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Redescription of *Avicularia taunayi* and notes on its habitat and geographical distribution (Araneae: Theraphosidae: Aviculariinae)

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ABSTRACT. We redescribe the poorly known tarantula species *Avicularia taunayi* (Mello-Leitão, 1920) and present information on its geographical distribution and habits. The spermatheca of the female is unusual for the genus: short, broad, with a median slight curvature and lobes on its basal, median and distal portions. The male resembles other *Avicularia* species but can be distinguished by the presence of a tibial apophysis on leg I in conjunction with legs I and IV having roughly the same length and the presence of pale rings on the distal femora, tibiae and metatarsi. Additionally, males and females have three pairs of light brown spots extending from the dorsum to the lateral region of the abdomen. *Avicularia taunayi* is found in the Brazilian Cerrado, a savannah-like biome. It is one of the aviculariine species with the southernmost distribution, reaching as far South as the Tropic of Capricorn.

KEY WORDS. *Ancylochiros*; Arachnida; Brazil; Cerrado; Tarantula.

The theraphosid Aviculariinae comprises eight genera with species known from the New World and Western Africa (WEST *et al.* 2008). Most species are arboreal, though some fossorial species are well known in *Epebopus* Simon, 1892 (WEST *et al.* 2008). The taxonomy of Aviculariinae is poorly understood: only *Epebopus* was totally revised (WEST *et al.* 2008), and the systematic of *Avicularia* Lamarck, 1818, in particular, is chaotic. Most species of the latter were described briefly during the 19th century and early 20th century. Only a few of the 49 described species (PLATNICK 2012) can be identified and information on the geographic distribution and habitats of most species is lacking.

Here we redescribe one remarkable *Avicularia* species. It was originally described by MELLO-LEITÃO (1920) as a new genus and species, *Ancylochiros taunayi* Mello-Leitão, 1920, based on a supposed female specimen, collected in Mariana, state of Minas Gerais, Brazil. In his description, MELLO-LEITÃO (1920) stressed the following characteristics of this new genus: palpal tarsus “very bowed at the base; beyond much depressed, a little hollow, with dorsal series of small spines”, “posterior sternal sigilla separated from the margin by nearly the same distance which divides them”, and in “having the posterior tarsal scopula divided by a longitudinal band of spiniform bristles”. He believed that the new genus would be an intermediate form between the Ischnocoleae (Ischnocolinae) and the Avicularieae (Aviculariinae). Later, he published the description of the genus and species in Portuguese, included it in a key to the Brazilian genera and species of Avicularieae, and considered it to be close to *Epebopus*. Both genera were considered intermediates between Aviculariinae and Phoneyuseae (now Eumenophorinae) (MELLO-

LEITÃO 1923). In his catalog, ROEWER (1942) included *Ancylochiros* Mello-Leitão, 1920 in the Ischnocolinae.

RAVEN (1985) examined the type of *Ancylochiros taunayi* and noted that the specimen is a male in the penultimate instar (hence the modified palpal tarsus) and the scopula of tarsus IV was entire. Therefore, the species could not be distinguished from those in the genus *Avicularia*, and the synonymy between *Ancylochiros* and *Avicularia* was established.

Avicularia taunayi would be just one more of the several species in the genus, but the toponymic locality makes it special. The city of Mariana, the type locality, is located in the state of Minas Gerais, which is out of the Amazonian region (where most *Avicularia* species are found), as well as relatively far from the Brazilian Northeastern region, where species of other aviculariine genera such as *Pachistopelma* Pocock, 1901 and *Iridopelma* Pocock, 1901 occur (pers. obs.). In order to try to elucidate the identity of this species, we consulted most arachnid collections in Brazil. We also carried out some field trips trying to find living specimens, and to obtain information on their habitat. As a result, we discovered additional preserved museum specimens, as well as a wild population in the Brazilian Cerrado (a savannah-like biome). Using this new information, we redescribe *A. taunayi* and provide details on its habitat and natural history.

MATERIAL AND METHODS

The general description format follows RAVEN (2005) with some modifications; e.g., we do not describe the hair types and the trichobothrial conformation on the legs in as much detail

as RAVEN. All measurements are in millimeters and were obtained with a Mitutoyo® digital caliper with an error of 0.005 mm. Leg and palp measurements were taken from the dorsal aspect of the left side (unless appendages were lost or obviously regenerated). A Nikon® SMZ1500 dissecting microscope was used for illustrations (with a camera lucida attachment). Abbreviations: (ALE) anterior lateral eyes, (AME) anterior median eyes, (ITC) inferior tarsal claw, (PLE) posterior lateral eyes, (PME) posterior median eyes, (PMS) posterior median spinnerets, (STC) superior tarsal claws.

