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## Two new species of *Parentia* Hardy, 1935 (Diptera: Dolichopodidae) from South Africa

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All-Russian Institute of Plant Protection, Podbelskiy Roadway, 3, St Petersburg, Pushkin 196608 Russia. E-mail: grichanov@mail.ru

**Abstract.** Two new species of the genus *Parentia* Hardy, 1935 from South Africa are described. An identification key to males of seven Afrotropical species is compiled for the first time. *Parentia magnicornis* sp. n. male differs reliably from other Afrotropical species of the genus in enlarged antennal postpedicel and modified 2<sup>nd</sup> segment of the mid tarsus. *Parentia theroni* sp. n. male differs from all other Afrotropical species of the genus in ratio of wing crossvein dm-m to distal part of vein M<sub>4</sub> and absence of anterodorsal callus on hind tibia. Male of *Parentia degener* (Parent, 1934) is reliably described and illustrated for the first time.

**Key words:** Sciaropodinae, *Parentia*, South Africa, Afrotropical, new species.

### Два новых вида *Parentia* Hardy, 1935 (Diptera: Dolichopodidae) из Южной Африки

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Всероссийский институт защиты растений, шоссе Подбельского, 3, Санкт-Петербург, Пушкин 196608 Россия. E-mail: grichanov@mail.ru

**Резюме.** Описаны два новых вида рода *Parentia* Hardy, 1935 из Южной Африки. Впервые составлен определитель семи афротропических видов по самцам. Самец *Parentia magnicornis* sp. n. достоверно отличается от других афротропических видов рода увеличенным третьим члеником усиков и модифицированным вторым члеником средних лапок. Самец *Parentia theroni* sp. n. отличается от всех других афротропических видов рода соотношением поперечной жилки крыла dm-m и дистальной части жилки M<sub>4</sub> и отсутствием переднедорсальной ареолы на задних голених. Самец *Parentia degener* (Parent, 1934) впервые достоверно описан и иллюстрирован.

**Ключевые слова:** Sciaropodinae, *Parentia*, Южная Африка, Тропическая Африка, новые виды.

The *Parentia* Hardy, 1935 is primarily Australasian genus of Sciaropodinae comprising over 70 species described mainly from southern Australia, New Zealand and New Caledonia [Bickel, 2006]. Five species from South Africa, Mozambique, Namibia and Zimbabwe have been placed in *Parentia* [Grichanov, 2018]; however, further studies are required to ascertain if they are indeed congeneric with the Australasian species [Grichanov, Brooks, 2017]. There are currently no identification keys to Afrotropical species of the genus.

In this paper, two new species of the genus *Parentia* from South Africa are described, *P. degener* (Parent, 1934) is redescribed, and an identification key to males of seven Afrotropical species is provided for the first time.

### Material and methods

The types of new species and other material examined are housed at the Natal Museum (NMSA, Pietermaritzburg, KwaZulu-Natal, South Africa), the National Museum (BMSA, Bloemfontein, South Africa), and the Swedish Museum of Natural History (NHRS, Stockholm, Sweden).

Specimens have been studied and photographed with a ZEISS Discovery V-12 stereo microscope and an AxioCam MRc5 camera. Morphological terminology and abbreviations follow Cumming and Wood [2017] and Grichanov and Brooks [2017]. The lengths of the podomeres

are given in millimetres. Body length is measured from the base of the antenna to the tip of abdominal segment 6. Wing length is measured from the base to the wing apex. The figures showing the hypopygium in lateral view is oriented as it appears on the intact specimen, with the morphologically ventral surface of the genitalia facing upwards, dorsal surface downwards, anterior end facing right and posterior end facing left.

### Genus *Parentia* Hardy, 1935

**Diagnosis.** See Bickel [1994] and Grichanov and Brooks [2017] for diagnosis of the genus. Grichanov and Brooks [2017] have provided a key to all Afrotropical genera of the subfamily Sciaropodinae.

Afrotropical *Parentia* species are the closest to the Afrotropical *Condylostylus burgeoni* species-group, both bearing strong lateral scutellars, more than half length of medians, and having unmodified male wing venation, with straight posterior cross-vein dm-m. The following characters of Afrotropical *Parentia* never occur in the Afrotropical *Condylostylus* Bigot, 1859 [Grichanov, 2020]: the male hind tibia with distinct callus or areole in basal 1/2; the male terminalia with hypandrium and phallus long and thick; the surstylus and/or epandrial lobe well-developed; the wing vein M<sub>2</sub> arcuate and forming a broad U-shaped figure with M<sub>1</sub>. The following characters are variable, but usually or rarely occur in both Afrotropical and

Australasian *Parentia*: head with face broad, slightly bulging in male, and clypeus semicircular; male pedicel sometimes with corona of strong apical setae; arista-like stylus dorsal or dorsoapical; femora in male often with long, distally decreasing anteroventral and posteroventral bristles; tibial chaetotaxy weak; male fore basitarsus unmodified; some male mid tarsomeres modified. Male hind tarsomeres 3–5 are usually pad-like, and male terminalia with cercus usually with ventral projection in Australasian species; but hind tarsomeres are usually simple, and cercus without ventral projection in Afrotropical species.

