in lateral view.

## Grahamisia straminea sp.n.

♀. Stramineus, with funicle except ultimate joint and apical part of gaster brown. Inner part (half) of scapulae black. Ultimate funicle joint, clava, petiole and distal part of all coxae white-yellowish white.

Head (fig. 11 E, G) smooth except above antennae (antennal furrow) which is transverse striated. Face below antennal sockets fine punctated and with small setae. Vertex with two black setae, between ocelli and inner orbites with 2 setae. Antenna (fig. 10 C) with funicle joints longer than wide except ultimate joint which is square. Clava as long as 3 last funicle joints combined. Pronotum with transverse striation, anterior part of median lobe of mesonotum has transverse striation but finer than on pronotum. In the middle

and anterior of mesonotum 2 black setae, also anterior of scutellum two black setae. Scapula laterally, near tegula one black seta. Wings reduced short only reaching to base of propodeum and with one black seta at the base and one strong black seta at apex. Prepectus smooth and as all pleurae with scattered striation. Mid and hind coxae with transverse striation. Propodeum smooth with short plica and small spiracles. Petiole longer than wide with rugose puncturation. Gaster (fig. 11 E) smooth with 2 black setae anterior of 1st segment. Apical part of gaster from pygostyle with scattered fine hairs.

♂. Unknown.

Length: 2.7 mm.

Holotype: Musée royal de l'Afrique centrale Tervuren. Kivu, Terr. Mwenga, S.-O. Tombwe. Lulko, 2100 m (for mont.), I, 1952 Leg. N. Leleup. "Récolté dans l'humus".

## Grahamisia striata sp.n.

♀. Pale yellowish brown. Scape, clava, fore coxae, hind coxae, hind trochanters and base of hind femora pale yellowish white. Funicle joints brown. Inner part of scapula with a black area.

Head (fig. 12 G) wider than thorax. Antennae inserted on a level with anterior margin of eyes. Clypeus with anterior margin straight. Above clypeus a small swelling. Malar space as long the breadth of an eye. Head thorax with equal fine rugose reticulation. Scutellum elevated, behind frenum longitudinal striation. Prepectus small. Propodeum and pleurae longitudinal striated. Petiole (fig. 12 H) short as long as wide with a swelling in the middle and with two small setae on each side, whole petiole fine punctated. Gaster (fig. 12 J) nearly as long as thorax+head.

3. Unknown.

Length: 2.0 mm.

Holotype: (Brit. Mus. Nat. Hist.) S. Africa, Cape Prov. Sumerset, 1—26, i., 1931, leg. R. E. Turner.

*G. striata* sp.n. differs (see key) from the known species of *Grahamisia* Del. as follows: Propodeum longitudinal striated all over. Mesosternum also with striation and head and thorax with rugose reticulation.

# Grahamisia saetosa Del. (Fig. 11 F)

Delucchi, Ann. Mus. Roy. Afr. Centr., in-8°, 110, pp. 380-383, 1962.

Distribution: Congo, Uganda and Tanganyika.

Material seen: 1  $\bigcirc$ , Kivu, Uvira, Luvubu, 2650 m. XI, 1950, leg. N. Leleup, 1  $\bigcirc$ , Kivu, Terr. Lubero, Lubero-Hangi, Lumbuko, 2375 m. XI. 1954, leg. R. P. M. J. Celis, 2  $\bigcirc$ , Kivu, Terr. Kalehe verst. S. O. du Kahuze, 2850 m., VII. 1951, (For. bambous), leg. N. Leleup (Récolté dans l'humus), 3  $\bigcirc$ , Kivu, Terr. Lubero, riv. Kakolove, 2550 m., 21.VII, 1953, leg. R. P. M. J. Celis, 2  $\bigcirc$ , Mont Kabobo, terr. Albertville, Hte. Klymbi, 1700 m., IX. 1958, leg. N. Leleup (Humus en foret) and 1  $\bigcirc$ , Uganda: Ruwenzori, Ruiss. Kamusonge, 2280 m., 25.I.1954, leg. R. P. M. J. Celis.