Specimens of the following institutions were examined: (DZUB) Universidade de Brasília; (IBSP) Instituto Butantan, São Paulo; (MZSP) Museu de Zoologia da Universidade de São Paulo, São Paulo; (ZUEC) Universidade Estadual de Campinas. Urticating hairs terminology follows COOKE *et al.* (1972). Geographical coordinates: primary sources are between round brackets, secondary sources (Google Earth®) between square brackets.

TAXONOMY

Avicularia taunayi (Mello-Leitão, 1920)

Figs 1-23, Table I

Ancylochiros taunayi Mello-Leitão, 1920: 142; 1923: 319; Roewer, 1942: 225; Bonnet, 1955: 316.

Ancylochyros taunayi: Petrunkevitch, 1928: 83 (unjustified emendation per Bonnet, 1955); Strand, 1929: 12.

Ancylochiros taunayi: Petrunkevitch, 1939: 291 (misspelling of *Ancylochyros*).

Avicularia taunayi: Raven, 1985: 149; Platnick, 2012.

Diagnosis. The female differs from those of other *Avicularia* species by the shape of the spermathecae: short, broad, with a slight median curvature and lobes on basal, median and distal portions (Figs 6-9). The male differs from those of other *Avicularia* species by the presence of a tibial apophysis on leg I (Figs 4 and 5) in conjunction with the legs I and IV being roughly the same length (Table I) and the presence of pale rings on the distal femora, tibiae and metatarsi (Fig. 11). Additionally, male and female differ from all those of other *Avicularia* species by having three pairs of light brown spots extending from the dorsum to lateral region of abdomen, more visible in females (Figs 10 and 11).

Type material. Holotype: BRAZIL, *Minas Gerais*: Mariana [20°22'S, 43°25'W], 1 immature male, J. P. Fonseca *leg.* (MZSP 327) (examined).

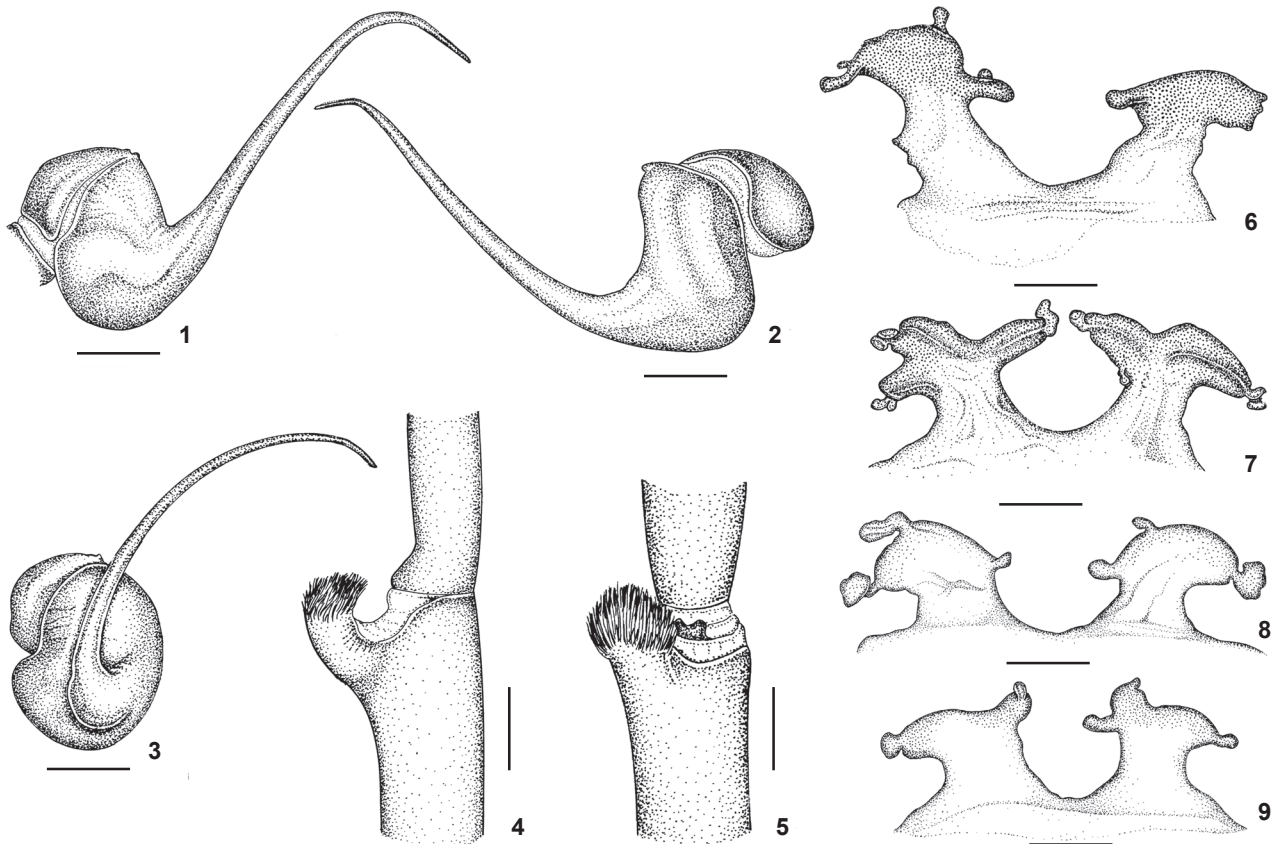
Redescription. Female (IBSP 199). Carapace 17.9 long, 15.2 wide, chelicerae 8.6. Legs (femur, patella, tibia, metatarsus, tarsus, total): I: 13.0, 8.4, 9.9, 8.4, 5.5, 45.2; II: 12.1, 7.8, 9.1, 8.3, 4.0, 41.3; III: 11.4, 6.8, 8.3, 7.5, 4.6, 38.6; IV: 14.3, 7.8, 11.4, 10.6, 5.3, 49.4. Palp: 8.9, 5.7, 6.2, -, 6.1, 26.9. Midwidths: femora I-IV = 2.9, 3.2, 3.2, 3.4, palp = 2.3; patellae I-IV = 3.4, 3.3, 3.2, 3.2, palp = 2.7; tibiae I-IV = 2.8, 2.7, 2.8, 2.7, palp = 2.7; metatarsi I-IV = 2.2, 2.3, 2.2, 2.1; tarsi I-IV = 2.6, 2.4, 2.5,