#### Key to Afrotropical *Parentia* species (males)

1. All femora brown-black ..... 2
  - All femora yellow, at most hind femur with dark apical spot ..... 4
2. Distal part of wing vein  $M_4$  nearly 2 times longer than dm-m; hind tibia without callus, with strong anterodorsal bristle at basal fourth (Figs 12–15); body 3.3 mm (South Africa) ..... *P. theroni* sp. n.
  - Distal part of wing vein  $M_4$  about half as long as dm-m; hind tibia with anterodorsal callus at basal third ..... 3
3. All femora with mainly black ventral setae and hairs on basal half, up to 2 times longer than width of femora; mid tibia with long and strong preapical dorsal bristle (Fig. 22) [Grichanov, 2003: 339; Grichanov, 2011: figs 263, 264]; body 4–5 mm (Mozambique, South Africa) ..... *P. angustipennis* (Loew, 1858)
  - All femora with mainly white ventral hairs on basal half, up to 1.5 times longer than width of femora; mid tibia without long and strong preapical dorsal bristle (Figs 16–21, 25); body 3.5–3.6 mm (South Africa) ..... *P. degener* (Parent, 1934)
4. Distal part of wing vein  $M_4$  as long as dm-m; mid tarsus with simple setulae, with narrow shining areole at distal 1/3 of ventral side of basitarsus, and free of setulae; hypopygium as in Fig. 27; body 3.1–3.3 mm (South Africa) ..... *P. substenura* Grichanov, 1999
  - Distal part of wing vein  $M_4$  1.5–2 times shorter than dm-m; mid tarsus differently ornamented ..... 5
5. Antenna with postpedicel large, about 2 times higher and 3 times longer than pedicel; mid tarsomere 2 swollen on basal half, deeply excavated dorsally, with 2 rows of strong setae along excavation (Fig. 1–7); body 5–5.5 mm (South Africa) ..... *P. magnicornis* sp. n.
  - Antenna with postpedicel small, about as large as pedicel; mid tarsomere 2 not swollen ..... 6
6. Fore and mid femora with long ventral hairs on basal half; mid basitarsus with conspicuous short ventral spines and one strong subapical ventral spine, with apex produced lappet-like over segment 2 (after Curran [1926] as for *Condylostylus sicatrix* Curran, 1926); hypopygium as in Fig. 26; body 4–5 mm (South Africa, Zimbabwe) ..... *P. stenura* (Loew, 1858)
  - Fore femur with short hairs; mid femur with one ventral seta at base, as long as femur diameter; mid basitarsus with elongate setulae, with areole on distal half of ventral side, free of setulae; hypopygium as in Figs 23, 24; body 3.6–4.4 mm (Namibia, South Africa) ..... *P. asymmetrica* Grichanov, 2000

#### *Parentia magnicornis* sp. n. (Figs 1–11)

**Material.** Holotype, ♂ (BMSA): South Africa, Western Cape, Gamkaskloof (Die Hel), 33°21.808'S / 21°37.650'E, Karoo and valley, Acacia woodland, Malaise trap, 16–18.10.2012 (A.H. Kirk-Spriggs). Paratypes: 1♂, 1♀ (BMSA), same collection data as for the holotype (male terminalia dissected and stored in glycerin in microvial pinned with the specimen).

**Description.** Male (Fig. 1). Head (Fig. 2). Frons shining blue; 1 strong vertical and 1 strong postvertical bristle present; upper postocular setae black, short, uniserial; ventral postcranium covered with long irregular white hairs; face and clypeus metallic blue-green; face with weak white pruinosity below, broad, under antennae 2 times wider than high, narrowed downward, about as high as clypeus; clypeus with dusting of white pruinosity, small, separated from margin of eyes; antennae black (Fig. 3), with scape and pedicel small, simple; pedicel with ring of short bristles, about as long as scape and pedicel combined; postpedicel large, ovoid, slightly longer than high (5 : 4), glabrous; arista-like stylus black, dorsoapical, glabrous; length (mm) of scape, pedicel, postpedicel, stylus (segments 1 and 2), 0.09 : 0.08 : 0.25 : 0.05 : 1.46; palpus yellow with white hairs; proboscis yellow-orange with white hairs.

Thorax. Dark metallic blue; pleura with weak white pruinosity; setae black; 3 strong dorsocentral bristles with 2 hair-like setae anteriorly; 3 long irregularly paired acrostichals; scutellum with 2 strong and 2 lateral bristles, about 2/3 as long as medial bristles.

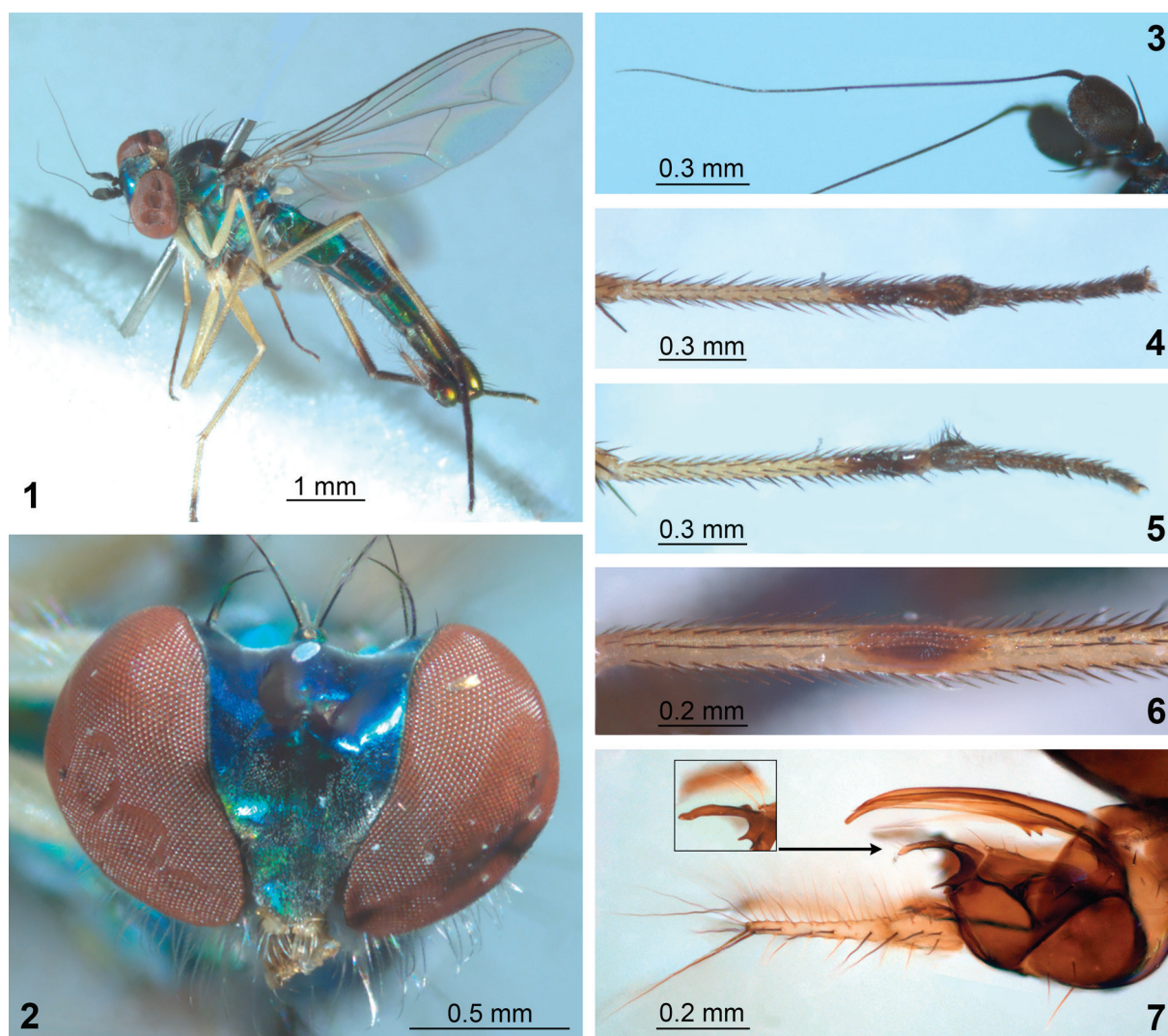
Legs mostly yellow, but mid and hind coxae mostly black; fore and mid tarsi brown-black from tip of basitarsus; hind femur with brownish spot at knee; hind tibia with dark brown anterodorsal callus at basal third and black on distal fifth (Fig. 6); hind tarsus black; fore and mid coxae with white hairs and 3 white subapical bristles; hind coxa with 1 yellow bristle and several hairs; fore and mid femora with ventral rows of white hairs on basal half, 1.5 times longer than diameter of femora; hind femur with posteroventral hairs at base; fore tibia and tarsus simple, without strong setae or remarkable hairs; mid tibia with short anterodorsal seta at basal fourth and 2 strong apicals; mid tarsomere 2 swollen on basal half, deeply excavated dorsally, with 2 rows of strong setae along excavation (Figs 4, 5); hind tibia with 2–3 short apicals; hind tarsomere 5 flattened; femur, tibia and tarsomere (from first to fifth) length ratio (mm): fore leg: 1.09 : 1.33 : 0.79 : 0.26 : 0.17 : 0.13 : 0.12; mid leg: 1.44 : 1.79 : 1.06 : 0.23 : 0.23 : 0.13 : 0.12; hind leg: 1.86 : 2.27 : 0.94 : 0.45 : 0.33 : 0.22 : 0.17.