Host: Unknown.

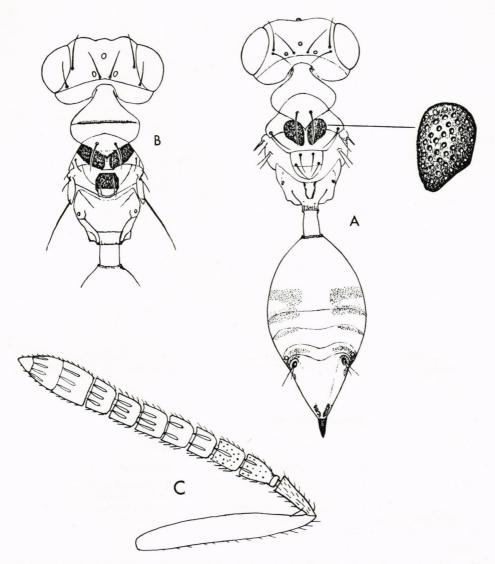


Fig. 10. A. Grahamisia maculata (Hedqv.) female in dorsal view, B. Grahamisia albomaculata (Hedqv.) female, head and thorax in dorsal view and C. Grahamisia straminea sp.n. antenna.

# Grahamisia albomaculata (Hedqv.) fig. 9 B, 10 B)

Hedqvist, Publ. cult. co. Diam. Ang., Lisboa, 63, pp. 49-50, 1963.

Distribution: Portuguese Westafrica (Angola).

Host: Unknown.

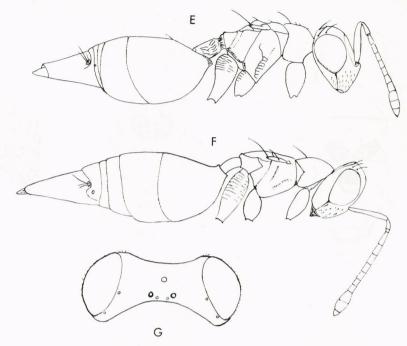


Fig. 11. E. Grahamisia straminea sp.n. female in lateral view, F. Grahamisia saetosa Del. female in lateral view and G. Grahamisia straminea sp. n. head in dorsal view.

## Grahamisia maculata (Hedgy.) (fig. 9 A, 10 A)

Hedqvist, Publ. cult. co. Diam. Ang., Lisboa, 63, pp. 47-49, 1963.

Distribution: Portuguese Westafrica (Angola) and Congo.

Material seen: 1 ♀, Stanleyville: Terr. Opala, Yapehe, VII. 1948, leg. P. L. G. Benoit, 1♀, Katanga, gal forest de la Kisanga, VII. 1948, leg. N. Leleup (Récolté dans racine de plante), 1♀, Kivu, Terr. Mwenga, S.-O. Itombwe, Lulko, 2050 m, 21.I.1952, leg. N. Leleup, 1♀, Elisabethville, Kisanga, 20.VII.1948, leg. N. Leleup and 1♀, Lac Lungwe, Terr. Uvira, 2600 m. V.1958, leg. N. Leleup.

Host: Unknown.

### Dipara Walk.

Walker, Ent. Mag., I, p. 371, 1833.

Syn.: Tricoryphus Förster, Hym. Stud., 2, p. 46, 1856. Hispanolelaps Mer-

cet, Eos. 3, pp. 60—61, 1927.

Dipara Walk, is characterized as follows: Apterous, mandibles with 3 teeth. Antennae are 13-jointed, 11173, inserted on or above a level with the anterior margin of eyes. Notauli complete. Scutellum with frenum. Propodeum with nucha and incomplete plica.

Type: D. petiolata Walk.