2.8, palp = 2.5. Abdomen 19.7 long, 11.0 wide. Spinnerets: PMS, 2.3 long, 1.1 wide, 0.1 apart; PLS, 3.6 basal, 1.3 middle, 3.2 distal; midwidths 1.8, 1.7, 1.4, respectively. Carapace: length to width 1.18; cephalic area moderately raised, thoracic striae shallow. Fovea: deep, straight, 2.6 wide. Carapace hirsute, covered with long, curly, dense setae and some long stiff scattered setae mainly on cephalic region. Eyes and eye tubercle: eye tubercle 1.0 high, length 2.2, width 3.0. Clypeus 0.4 wide. Anterior eye row procurved, posterior slightly recurved. Eye sizes and inter-distances: AME 0.6, ALE 0.8, PME 0.4, PLE 0.6, AME-AME 0.7, AME-ALE 0.4, AME-PME 0.3, ALE-ALE 1.9, ALE-PME 0.4, PME-PME 1.7, PME-PLE 0.1, PLE-PLE 2.4, ALE-PLE 0.3, AME-PLE 0.6. Ratio of eye group width to length 1.9. Maxillae: length to width: 1.73. Cuspules: 180-200 spread over ventral inner heel. Maxillary lyra absent. Labium: length 2.5, width 3.2, with about 125 cuspules spaced by one diameter from each other on anterior third center. Labio-sternal groove shallow, flat, without visible sigilla. Chelicerae: rastellum absent, basal segments with 10 teeth decreasing in size from distal area and row of small teeth on promargin. Sternum: length 8.7, width 6.0. Posterior angle sharp, separating coxae IV. Sigilla: three pairs, posterior ellipsoidal, inclined at 45° angle, 1.5 diameter from margin; middle fusiform, less than one diameter from margin; anterior not evident. Legs: legs formula: IV = I II III. Clavate trichobothria: on distal 2/3 of tarsi I-IV. Leg coxae: with sparse soft setae; stridulatory or modified setae lacking. Scopula: tarsi I-IV fully scopulate. Metatarsi I-II, 4/5 scopulate; III, 1/2, IV 1/3 distal scopulate. IV, divided by three wide row of setae. Scopula hairs longest at lateral areas of tarsi and metatarsi, giving spatulate aspect to articles. Spines: absent on all legs and palp. Claws: ITC absent; STC without teeth. Urticating hairs: type II on dorsum of abdomen. Genitalia: Two weakly sclerotized spermathecae with curvature in their middle and lobes from median to distal portions (Figs 6-9).

Color pattern (Figs 10 and 13): Carapace dark brown with light brown hairs. Coxae, labium, sternum and maxilla dark brown. Legs dark brown with light brown, long setae. Distal femora, patellae, tibiae and metatarsi with broad white rings. Abdomen black with three pairs of light brown spots extending from dorsum to lateral region (Fig. 13). Abdomen ventrally black.