Wing (Fig. 1). Widest at middle, almost hyaline, veins yellow-brown; costa with simple setulae;  $R_1$  long;  $R_{4+5}$  gently curved to  $M$  in apical third;  $M_2$  arcuate and forming a broad U-shaped figure with  $M_1$ ; ratio of parts of costa between  $R_{2+3}$  and  $R_{4+5}$  to those between  $R_{4+5}$  and  $M_1$ , 0.39 : 0.08; crossvein dm-m almost straight; ratio of crossvein dm-m to apical part of  $M_{1+2}$  (fork-handle) to apical part of  $M_4$ , 0.7 : 0.53 : 0.34; anal vein fold-like; anal lobe and alula well developed; anal angle acute; lower calypter yellow with brown rim and white cilia; halter light yellow.

Abdomen. Terga 1–4 metallic greenish blue, 5–6 metallic bronze-green, with black marginal setae; tergum 1 with white hairs; segments 7 and 8 and hypopygium greenish black (Fig. 7); hypandrium basoventral, long; phallus with 2 dorsal teeth; cercus yellow, brown at base, slightly longer than epandrium, slightly swollen at base, narrow at apex, with numerous black hairs and setae along entire length; surstylus thin, short, black, with several short setae, strong basodorsal acute lobe and small inner basal tooth; epandrial lobe reduced, with 2 long and 2 short epandrial setae.

Measurements (mm). Body length 5 (paratype) – 5.5 (holotype); antenna length 1.9; wing length 4 (paratype) – 4.6 (holotype); wing width 1.4.

Female (Fig. 8). Similar to male except lacking male secondary sexual characters. Face with somewhat denser white pruinosity, narrower, under antennae 1.5 times wider than high; postpedicel small, as long as high, with short hairs (Fig. 9); length (mm) of scape,



Figs 1–7. *Parentia magnicornis* sp. n., male, general view and details of structure.

1–6 – holotype: 1 – habitus, 2 – head, 3 – antenna, 4 – mid tarsus, dorsal view, 5 – mid tarsus, lateral view, 6 – hind tibia, lateral view; 7 – paratype, hypopygium after maceration, left lateral view, with inset showing surstylus, latero-ventral view.

Рис. 1. *Parentia magnicornis* sp. n., самец, общий вид и детали строения.

1–6 – голотип: 1 – общий вид, 2 – голова, 3 – усик, 4 – средняя лапка, вид сверху, 5 – средняя лапка, вид сбоку, 6 – задняя голень, вид сбоку; 7 – паратип, гипопигий после размачивания, вид сбоку, с врезкой, показывающей сурстиль латероventрально.

pedicel, postpedicel, stylus (segments 1 and 2), 0.08 : 0.09 : 0.13 : 0.07 : 0.99 (Fig. 10); legs simple, with simple bristles and setulae; hind tibia with anterodorsal bristle instead of callus at basal third; femur, tibia and tarsomere (from first to fifth) length ratio (mm): fore leg: 1.01 : 1.22 : 0.57 : 0.23 : 0.17 : 0.12 : 0.12; mid leg: 1.2 : 1.38 : 0.88 : 0.33 : 0.21 : 0.14 : 0.11; hind leg: 1.51 : 1.84 : 0.82 : 0.39 : 0.31 : 0.23 : 0.14; ratio of parts of costa between  $R_{2+3}$  and  $R_{4+5}$  to those between  $R_{4+5}$  and  $M_1$ , 0.33 : 0.08; ratio of crossvein dm-m to apical part of  $M_{1+2}$  (fork-handle) to apical part of  $M_4$ , 0.54 : 0.43 : 0.27.