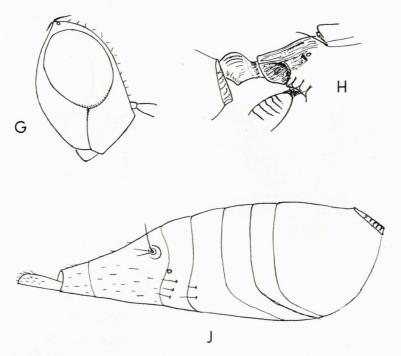


Fig. 12. Grahamisia striata sp.n. female, G. Head in lateral view, H. Propodeum and petiole in lateral view and J. Gaster in lateral view.

#### Key to the species of Dipara Walk.

About males very little is known. For *D. petiolata* Walk, is the male known. MASI (1917) has described a species from Seychelles *D. rufescens* of which the author has seen male specimens (see below).

eyes. Dark brown ..... D. nigrita sp.n.

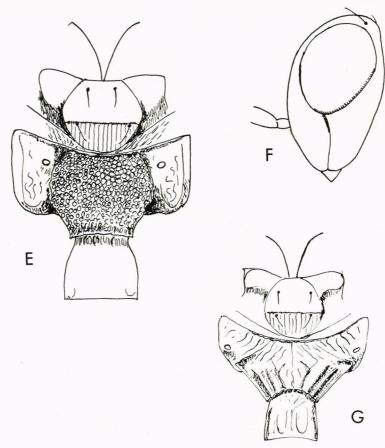


Fig. 13. Dipara petiolata Walk. (E-F), F. Head in lateral view, E. Scutellum, Propodeum and petiole in dorsal view and G. Dipara canadensis sp.n. scutellum, propodeum and petiole in dorsal view.

#### Dipara petiolata Walk. (fig. 13 E, F)

Walker, Ent. Mag. I, p. 373, 1833.

Syn.: Tricoryphus fasciatus Thomson, Skand. Hym. 4, p. 210, 1875. Hispanolaelaps coxalis Mercet, Eos. 3, p. 62, 1927.

Distribution: Austria, Czechoslovakia, England, Germany, Spain, Sweden and USSR (Moldavia).

Material seen: 1 ♂, Skåne, Höör, 24.VI.1958, leg. A. Sundholm, 1 ♀, Skåne, Skäralid, Material seen: 1 ♂, Skane, Hoor, 24.VI.1958, leg. A. Sundholm, 1 ♀, Skane, Skaralid, 7.IX.1958, leg. A. Sundholm, 1 ♀, Blekinge, Förkärla, Tromtö, 29.VII.1951, leg. A. Sundholm, 1 ♀, Blekinge, Karlskrona, Vämö, 3.IX.1957, leg. A. Sundholm, 1 ♂, Blekinge, Rödeby, 26.VI.1952, leg. A. Sundholm, 1 ♂, Blekinge, Rödeby, 13.VI.1958, leg. A. Sundholm, 1 ♂, Blekinge, Tving, 21.VII.1955, leg. A. Sundholm, 2 ♂, Blekinge, Torhamn, 16.VI. and 19.VI. 1962, leg. N. Gyllensvärd, 1 ♂, Öland, Halltorp, 13.VII.1952, leg. A. Sundholm, 1 ♂, Värmland, Säffle, 10.VII.1958, leg. A. Sundholm, 1 ♀, Germany, Rheinprov. Rüdesheim, 26.VI. 1953, leg. A. Sundholm and 1 ♀, Austria, Kärnten, Kötschach 1000 m, 25.VI.1958, leg.

Host: Unknown.

N. Gyllensvärd.

## Dipara canadensis sp.n.

?. Pale yellowish brown, darker brown on vertex, posterior part of scapulae and a band in the middle of the gaster. Antenna; scape white, pedicel brown and the rest of antenna dark brown. All coxae, trochanters, tarsi and petiole

white. A band behind spiracles of gaster whitish vellow.