Description. Male (DZUB 1675). Carapace 12.1 long, 11.8 wide, chelicerae 4.8. Legs (femur, patella, tibia, metatarsus, tarsus, total): I: 12.0, 6.4, 8.9, 8.9, 5.5, 41.7; II: 11.3, 5.9, 8.8, 8.2, 5.5, 39.7; III: 9.8, 4.9, 7.5, 7.6, 4.8, 34.6; IV: 12.5, 5.6, 10.1, 10.2, 5.0, 43.4. Palp: 7.1, 4.7, 5.6, -, 2.6, 20.0. Midwidths: femora I-IV = 2.6, 2.6, 2.7, 2.7, palp = 1.6; patellae I-IV = 2.6, 2.6, 2.4, 2.5, palp = 2.0; tibiae I-IV = 2.2, 2.0, 1.9, 1.9, palp = 1.8; metatarsi I-IV = 1.3, 1.4, 1.2, 1.3; tarsi I-IV = 1.5, 1.6, 1.5, 1.4, palp = 1.5. Abdomen 11.1 long, 6.6 wide. Spinnerets: PMS, 1.6 long, 0.5 wide, 0.1 apart; PLS, 1.6 basal, 1.1 middle, 2.2 distal; midwidths 1.2, 1.0, 0.7, respectively.

As in female, except: Carapace: length to width 1.02; thoracic striae inconspicuous. Fovea: 2.7 wide. Carapace hir-



Figures 1-9. *Avicularia taunayi*: (1-5) male, DZUB 4542: (1-3) left palpal bulb: (1) prolateral; (2) retrolateral; (3) frontal; (4-5) left leg I tibial apophysis: (4) retrolateral; (5) ventral; (6-9) spermathecae: (6) IBSP 199, Barão de Cocais, Minas Gerais; (7) IBSP 4906, Goiás; (8) IBSP 123298, UHE Serra da Mesa, Goiás; (9) DZUB 1979, Brasília, Distrito Federal. Scale bar = 1 mm.

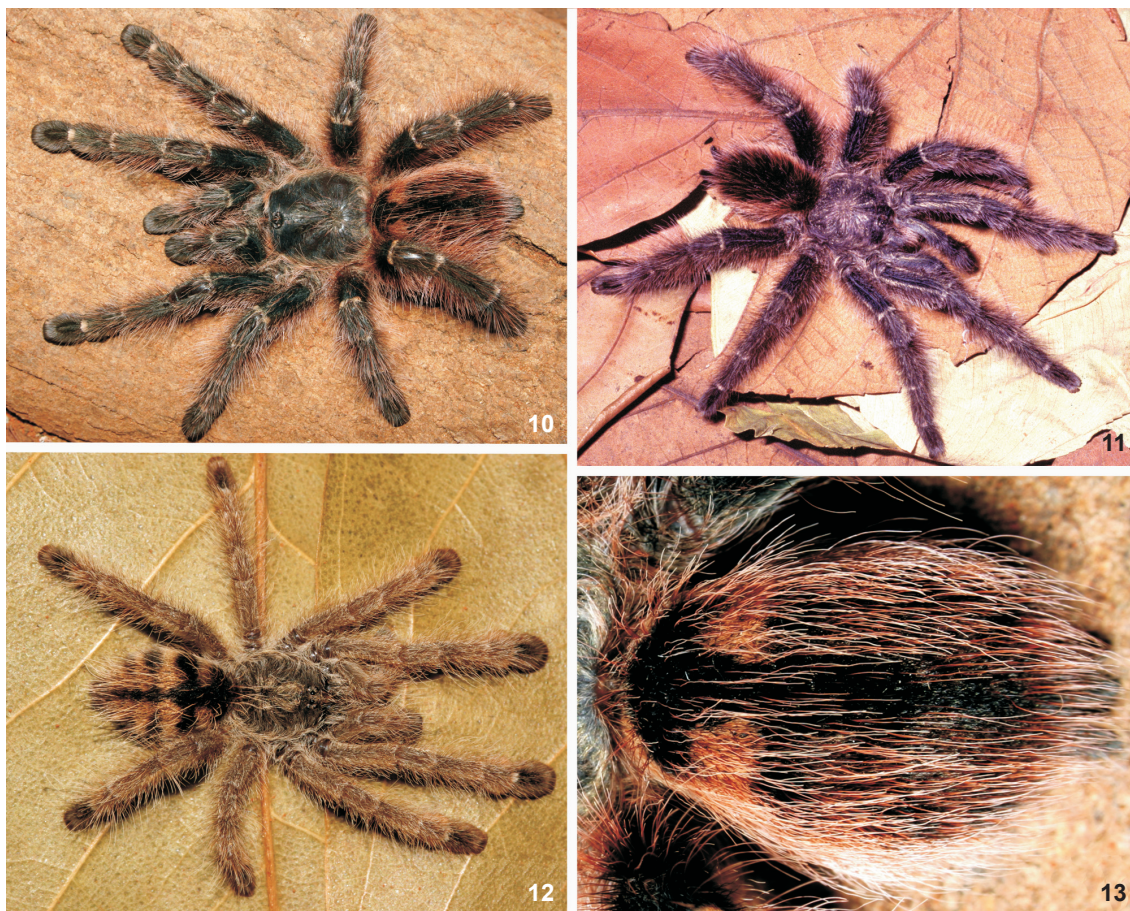
sute, covered with long, curly, dense setae and several long stiff scattered setae from eye tubercle to fovea. Eyes: eye tubercle 0.7 high, length 1.6, width 2.3. Clypeus 0.4 wide. Posterior eye row straight. Sizes and inter-distances: AME 0.62, ALE 0.54, PME 0.37, PLE 0.48, AME-AME 0.45, AME-ALE 0.20, AME-PME 0.12, ALE-ALE 1.42, ALE-PME 0.56, PME-PME 1.14, PME-PLE 0.10, PLE-PLE 1.74, ALE-PLE 0.20, AME-PLE 0.31. Ratio of eye group width to length 1.75. Maxillae: length to width: 1.78. Cuspules: 100-150 spread over ventral inner heel. Labium: length 1.5, width 2.0, with about 80 cuspules. Chelicerae: basal segments with nine teeth decreasing in size from distal area. Sternum: length 6.1, width 4.8. Sigilla: three pairs, posterior ellipsoidal, inclined in 45° angle, middle fusiform, both one diameter from margin; anterior not evident. Legs: Scopula on tarsus IV with few sparse setae. Metatarsus IV, 1/2 distal scopulate. Genitalia: Male palpal embolus 4.8 in length, with slight curvature to retrolateral side (Figs 1-3). Embolus basal, middle and distal width 0.6, 0.2 and 0.04, respectively. Tegulum 1.2 in length. Tibial apophysis: single, 1.7 long, 1.5 wide, with numerous spiniform setae on tip (Figs 4 and 5). Male metatar-