Measurements (mm). Body length 4.3 (paratype); antenna length 1.3; wing length 3.5; wing width 1.1.

**Diagnosis.** *Parentia magnicornis* sp. n. male differs reliably from other Afrotropical species of the genus in enlarged antennal postpedicel and modified mid tarsomere 2. The postpedicel is large, about 2 times higher and 3 times longer than pedicel; the mid tarsomere 2 is swollen on basal half, deeply excavated dorsally, with 2 rows of strong setae along excavation. The postpedicel is

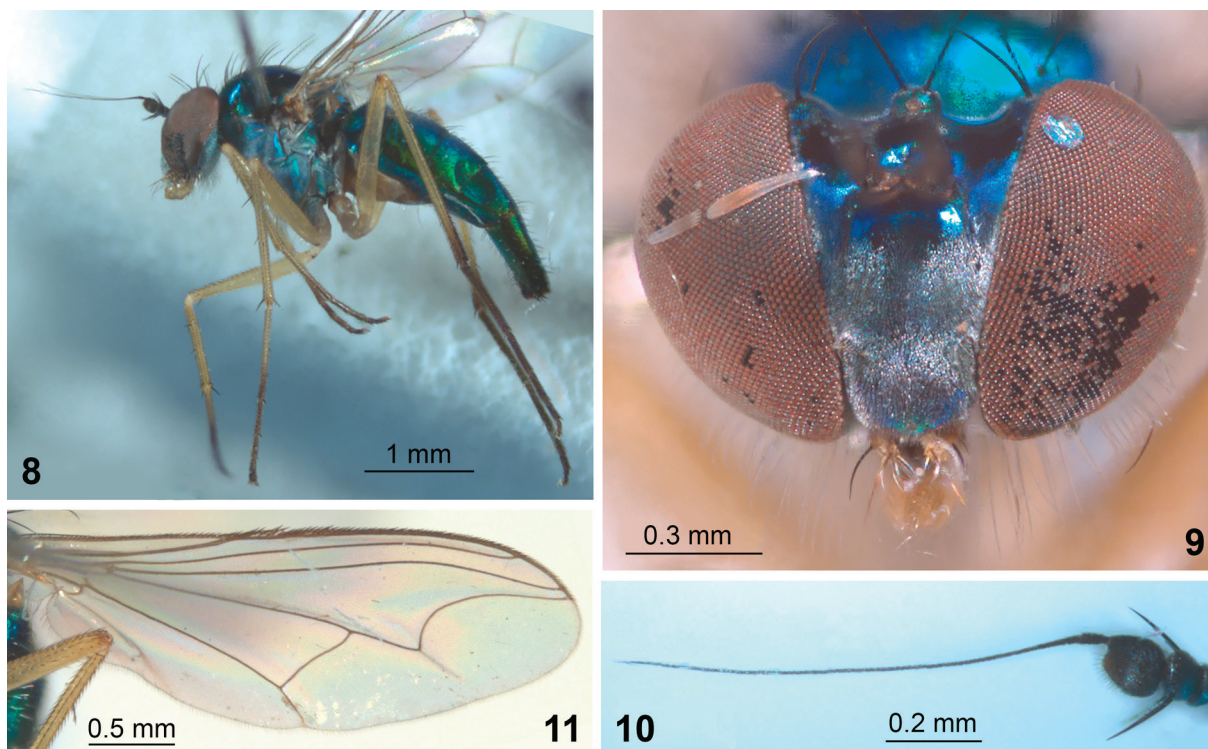
small, about as large as pedicel, and the mid tarsomere 2 is simple in other species. Male hypopygium of the new species is species-specific (Fig. 7). Female is probably indistinguishable from females of other species with yellow femora.

**Etymology.** From Latin ‘magnus’, ‘cornu’ – with large antenna.

*Parentia theroni* sp. n.  
(Figs 12–15)

**Material.** Holotype, ♂ (NMSA): South Africa [Western Cape], Bokfontein, Ceres, [32°50'27"S / 19°14'42"E], 8.08.1985 (J.G. Theron) (terminalia dissected and stored in glycerin in microvial pinned with the specimen).

**Description.** Male (Fig. 12). Head (Fig. 13). Frons shining blue-violet; 1 strong vertical and 1 strong postvertical bristle present; upper postocular setae black, short, uniserial; ventral



Figs 8–11. *Parentia magnicornis* sp. n., female, paratype.  
8 – habitus; 9 – head; 10 – antenna; 11 – wing.  
Рис. 2. *Parentia magnicornis* sp. n., самка, паратип.  
8 – общий вид; 9 – голова; 10 – усик; 11 – крыло.

postcranium covered with long irregular white hairs; face and clypeus metallic blue; face broad, under antennae 1.75 times wider than high, narrowed downward, 1.8 times as high as clypeus; clypeus with weak white pruinosity, small, separated from margin of eyes; antennae black (Fig. 14), with scape and pedicel small, simple; pedicel with ring of short, ventrally long setae, about as long as scape and pedicel combined; postpedicel small, rounded, as long as high (9 : 10), short-haired; arista-like stylus black, dorsoapical, microscopically haired; length (mm) of scape, pedicel, postpedicel, stylus (segments 1 and 2), 0.07 : 0.07 : 0.09 : 0.06 : 0.99; palpus black with 3 black setae; proboscis black.

Thorax. Dark metallic blue; pleura with weak white pruinosity; setae black; 3 strong dorsocentral bristles with 2 hair-like setae anteriorly; 2 pairs of strong acrostichals; scutellum with 2 pairs of strong bristles.