Head punctated, finer on cheek. Clypeus with anterior margin straight. Antennae inserted on a level with anterior margin of eyes. Malar space nearly as the breadth of an eye. Prepectus of medium size with fine striation. Scutellum with frenum, punctated in front of frenum, behind striated (longitudinally). Notauli distinct. Propodeum (fig. 13 G) with longitudinal carinae and with a median carina. Petiole as long as wide. Gaster acuminate and as long as head and thorax combined. Wings very short reach to the middle of propodeum.

ී. Unknown.

Length: 3.2 mm.

Holotype: in coll. mea, Canada, Ont., Gatinau Park, 21.V.1967, leg. K.-J.

D. canadensis sp.n. differs from D. petiolata Walk. by having not punctated propodeum.

# Dipara turneri sp.n.

♀. Reddish brown; head with tint of violet on frons and vertex, below antennal sockets a arcuate brown band (fig. 14 G) between anterior margin of eyes. Antennal furrows pale yellowish brown. Antenna with scape reddish brown with distal part yellowish white. Transverse black, wide band posterior of mesoscutum. Legs: fore and mid tibiae and fore and mid tarsi yellowish white, hind leg with trochanters, knee, apex of tibia and tarsi yellowish white. Apex of gaster also yellowish white.

Head (fig. 14 G) transverse, wider than thorax. Antennal furrows distinct, head above (vertex) reticulated with large mashes. Notauli distinct. Scutellum with frenum, behind frenum longitudinal striated, in front of frenum finely reticulated. The rest of thorax with fine puncturation, prepectus small. Propodeum with a median carina, plica incomplete and a nucha, the latter short. Petiole short wider than long. Gaster (fig. 14 F) with very long 1st segment

and a short terebra.

Fore wing reach to the middle of 1st segment of gaster. Hind tibia with 1 spur.

♂. Unknown.

Length: 1.7 mm.

Holotype: (Brit. Mus. Nat. Hist.) S. Africa, Port St. John, Pondoland,

6-25 feb., 1924, leg. R. E. Turner.

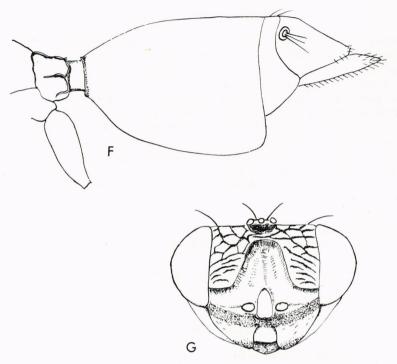


Fig. 14. Dipara turneri sp.n. female, F. Gaster in lateral view and G. Head in frontal view.

*D. turneri* sp.n. differs from the other known species of *Dipara* Walk. as follows: Vertex is strongly reticulated and with a transverse carina in front of median ocellus and anterior part of scutellum (in front of frenum) shorter than part behind frenum.

#### Dipara nigrofasciata sp.n.

Q. Yellowish brown with a black wide, transverse band in front of scutellum. Posterior part of gaster darker. All coxae and clava pale yellowish white.

Head (fig. 15 K) wider than thorax. Antennae (fig. 15 L) inserted just above a level with anterior edge of eyes. Malar space about half the breadth of an eye. Clypeus with anterior margin a little arcuate. Puncturation (reticulation) on head stronger than on thorax, on the latter very fine. Scutellum with 4 setae, the two anterior very small. Mesosternum smooth, prepectus of medium size. Propodeum smooth with a median carina (forked near the anterior margin of propodeum), plica, costulae, nucha and short sulcus spiracularis. Petiole as long as wide and with longitudinal carinae. Gaster (fig. 15 K) longer than thorax+head. Wings reach base of petiole and with long setae. Legs slender with transverse striation on fore and hind coxae (fig. 15 K). Hind tibia with 2 spurs.

♂. Unknown.