sus I slightly curved, passes by retrolateral side of tibial apophysis without touching it. Cymbium: two subequal lobes, prolateral one triangular in shape, with spiniform process 0.5 long and 0.5 wide on apex.

Color pattern (Fig. 11): As in female, but light brown spots on dorsum of abdomen ill-defined.

Variation. Length of carapace and legs I and IV in Table I. A high degree of morphological variation was detected in the number and development of the spermathecal lobes (Figs 6-9). One basic pattern seems to be the presence of a basal, a median and a distal lobe (Fig. 8). In some specimens, one or more of these lobes may be absent (Fig. 9, left spermatheca) or duplicated (Fig. 6, left spermatheca). Some of these lobes can be so developed that the spermathecae appear branched (Figs 7 and 9).

Ontogeny of the color pattern. Juveniles (Fig. 12) exhibit a similar pattern to other *Avicularia* species: a dorsal central longitudinal black stripe with four transversal black stripes on each side of the abdomen. The remaining parts of the dorsal and lateral abdomen are reddish. In adult females, the lateral



Figures 10-13. *Avicularia taunayi*: (10) female, from Distrito Federal; (11) male, from Ipamerí, Goiás; (12) juvenile, from Distrito Federal; (13) detail of abdomen dorsum, female, from Distrito Federal. Photos: R. Bertani.

black stripes become larger. However, contrary to what happens in most *Avicularia* species, the reddish areas do not disappear totally. Consequently, that part of the pattern still remains (Fig. 13).

Distribution. BRAZIL: from the south region of the state of Tocantins southwards to the state of São Paulo, and from the state of Mato Grosso eastwards to the extreme west of the state of Bahia, in the Cerrado biome (see the discussion on natural history below) (Fig. 14). Together with *Avicularia sooretama* Bertani & Fukushima, 2009, *A. taunayi* reaches the southernmost areas among congeners, near the Tropic of Capricorn (records from Duartina [22°24'S, 49°24'W] and Bebedouro [20°56'S, 48°29'W] in the state of São Paulo). The absence of records of *A. taunayi* after 1955, allied to the high degree of deforestation and human impact in this region suggest that the species is locally extinct or close to extinction in the state of São Paulo. Specific sampling efforts in the Cerrado remnants of the region are necessary to ascertain this.

Natural history. A population of *A. taunayi* was discov-

ered and some individuals were observed and collected by us in the Distrito Federal, Brazil (15°43'8.84"S, 47°44'6.34"W) in July 2007. The area is a slope situated at 1050-1100 m above sea level. There are residences and small farms in the upper plateau and in lower areas forming mosaics of altered areas with less impacted patches of Cerrado "stricto sensu" vegetation. Since most *Avicularia* species are known to occur in the rainforest, the presence of this species in a savannah-like biome is unusual. The specific area where the specimens of *A. taunayi* were found is a slope covered with rocky vegetation ("cerrado rupestre") (Fig. 15).