Legs mostly black; coxae and femora with metallic greenish reflection; fore and mid tibiae yellow; fore and mid basitarsi at base and hind tibia on basal half yellowish brown; fore and mid coxae with white hairs and 3 white subapical bristles; hind coxa with 1 yellow bristle at base and several white hairs below; femora with ventral rows of short white hairs on basal half, shorter than diameter of femora, with 1–2 posteroventral subapical setae; fore tibia and tarsus simple; fore tibia with 3 strong apical setae; mid tibia with strong anterodorsal bristle at basal third and 4–5 strong apicals; mid tarsus simple; hind tibia without callus, with strong anterodorsal bristle at basal fourth, 3–4 short dorsals and 3–4 strong apicals; femur, tibia and tarsomere (from first to fifth) length ratio (mm): fore leg: 0.72 : 0.75 : 0.44 : 0.16 : 0.13 : 0.1 : 0.1; mid leg: 0.92 : 1.06 : 0.54 : 0.22 : 0.19 : 0.13 : 0.12; hind leg: 0.98 : 1.38 : 0.5 : 0.32 : 0.24 : – : –.

Wing (Fig. 12). Widest at middle, almost hyaline, smoky along costa, veins yellow-brown; costa with simple setulae;  $R_1$  long;  $R_{4+5}$  gently curved to M in apical third;  $M_2$  arcuate and forming

a broad U-shaped figure with  $M_1$ ; ratio of parts of costa between  $R_{2+3}$  and  $R_{4+5}$  to those between  $R_{4+5}$  and  $M_1$ , 0.22 : 0.08; crossvein dm-m almost straight; ratio of crossvein dm-m to apical part of  $M_{1+2}$  (fork-handle) to apical part of  $M_4$ , 0.29 : 0.42 : 0.53; anal vein fold-like; anal lobe and alula well developed; anal angle acute; lower calypter dirty yellow with blackish rim and black cilia; halter greyish yellow.

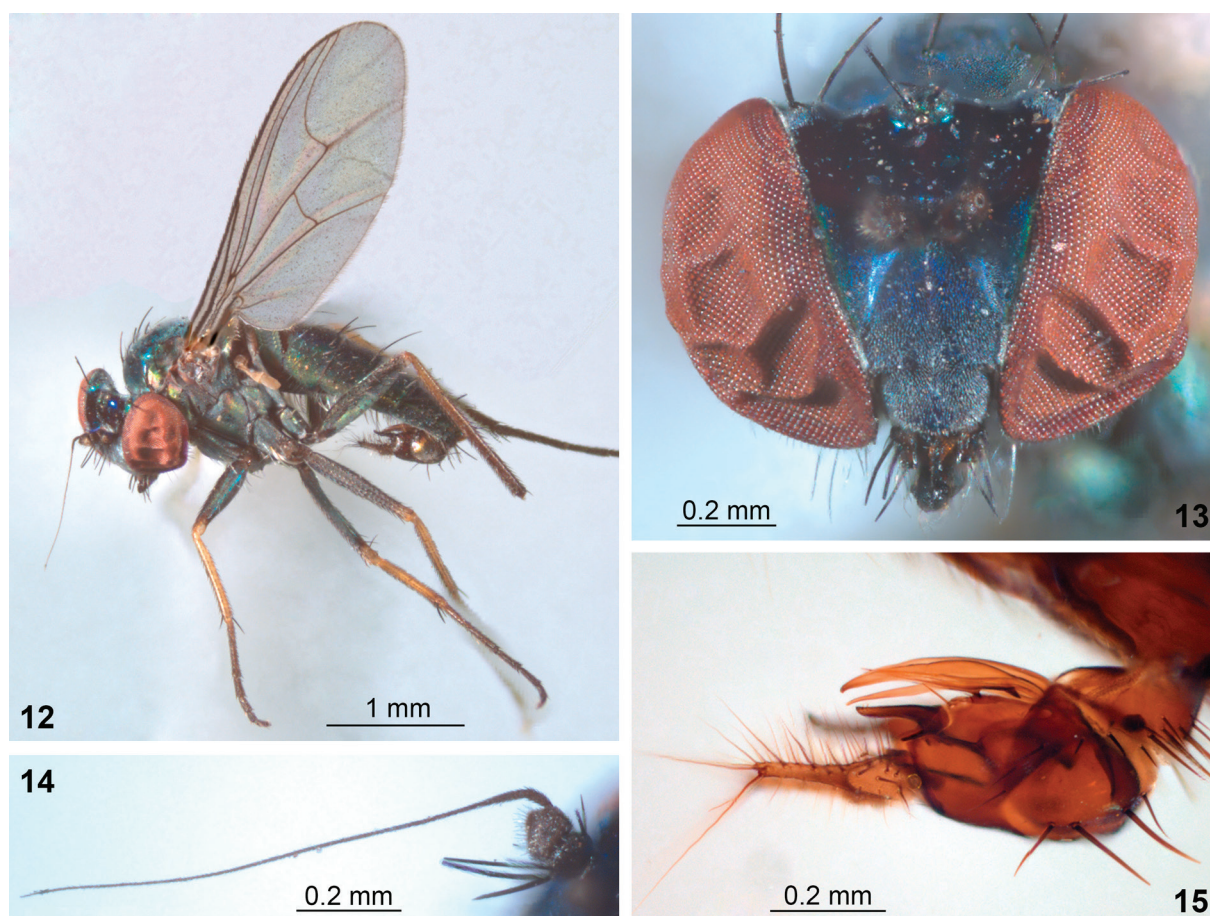
Abdomen. Metallic greenish blue, with black marginal setae; tergum 1 with white hairs; segments 7 and 8 with unusually strong bristles; hypopygium black with brown-black appendages (Fig. 15); hypandrium basoventral, long, with subequal in length narrow lateral arms; phallus with 2 strong dorsal teeth; cercus distinctly shorter than epandrium, slightly swollen at base, narrow at apex, with numerous black hairs and setae along entire length; surstylus thin, short, with few short setae at apex and strong basodorsal acute lobe; epandrial lobe reduced, with 1 rather long and 2 short epandrial setae.

Measurements (mm). Body length 3.3; antenna length 1.2; wing length 2.8; wing width 1.1.

Female unknown.

**Diagnosis.** *Parentia theroni* sp. n. differs from all other Afrotropical species of the genus in ratio of wing crossvein dm-m to distal part of vein  $M_4$  and absence of anterodorsal callus on hind tibia, which instead callus bears a strong anterodorsal bristle at basal fourth;  $M_1$  is about 2 times longer than dm-m in the new species.  $M_4$  is about half as long as dm-m in other species with black femora. Male hypopygium of the new species is species-specific (Fig. 15).