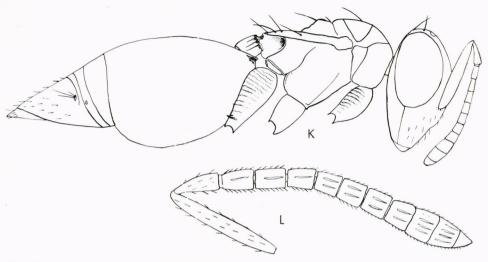


Fig. 15. Dipara nigrofasciata sp.n. female, K. The body in lateral view and L. Antenna.

Length: 2.6 mm.

Holotype: Musée Royal de l'Afrique centr. Tervuren. Madagascar: Mandraka, I.1944, leg. A. Seyrig.

D. nigrofasciata sp.n. differs from the near similar species D. nigrita sp.n. by having antennae clear inserted above a level with anterior edge eyes.

# Dipara nigrita sp.n.

♀. Head, thorax, propodeum, petiole and hind coxa dark brown—black, vertex with blue, metallic tint. Gaster brown—dark brown. Antenna; scape pale yellowish brown, pedicel, ring joint and funicle joints brown, clava

yellowish white. Legs (except hind coxa) pale yellowish brown.

Head (fig. 16 J) wider than thorax and transverse. Antennae inserted on a level with anterior edge of eyes, scape reach to median ocellus. Malar space more than half breadth of an eye. Clypeus with anterior margin arcuate. Head reticulated much stronger than thorax, the latter with very fine reticulation. Propodeum smooth with median carina (forked at base), plica, costulae, short nucha and a short sulcus spiracularis. Mesosternum smooth and a small prepectus. Petiole short with longitudinal carinae. Gaster (fig. 16 G) longer than thorax+head. Wings (fig. 16 H) reach base of petiole. Hind tibia with two spurs. Fore and hind coxae with fine transverse striation.

♂. Unknown.

Length: 4 mm.

Holotype: Musée Royal de l'Afrique centr. Tervuren. Congo, Mont Kabobo, Terr. Albertville, Hte. Kiymbi, 1700 m, X.1958, leg. N. Leleup.

D. nigrita sp.n. is similar to D. nigrofasciata sp.n. and about the differences see above and the key.

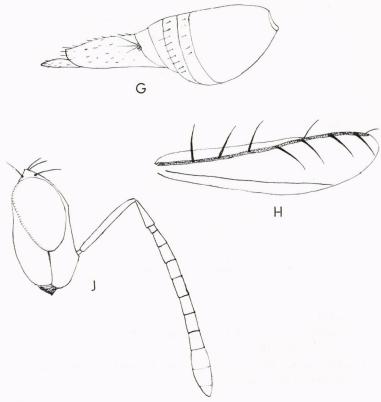


Fig. 16. Dipara nigrita sp.n. female, G. Gaster in lateral view, H. Fore wing and J. Head in lateral view.

# Dipara rufescens Masi

Masi, Novitates Zoologicae. 24, pp. 186-188, 1917.

Distribution: Seychelles.

Host: Unknown.

The author has only seen males. Male differs from the male of *Dipara* petiolata Walk. by having reddish brown colour (entirely), longer petiole and no long hairs on the antenna.

Following species are described as belonging to Dipara Walk.:

## Dipara latipennis Ashm.

Ashmead, Colo. Biol. Assoc. Bul. 1: 26, 46, 1890.

The author has seen the type  $(\delta)$  and it belongs to *Sphegigasterini* and seems best to be placed in *Callimerismus* Graham.

Callimerismus latipennis (Ashm.) comb. nov.

# Apterolelaps Ashm.

Ashmead, Fauna Hawaii. I, p. 312, 1901.

Syn.: Apterolaelaps Schulz, Spolia Hym. p. 144, 1906 According to Delucchi, Bol. Zool. Agr. Bachicolt. (2) I, p. 56, 1958 synonym to Trichoryphus Först=Dipara Walk.

The author has studied the type of *Apterolelaps nigripes* Ashm. and could not find any ring joint. The formula of antenna is 11073=12 joints, in *Dipara* Walk. 13 joints. It is best to held this genus separate until we have more specimens.