Specimens of *A. taunayi* were found on small trees in the hill. Of the five specimens found in Brasília (one juvenile and four females), four were on *Myrcia tomentosa* (Aubl.) DC., 1828 (Myrtaceae) (Figs 15-23) and one on "Jatobá" (*Hymenaea* sp., Fabaceae) trees. These trees, mainly the former, normally have hollows in the trunk that are used as retreats by the spiders. These hollows can extend for several centimeters down or up and follow the trunk's branching. The aperture to the outside

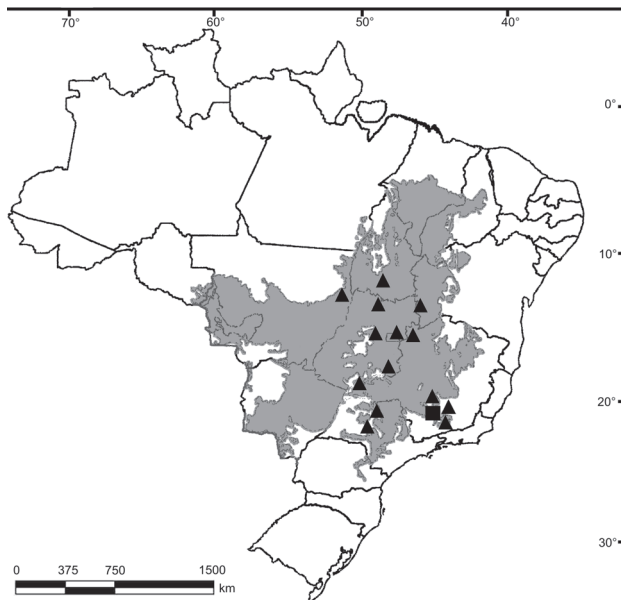


Figure 14. Records of *Avicularia taunayi* in Brazil. Square = type locality of *A. taunayi*. Triangle = new records. The gray area represents the approximate original distribution of Brazilian Cerrado.

is small (Figs 17-20) when compared to the size of the specimen inhabiting it, and can be hidden by a silky retreat similar to that built by other *Avicularia* species (Figs 16 and 21-23). The openings positions were 0.5 meter (2 specimens), 1 meter (2 specimens) and 1.65 m (1 specimen) in height from the soil. In the locality of Cocalzinho de Goiás, three individuals were found in hollows of *M. tomentosa* and one in *Aspidosperma macrocarpon* Mart., 1824 (Apocynaceae) in the “cerrado rupestre” phytophysionomie (PCM, pers. obs.).

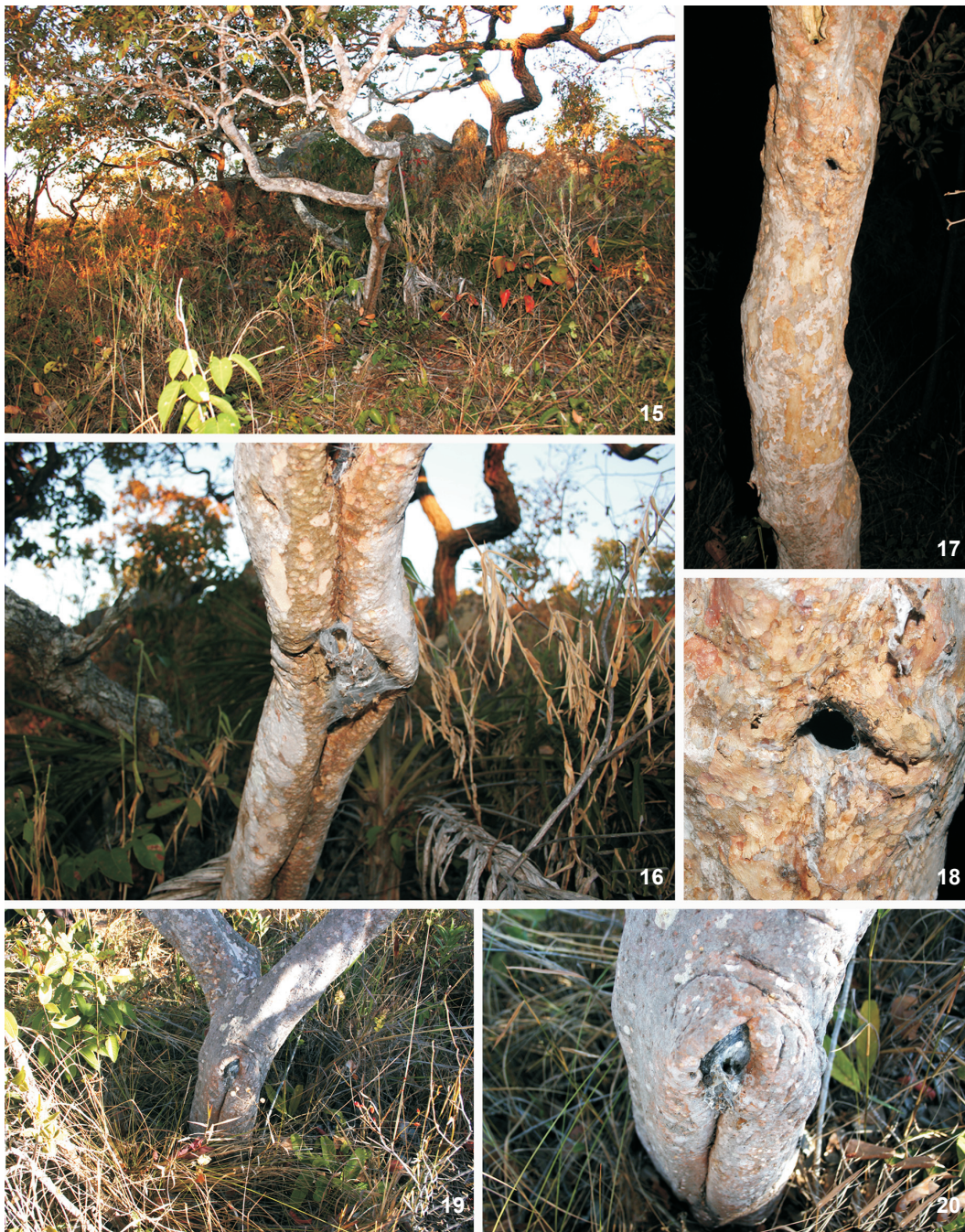
The males (n = 7) were collected from February to July, indicating that mating occurs in the end of the rainy season to early in the dry season. In the field, two females were found with egg sacs in July (DZUB 4707). One female (DZUB 2957), which was collected in Brasília (Distrito Federal) on April 14, 2004 and housed in the laboratory, built a completely closed silken retreat from July 9 to 12 and laid eggs on July 14. The spiderlings (n = 29) hatched 80 days later (October 1). About 18 days later (early rainy season), the female opened the shelter and the spiderlings began to disperse.