**Etymology.** The new species is named after the South African entomologist Dr J.G. Theron who collected the holotype.



Figs 12–15. *Parentia theroni* sp. n., male, holotype.

12 – habitus; 13 – head; 14 – antenna; 15 – hypopygium after maceration, left lateral view.

Рис. 12–15. *Parentia theroni* sp. n., самец, голотип.

12 – общий вид; 13 – голова; 14 – усик; 15 – гипопигий после размачивания, вид сбоку.

*Parentia degener* (Parent, 1934)  
(Figs 16–21)

*Condylostylus degener* Parent, 1934: 119 (type locality: South Africa, [KwaZulu-] Natal, Kloof [29°47'S, / 30°50'E]).

*Ethiosciapus degener*: Grichanov, 1998: 81.

*Parentia degener*: Grichanov, 1999: 120.

**Material.** 1♂ (NMSA), [South Africa: KwaZulu-] Natal, Durban, Congella [29°52'S / 31°00'E], 28.11.1926 (A.L. Bevis) (terminalia dissected and stored in glycerin in microvial pinned with the specimen).

**Redescription.** Male (Fig. 16). Head (Fig. 17). Frons shining blue-green; 1 strong vertical and 1 strong postvertical bristle present; upper postocular setae black, short, uniserial; ventral postcranium covered with long irregular white hairs; face and clypeus metallic blue-green; face broad, under antennae 1.5 times wider than high, narrowed downward, 1.3 times as high as clypeus; clypeus with weak white pruinosity, small, indistinctly separated from margin of eyes; antennae black (Fig. 18), with scape and pedicel small, simple; pedicel with ring of setae, ventrally longer, 2–3 times as long as scape and pedicel combined; postpedicel small, rounded, as long as high (9 : 8), short-haired; arista-like stylus black, dorsoapical, microscopically haired; length (mm) of scape, pedicel, postpedicel, stylus (segments 1 and 2), 0.08 : 0.07 : 0.08 : 0.05 : 1.01; palpus black with 2 black setae; proboscis brown.

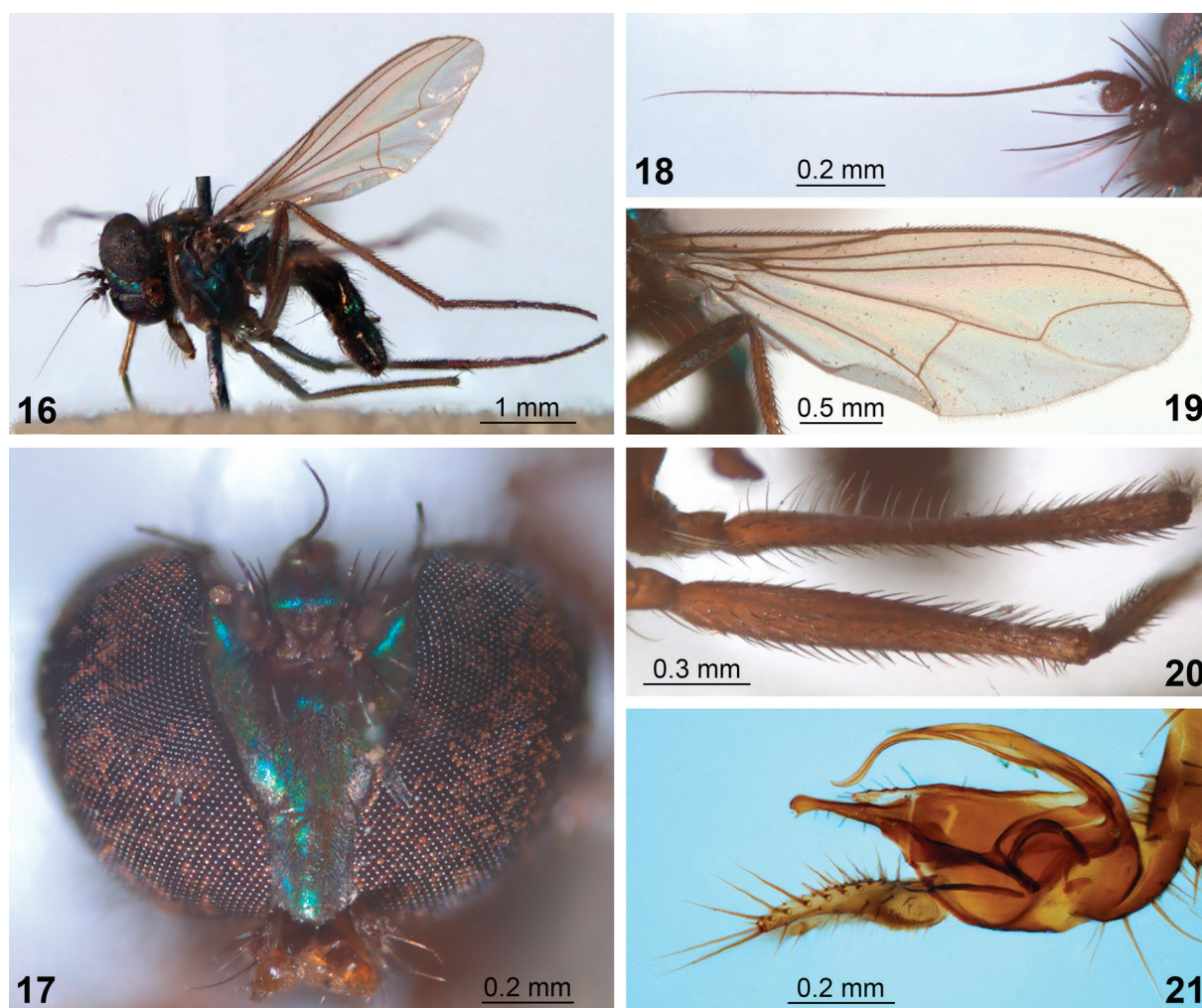
Thorax. Dark metallic blue; pleura with weak white pruinosity; setae black (partly broken); 3 strong dorsocentral

bristles with 2 short setae anteriorly; 2 pairs of strong acrostichals; scutellum with 2 pairs of strong bristles.