# Apterolelaps nigripes Ashm.

Ashmead, Carnegie Mus. Mem. 1: XI, p. 279, 1904.

Distribution: U.S.A. (W.Va.)

Host: Unknown.

## Pondia sp.n.

Head wider than thorax, occiput with a sharp margin. Antennae, 11173, inserted just below a level with anterior margin of eyes. Clypeus with anterior margin straight or a little arcuate. Mandibles with 3 teeth. No antennal furrow. Pronotum large, much larger than mesonotum, mesoprescutum very small of the same size as scapula. Notauli meet in the middle of mesonotum. Scutellum with frenum and 4 setae, all in front of frenum and the two anterior setae very small. Prepectus very small, indistinct. Propodeum long and large with nucha and small spiracles. Petiole longer than wide with a strong seta or bristle on anteriorly each side. Gaster with large 1st segment and protruding terebra.

Type: P. punctulata sp.n.

*Pondia* gen.n. is similar to both *Grahamisia* Del. and *Dipara* Walk. but differs as follows: Mesoscutum very small, notauli meet in the middle of mesonotum and petiole with a strong seta anteriorly on each side.

## Pondia punctulata sp.n.

♀. Head and thorax reddish brown with tint of blue on vertex. Antenna with scape, 7th funicle joint, clava, hind coxa, hind trochanter and base of hind femora white. Petiole reddish brown. Gaster brown with a whitish macula anteriorly and a whitish band at apex. All tarsi yellowish white.

Head (fig. 17 E) wider than thorax and strongly reticulated. Face with scattered hairs. Antennae, 11173, inserted just below a level with anterior edge of eyes. Clypeus with anterior margin straight. Occiput with a sharp margin. Malar space 2/3 of the breadth of an eye. Pronotum much larger than mesonotum, mid lobe (mesoprescutum) as large as scapula. Notauli (fig. 18 E) meet in the middle of mesonotum. Scutellum with frenum, posterior part small (the part behind frenum), prepectus very small indistinct. The whole thorax reticulated. Propodeum (fig. 18 E) large with nucha and

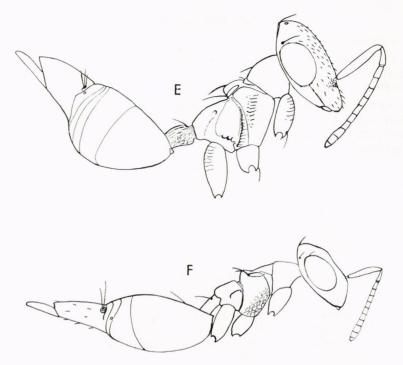


Fig. 17. E. Pondia punctulata sp.n. female in lateral view. F. Pondia pallida sp.n. female in lateral view.

small spiracle, the latter located laterally near the margin. The whole propodeum longitudinally striated. Petiole (fig. 18 E) with a strong bristle anteriorly on each side, dorsally is petiole longitudinal striated. Gaster (fig. 17 E) with 1st segment large, terebra exserted. Leg slender, fore and hind coxae transversely striated. Hind tibia with one spur. Wings very short.

#### ♂. Unknown.

Length: 1.7—2.7 mm.

Holotype: (Brit. Mus. Nat. Hist.) S. Africa, Pondoland, Port St. John,

Jan. 1924, leg. R. E. Turner.

Paratypes: 4  $\,^{\circ}$ , (Brit. Mus. Nat. Hist. and in coll. mea) 3  $\,^{\circ}$ , S. Africa, Pondoland, Port St. John, Jan. 1924, leg. R. E. Turner, 1  $\,^{\circ}$ , S. Africa, Pondoland, Port St. John, 1—17 Mar. 1924, leg. R. E. Turner.