Additional material examined: BRAZIL, *Tocantins*: Peixe (Aproveitamento Hidrelétrico Peixe/Angical, 12°18’S, 48°15’W), 1 immature male, 15 March 2006, R. Bertani *leg.* (IBSP 123303); *Bahia*: Jaborandi [13°55’S, 46°00’W], 1 male, 27 July 2008, A.F. Mendonça *leg.* (DZUB 5101); *Goiás*: Minaçu [Usina Hidrelétrica Serra da Mesa, 13°49’S, 48°18’W], 5 females, 1 immature male, 1997, Equipe de Resgate de Fauna *leg.* (IBSP 123297-123302); Ipameri [17°42’S, 48°10’W], 1 female, 17 March 1952, 11° do 3° R.I. *leg.* (IBSP 2847); 1 male, 1 female, February 1996, F.R. Alves

Table I. Lengths, median and standard deviation (SD) of carapace and legs I and IV (femora to tarsi) of *Avicularia taunayi*.

Sex	Number	Length			
		Carapace	Leg I	Leg IV	Leg IV/Leg I
Male	DZUB2025	14.5	47.3	49.2	1.040
	DZUB4315	12.3	39.0	41.5	1.064
	DZUB4542	15.9	49.5	52.1	1.052
	DZUB1675	12.0	41.0	43.0	1.048
	IBSP14397	14.7	48.9	51.9	1.061
			Median	1.053	
			SD	0.009	
Female	DZUB4707	6.2	18.0	18.4	1.022
	IBSP3384	11.2	28.9	31.1	1.076
	DZUB3981	13.1	35.5	37.6	1.059
	IBSP3400	13.7	35.4	39.5	1.115
	DZUB3980	14.7	38.7	41.7	1.077
	IBSP 123297	14.9	39.8	43.1	1.082
	DZUB352	15.7	39.5	42.2	1.068
	IBSP 123298	16.0	41.7	45.0	1.079
	IBSP123299	16.1	42.2	45.2	1.071
	DZUB4707	17.6	46.5	49.5	1.064
	IBSP4032	17.8	43.7	46.6	1.066
	IBSP199	17.9	45.2	49.4	1.092
	IBSP123300	18.4	48.2	52.3	1.085
	IBSP1365	18.7	45.4	47.7	1.050
	DZUB1979	18.9	47.9	50.8	1.060
	DZUB2603	19.1	46.2	49.2	1.064
	IBSP4906	19.2	48.3	51.3	1.062
	IBSP2847	19.7	47.6	50.4	1.058
IBSP14397	13.4	38.1	41.5	1.089	
ZUEC018	16.5	41.4	43.4	1.048	
			Median	1.069	
			SD	0.019	
Immature male	IBSP123302	12.7	37.0	40.1	1.083
	IBSP3471	10.2	28.5	29.4	1.031
	IBSP123303	7.4	21.5	22.2	1.032
Holotype	MZSP327	11.8	34.9	36.9	1.057
				Median	1.051
			SD	0.024	