Legs brown-black (look somewhat discoloured); fore and mid tibiae brown; fore and mid coxae with white hairs and 3 white subapical bristles; hind coxa with 1 yellow bristle at base and several white hairs below; femora (Fig. 20) with ventral rows of white hairs on basal half, about as long as diameter of femora, with ventral rows of black hairs on distal half, at most as long as diameter of femora; fore tibia and tarsus simple; fore tibia with 3 weak apical setae; mid tibia with 2–3 short apicals; mid basitarsus flattened on distal half; hind tibia with distinct furrow at basal third, weak dorsals and apicals; femur, tibia and tarsomere (from first to fifth) length ratio (mm): fore leg: 1.1 : 1.08 : 0.66 : 0.3 : 0.21 : 0.12 : 0.11; mid leg: 1.17 : 1.61 : 1.03 : 0.25 : 0.22 : 0.12 : 0.12; hind leg: 1.3 : 2 : 0.79 : 0.35 : 0.27 : 0.18 : –.

Wing (Fig. 19). Widest at middle, smoky along veins, veins brown; costa with simple setulae;  $R_1$  long;  $R_{4+5}$  gently curved to  $M$  in apical third;  $M_2$  fold-like, arcuate and forming a broad U-shaped figure with  $M_1$ ; ratio of parts of costa between  $R_{2+3}$  and  $R_{4+5}$  to those between  $R_{4+5}$  and  $M_1$ , 0.32 : 0.1; crossvein dm-m almost straight; ratio of crossvein dm-m to apical part of  $M_{1+2}$  (fork-handle) to apical part of  $M_1$ , 0.41 : 0.5 : 0.27; anal vein fold-like; anal lobe and alula well developed; anal angle acute; lower calypter dirty yellow with blackish rim and black cilia; halter greyish yellow.

Abdomen. Metallic greenish blue, with black marginal setae; tergum 1 with white hairs; hypopygium black with brown-black appendages (Fig. 21); hypandrium basoventral, long; phallus with



Figs 16–21. *Parentia degener*, male.

16 – habitus; 17 – head; 18 – antenna; 19 – wing; 20 – mid and hind femora, dorsal view; 21 – hypopygium after maceration, left lateral view.

Рис. 16–21. *Parentia degener*, самец.

16 – общий вид; 17 – голова; 18 – усик; 19 – крыло; 20 – среднее и заднее бедра, вид сверху; 21 – гипопигий после размачивания, вид сбоку.

2 dorsal teeth; cercus distinctly shorter than ependrium, slightly swollen at base, narrow at apex, with numerous black hairs and setae along entire length; surstylus thin, long, with several short setae and small subapical process; ependrial lobe reduced, with row of 8–10 short setae on distoventral projection of ependrium.

Measurements (mm). Body length 3.5 (after Parent [1934]) – 3.6; antenna length 1.3; wing length 3.5; wing width 1.2.

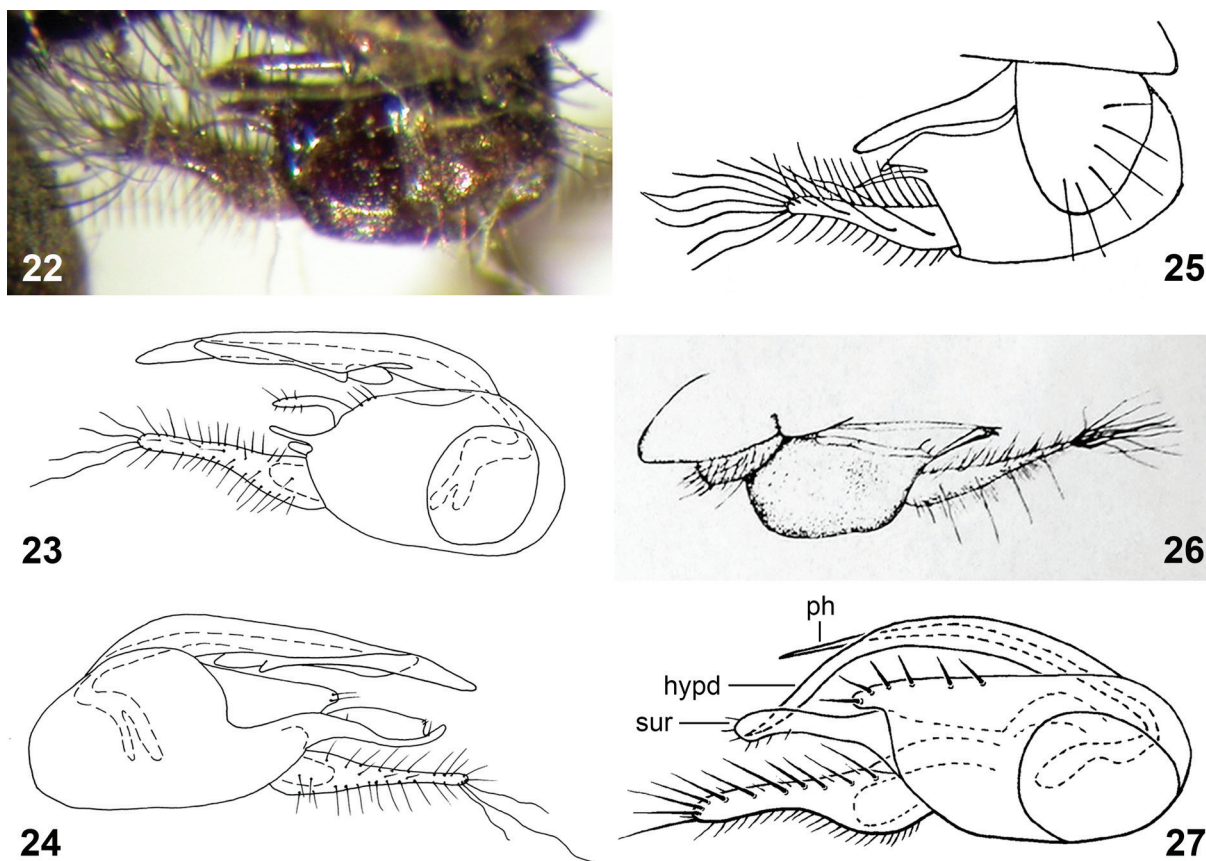
Female unknown.