#### Pondia pallida sp.n.

#### ♀. Entirely pale yellow.

Head (fig. 18 G) wider than thorax and only punctated in the middle of face. Antennae, 11173, inserted just below a level with anterior edge of eyes. Clypeus with anterior margin a little arcuate. Malar space as the breadth of an eye. Occiput with sharp margin. Ocelli small. Thorax as in *P. punctu-*

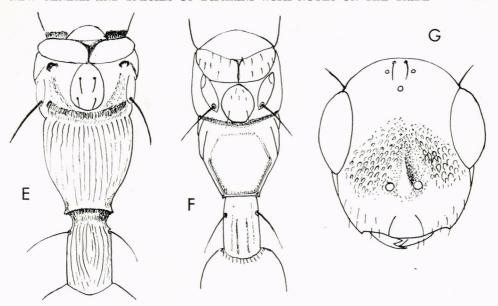


Fig. 18. E. *Pondia punctulata* sp.n. Petiole and propodeum in dorsal view, F. *Pondia pallida* sp.n. Propodeum and petiole in dorsal view and G. *Pondia pallida* sp.n. head in frontal view.

lata sp.n. but nearly smooth (except mesosternum below). Propodeum (fig. 18 F) smooth with nucha and complete plica. Petiole (fig. 18 F) nearly smooth. Gaster (fig. 17 F) elongate with 1st segment large and a exserted terebra. Fore and hind coxae with fine transverse striation, hind tibia with one spur. Wings very short.

#### ♂. Unknown.

Length: 2 mm.

Holotype: (Brit. Mus. Nat. Hist.) S. Africa, Pondoland, Port St. John,

Jan. 1924, leg. R. E. Turner.

Paratypes: 12  $^{\circ}$  (Brit. Mus. Nat. Hist. and in coll. mea) S. Africa, Pondoland, Port St. John, Jan. 1924  $(7\ ^{\circ})$  and 29.I—5.II 1924  $(5\ ^{\circ})$ . All paratypes leg. R. E. Turner.

## Key to the species of *Pondia* sp.n.

#### Conophorisca gen.n.

Head large wider than thorax. Antennae, 11173, inserted on a level with anterior margin of eyes. Eyes large, oval. Clypeus with a little arcuate anterior margin. Mandibles with 3 teeth. Occiput with a sharp carina. Face hollowed. Pronotum large much longer than mesonotum, posterior part of

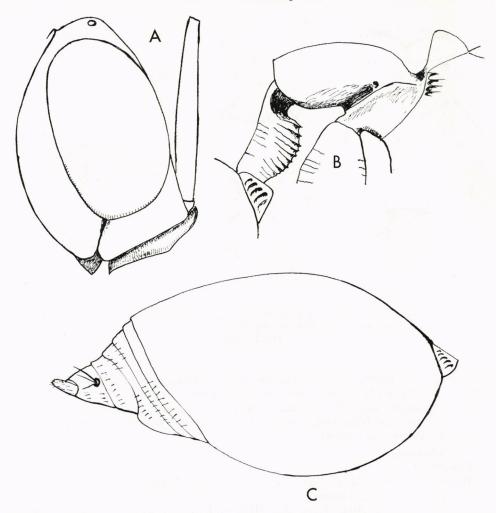


Fig. 19. Conophorisca annulata sp.n. female, A. Head in lateral view, B. Propodeum and petiole in lateral view and C. Gaster in lateral view.

pronotum gibbous. Mesonotum with mid lobe (mesoprescutum) as large as scapula, notauli complete. Scutellum conical with a longitudinal carina on the top. Prepectus indistinct. Propodeum very large and elongate with a median shallow groove, very elongated nucha, spiracle laterally at the end of sulcus spiracularis. Petiole longer than wide (twice as long as wide). Gaster short with 1st segment very large and nearly hidding the following segments. Terebra a little extruded. Fore- and hind coxae large, elongated, hind tibia with one spur. No wings.

Type: C. annulata sp.n.