leg. (IBSP 14397); Goiás (120 km from Brasília), 1 female, 7 November 1986, L.L. Baumgratz *leg.* (IBSP 4906); Cocalzinho de Goiás [15°47’S, 48°46’W], 1 immature female, 11 November 2007, P.C. Motta *leg.* (DZUB 5027); *Distrito Federal*: Brasília [Lago Sul, 15°50’S, 47°49’W], 1 male, 14 May 2002, R.A. Brandão and G. Zerbini *leg.* (DZUB 1675); 1 female, 15 November 2002, F. Brasil *leg.* (DZUB 1979); (Paranoá, 15°43’8.84”S, 47°44’6.34”W), 1 male,



Figures 15-20. *Avicularia taunayi* habitat in Distrito Federal, Brazil: (15) general view of the area with a *Myrcia tomentosa* tree in the center; (16) same, detail of the spider retreat; (17) aperture leading to the spider shelter in *Myrcia tomentosa*; (18) same, detail; (19-20) retreat aperture positioned close to the ground. Photos: R. Bertani.

03 March 2007, P. Jotta *leg.* (DZUB 4542); 1 female, 1 immature female, 12 July 2007, R. Bertani, C.S. Fukushima, R.H. Nagahama, P.C. Motta, P. Jotta *leg.* (DZUB 4707); Sobradinho [Colorado,

Córrego do Urubu, 15°42'S, 47°51'W], 1 female, 1 January 1999, J. Marinho-Filho *leg.* (DZUB 352), 1 male, 26 February 2004, J. Marinho-Filho *leg.* (DZUB 2025), 1 male, 2 July 2006, I. Wagas



Figures 21-23. *Avicularia taunayi* habitat in Distrito Federal, Brazil: (21) spider retreat; (22) same, with retreat removed to show the spider inside it; (23) same, detail. Photos: R. Bertani.

leg. (DZUB 4315); (Lago Sul, Chácara Santo Amaro), 1 female, 1 October 2003, without collector name (DZUB 3980); [Condomínio Lago Sul QI-27, 15°49'S, 47°49'W], 1 female, 30 October 2005, S. Bethlen *leg.* (DZUB 3981); *Mato Grosso*: São Domingos [Rio das Mortes, 13°31'S, 51°27'W], 1 female, 20 August 1949, without collector data (IBSP 3400); *Minas Gerais*: Barão de Cocais [19°56'S, 43°28'W], 1 female, 5 November 1970, J.P. Couto *leg.* (IBSP 199); Belo Horizonte [19°51'S, 43°56'W], 1 female, 25 July

1960, Coop. Agro Industrial *leg.* (IBSP 3384); Burititis [15°37'S, 46°26'W], 1 female, 1 February 2003, G.B. Freire Jr. *leg.* (DZUB 2603); Santa Vitoria [18°51'S, 50°07'W], 1 female, 28 July 1981, M. Rosa *leg.* (ZUEC 018); Santos Dumont [21°27'S, 43°33'W], 1 female, 20 June 1967, Eletrocloro S.A. *leg.* (IBSP 4032); *São Paulo*: Bebedouro [20°56'S, 48°29'W], 1 immature male, 16 November 1955, A. Marques *leg.* (IBSP 3471); Duartina [22°24'S, 49°24'W], 1 female, 23 March 1948, J.M. Braga *leg.* (IBSP 1365).

DISCUSSION

MELLO-LEITÃO (1920) described the new genus and species *Ancylochiros taunayi* characterizing it mainly by the unusual shape of the palpal tarsi. As already stated by RAVEN (1985), this was an indication that the male is immature, not a species apomorphy. Despite the fact that the type is immature, it is possible to determine the species identity when the information obtained from examination of the holotype is considered in conjunction with the original description and the type locality data. The holotype has legs I and IV almost of the same length (Table I; leg IV is only 0.057 longer than I); the description makes reference to a black abdomen, with the dorsum having three pairs of large, oblique, rusty spots; and the type locality is in Mariana, state of Minas Gerais, is out of the geographic distribution of other *Avicularia* species. The specimens examined in this work and proceeding from localities neighboring the type locality (specially a female from Barão de Cocais, Minas Gerais, roughly 50 km from type locality) have the above characteristics and match the species description.

Avicularia taunayi has a modified spermatheca, broad and with several lobes, distinct from that of other *Avicularia* species. However, we do not think this character alone is enough to revalidate *Ancylochiros*. This question will be resolved only when the morphological variability and relationships of most *Avicularia* species are better understood. For now, we prefer to consider the character to be a putative autapomorphy for the species

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