**Diagnosis.** *Parentia degener* is close to *P. angustipennis* (the holotype was examined in the NHRS collection; Fig. 22), differing from the latter in all femora bearing mainly white ventral hairs on basal half, up to 1.5 times longer than width of femora; mid tibia without long and strong preapical dorsal bristle; fore basitarsus, mid tibia and basitarsus with simple setulae; mid basitarsus not swollen in distal 2/3, but flattened in distal half. *Parentia angustipennis* males can be distinguished by all femora bearing mainly black ventral setae and hairs on basal half, up to 2 times longer than width of femora; mid tibia with long and strong preapical dorsal bristle; fore basitarsus with row of erect ventral setulae; mid tibia and basitarsus with

2 rows of erect or semierect setulae; mid basitarsus slightly swollen in distal 2/3.

**Notes.** Parent [1934] described *Condylostylus degener* by a single male collected from environs of Durban in August 1926. The holotype (in the Natural History Museum, London, UK; not examined) was strongly damaged, and the description lacked some important male secondary sexual characters on antennae, middle and hind legs. The species was never recorded after its description. While working in NMSA, the author of this paper was lucky, finding a male collected from environs of Durban, which is very close (about 25 km) to the type locality of *C. degener*, at about the same time. This specimen apparently belongs to the genus *Parentia*, corresponding almost entirely with the incomplete Parent's description and schematic figure of hypopygium (Fig. 25). It seems that the species occurs in the same area as more common in KwaZulu-Natal *P. angustipennis* [Grichanov et al., 2011] and may represent a juvenile form of the latter.

**Distribution.** South Africa (KwaZulu-Natal).



Figs 22–27. *Parentia* spp., male hypopygium. 22 – *P. angustipennis* (dry holotype, NHRS); 23–24 – *P. asymmetrica* (after Grichanov [2000]); 25 – *P. degener* (after Parent [1934]); 26 – *P. stenura* (after Curran [1926] as for *Condylostylus sicatrix*); 27 – *P. substenura* (after Grichanov [1999]). 22–23, 25, 27 – left lateral view; 24, 26 – right lateral view. Abbreviations: hypd – hypandrium; ph – phallus; sur – surstylus.

Рис. 22–27. *Parentia* spp., гипопигий.

22 – *P. angustipennis* (голотип, NHRS); 23–24 – *P. asymmetrica* (по [Grichanov, 2000]); 25 – *P. degener* (по [Parent, 1934]); 26 – *P. stenura* (по [Curran, 1926] для *Condylostylus sicatrix*); 27 – *P. substenura* (по [Grichanov, 1999]). 22–23, 25, 27 – вид слева; 24, 26 – вид справа. Сокращения: гипд – гипандрий; ph – фаллус; sur – сурстиль.

## Discussion

Bickel [2006] supposed that the genus *Parentia* is a Gondwanan genus spread from New Zealand and New Caledonia to Australia and Fiji. Grichanov [1999] associated his new species *P. substenura* and three old Afrotropical *Condylostylus* species with this genus for the first time. Later one more new species (*P. asymmetrica*) was described [Grichanov, 2000] and new records for known species were published [Grichanov et al., 2011]. With the new species described here, *Parentia* includes seven species distributed in the southern Africa northward to Kunene River and Zambezi River. The South African subcontinent was a part of Gondwana during the Jurassic geological period (200–145 million years ago, or Mya). The widening of the proto-Atlantic, proto-Indian, and Southern Oceans around the southern Africa began in the Early Cretaceous (about 120 Mya). However, the ancient Dolichopodidae known from this period belong to extinct genera of Microphoridae and primitive Dolichopodidae, i.e. Parathalassinae and similar forms [Grimaldi, Cumming, 1999]. The much younger Baltic amber fauna (50–30 Mya)

contains eight extinct genera with 37 described species belonging to five dolichopodid subfamilies represented in the recent fauna as well [Grichanov, Negrobov, 2018]. Only one rather primitive genus *Wheelerenomyia* Meunier, 1907 described from that amber belongs to the subfamily Sciapodinae. Both Ulrich [2003] and Grichanov, Negrobov [2018] doubted the assignment of most Baltic amber species to the extant genera by Meunier [1908]. Keeping in mind that at least some extant dolichopodid genera (as they presently recognized by their synapomorphies) appeared up to 12 Mya [Goodman et al., 2016], it is a doubt that *Parentia* and other genera with disjunctive distribution in the southern Hemisphere have a Gondwanan origin. Members of these genera could have chances to disperse over vast distances for millions of years by use of ocean currents, trade winds or anti-trades, leading to independent evolutionary diversification events.

The Afrotropical *Parentia* species are rather diverse morphologically, but having remarkably similar morphology of their male cercus. *Parentia theroni* sp. n. is the only species without callus on the hind tibia, but with a strong anterodorsal bristle at the same place. *Parentia*



*angustipennis* and *P. degener* are similar in habitus to widespread *Condylostylus longicornis* (Fabricius, 1775), all having very long and dense bristles on antennal pedicel and simple fore tarsus. The latter (and some other Neotropical *Condylostylus*) species may be congeneric with *Parentia*. *Parentia magnicornis* sp. n. male is peculiar in antennal postpedicel large, about two times higher and three times longer than pedicel. Mid tarsomeres are variously modified or bearing peculiar setulae in almost all Afrotropical species as those in many Australasian species [Bickel, 1994]. However, the Afrotropical species cannot be presently associated with confidence with Australasian species groups.

Little is known on ecology of *Parentia* species. According to labels under the published material, Afrotropical species inhabit Acacia dry woodland, coastal forests, gallery forests and forest margins. Most New Zealand species occur in mixed podocarp and Nothofagus forests, although some are associated with coastal vegetation; and Australian species are found mostly in sclerophyll eucalypt forest, heath, and semiarid habitats [Bickel, 1994, 2006].

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