C. is similar to *Turneria* gen.n. and *Pyramidophoriella* gen.n. but differs as follows; no gibbosity on the sides of propodeum and axillae very small. *Entomol. Ts. Arg. 90. H. 3-4, 1969* 

## Conophorisca annulata sp.n.

♀. Yellowish brown, antenna brown with anellus, 1st—2nd funicle joints white. Legs yellowish brown, fore coxa and hind legs pale yellowish white, base of hind coxa and femora above brown. Gaster brown, posterior of 1st segment dark brown.

Head (fig. 19 A) large wider than thorax. Antennae, 11173, inserted on a level with anterior margin of eyes. Eyes very large, oval. Malar space as long as 1/3 of the breadth of an eye. Occiput with a sharp carina. Face between eyes shallow hollowed. Clypeus a little arcuate. Between antennal sockets a longitudinal sharp carina. Scape of antenna reach to median ocellus. Head with fine reticulation. Pronotum large, posterior with a strong gibbosity. Mesonotum short with median lobe (mesoprescutum) as large as scapula. Notauli complete, nearly meeting in the middle of mesonotum. Axillae very small, indistinct. Prepectus small. Scutellum conical with a longitudinal carina on the top. Thorax with fine reticulation. Propodeum (fig. 19B) with fine longitudinal reticulation, large and elongate, very long nucha and a median shallow groove and spiracle laterally at the end of sulcus spiracularis. Petiole twice as long as wide and with transverse striation. Gaster (fig. 19 C) short with 1st segment very large. Terebra a little extruded. Foreand hind coxa large, elongate with transverse striation or carinae. Hind tibia with one spur. No wings.

♂. Unknown.

Length: 2.5 mm.

Holotype: (Brit. Mus. Nat. Hist.) E. Cape Prov., Katherg, 4,000 ft, 1—15.I 1933, leg. R. E. Turner.

Paratypes: (coll. mea). Cape Prov., Mossel Bay, Aug. 1924, leg. R. E. Turner.

*C. annulata* sp.n. belongs to same group of genera as *Turneria* gen.n. and *Pyradimophoriella* gen.n. and differs from the species of those genera by having no gibbosity on the propodeum and very small axillae.

Following genera belong possibly to *Diparini* but they are very difficult to place without seeing the types.

# Neapterolelaps Girlt.

Girault, Trans. Roy. Soc. South Austr. 37, p. 86, 1913 Mem. Queensl. Mus. 4, p. 200, 1915.

"Antennae 12 jointed, one ring-joint, the parapsidal furrows absent, posterior tibiae armed with two very long spurs, one of which is comparatively enormous, much larger than the other. Wings entirely absent. Abdomen with very short, transverse petiole but the propodeum prolonged into a hood-like neck to meet it, no median carina on propodeum. Mandibles bi- and tridentate, in the latter the middle tooth shortest."

Type: N. lodgei Girlt.

N. lodgei Girault, ibid., p. 86—87. N. leai Dodd, Trans. Roy. Soc. South Austr. XLVIII, p. 168, 1928 Queensland Lord Howe I.

## Pseudiparella Girlt.

Girault, Rec. S. Austr. Mus. 3, pp. 334-335, 1927.

"Habitus of *Lelaps*, but hind tibial spur single, short. Antennae in middle of face, 11-jointed, with a short ring-joint and a solid club, jaws 3-dentate, maxillary palpi 4-jointed. Parapsidal furrows short, obtusely joined just before apex scutum. Scutellum with a cross-suture at base of distal 1/3. Propodeum with a median carina and short neck, petiole quadrate. Segment 2 half of surface, twice 3, which is larger; ovipositor not extruded. Wings abbreviated, reaching base of abdomen, clavate, truncate at apex, brown, naked except for 4—5 very elongate, gross setae from the venation, which extends nearly to apex and terminates in a sessile, globulus stigmal vein."

Type: P. emersoni Girlt.

P. emersoni Girault, ibid., p. 335. Tasmania.