# A New Species of the Genus Asemonea (Araneae: Salticidae) from Japan

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**Abstract** A new salticid spider species, *Asemonea tanikawai* sp. nov. is described on the basis of the materials obtained from Iriomotejima Island, Okinawa Pref., Japan. The genus *Asemonea* is newly recorded from Japan.

Recently, I examined the spider specimens collected by Akio TANIKAWA from Iriomotejima Island, Okinawa Pref., Japan. In these specimens, I recognized a new species of the genus *Asemonea* occurring in the island. It will be described in the present paper.

Up to the present, 13 species of the genus *Asemonea* were described from Africa and East Asia (WANLESS, 1980; PLATNICK, 1989; PRÓSZYŃSKI, 1990). The genus *Asemonea* belongs to the subfamily Lyssomaninae and the spiders of the genus have eyes in four rows. Another genus of the subfamily, *Onomastus*, was recorded from Japan (ONO, 1995; the generic name was misspelled as *Onomustus*).

The type specimens designated in this paper are deposited in the collection of the Department of Zoology, National Science Museum (Nat. Hist.), Tokyo.

The following abbreviations are used: ALE, anterior lateral eye; AME, anterior median eye; PLE, posterior lateral eye; PME, posterior median eye; RTA, retrolateral tibial apophysis. The distances between eyes are presented with a dash, *e. g.*, ALE-ALE indicates distance between ALEs.

## Genus Asemonea O. P.-CAMBRIDGE, 1869

Asemonea O. P.-CAMBRIDGE, 1869: 65. Type species: Lyssomanes tenuipes O. P.-CAMBRIDGE, from Sri Lanka.

*Diagnosis*. Spiders small to medium size, *i. e.* total length between 2.6 and 7.0 mm. Eyes: Usually with black surrounds except AME; AME the largest, almost occupying full breadth of face. This genus is distinguished from related genera by eye arrangement as shown in WANLESS (1980). Male palp: Femora with ventral furrow. Epigynum: Atrium undivided, with median septum, or covered by median scape.

Distribution. Africa (Liberia, Angola, Kenya, Ivory Coast, Ghana, Ginea, Mali, Zaire, Madagascar), Andaman Islands, Burma, India, Sri Lanka, Malaysia, Pinang

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Island, Thailand and Japan.

Asemonea tanikawai sp. nov. (Figs. 1-11)

Salticidae sp. (A): CHIKUNI,1989, pp. 157, 286, fig. 51.

Specimens examined. Holotype:  $3^{?}$ , Ôhara, Iriomotejima Island, Okinawa Pref., 30-III-1986, A. TANIKAWA leg. (NSMT-Ar 3318). Paratypes:  $3 \stackrel{\circ}{+}$ , same data as for the holotype (NSMT-Ar 3319).

*Description.* Measurement of the type specimens (in mm); variation in parentheses. Body length ♂ 3.36,  $\stackrel{\circ}{+}$  3.36 (3.26-4.16); prosoma length ♂ 1.44,  $\stackrel{\circ}{+}$  1.44 (1.31-1.60), width ♂ 1.22,  $\stackrel{\circ}{+}$  1.09 (0.99-1.28), height ♂ 0.80,  $\stackrel{\circ}{+}$  0.80 (0.80-0.89); opisthosoma length ♂ 1.92,  $\stackrel{\circ}{+}$  1.92 (1.84-2.24), width ♂ 0.80,  $\stackrel{\circ}{+}$  0.80 (0.80-1.12). Eye fields: ALE-ALE ♂ 0.90,  $\stackrel{\circ}{+}$  0.93 (0.88-1.01), ALE-PLE ♂ 0.54,  $\stackrel{\circ}{+}$  0.54 (0.51-0.60), PME-PME  $\stackrel{\circ}{\to}$  0.58,  $\stackrel{\circ}{+}$  0.61 (0.54-0.66), PLE-PLE ♂ 0.58,  $\stackrel{\circ}{+}$  0.62 (0.58-0.68), PME-PLE ♂ 0.44,  $\stackrel{\circ}{+}$  0.45 (0.44-0.46); AME diameter  $\stackrel{\circ}{\to}$  0.32,  $\stackrel{\circ}{+}$  0.34 (0.32-0.35), ALE/AME  $\stackrel{\circ}{\to}$  0.89,  $\stackrel{\circ}{+}$  0.89 (0.71-0.89). ALE greater than half the diameter of AME, PME large, clearly situated inside optical axis of ALE. PLE set well inside lateral margins of prosoma; quadrangle formed by PME and PLE broader than long.



Figs. 1-3. Asemonea tanikawai sp. nov. — 1, Male, dorsal view; 2, male prosoma, dorsal view; 3, female, dorsal view (scales: 1.0 mm).

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Figs. 4-11. Asemonea tanikawai sp. nov. — 4, Male palp, retrolateral view; 5, same, ventral view; 6, same, prolateral view, 7, retrolateral tibial apophysis; 8, tibial apophysis and femoral apophysis, dorsal view; 9, epigynum; 10, female genitalia, ventral view; 11, same, dorsal view (scales: 0.2 mm).

Legs. Length of legs of the holotype and a paratype  $\stackrel{\circ}{\rightarrow}$  as shown in Table 1. Formation of spines of legs of the same specimens as shown in Table 2.

Male palp (Figs. 4-8). Complex, tibial apophysis characteristic. Femora with ventral furrow and apical apophysis, patella without apophysis. Embolus long and curved, arising from basal margin of tegulum, free from embolic guide, but resting distally in lateral tegular groove. Tegulum ovoid in ventral view, margins modified to form embolic guide, subtegulum bulbus, with sinuous ducts.

Female genitalia (Figs. 9-11). Copulatory openings invisible, spermathecae

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Table 1. Measurement of leg segments of *Asemonea tanikawai* sp. nov. ( $a^{\gamma} \neq \hat{\gamma}$ ; in mm).

Leg	Femur	Patella	Tibia	Metatarsus	Tarsus	Total
I	1.28/1.28	0.48/0.50	1.18/1.20	0.98/1.04	0.37/0.34	4.29/4.36
11	1.12/1.12	0.45/0.45	0.98/0.99	0.85/0.86	0.35/0.32	3.75/3.74
III	1.10/1.04	0.43/0.45	0.88/0.90	0.96/0.98	0.45/0.39	3.82/3.76
IV	1.31/1.39	0.45/0.48	1.26/1.33	1.30/1.28	0.50/0.45	4.82/4.93

Table 2. Formation of spines of legs of *Asemonea tanikawai* sp. nov. (dorsal/ventral, none=no spine, p=prolateral, r=retrolateral).

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Leg		Femur	I 161a	Metatarsus	
Ι	3	$0 - 1 - 1 - 1 \cdot 2p/none$	0 - 0 - 1p - 0 - 0/2 - 2 - 2 - 2 - 0	1p-1p-0-0-0/2-2-2-0	
	f	$0 - 1 - 1 - 1 \cdot 2p/none$	0 - 0 - 1p - 0 - 0/2 - 2 - 2 - 0	none/2-2-2-2-0	
Π	$\sqrt[n]{2}$	0-1-1-1•1p/none	0 - 2 - 1r - 0/2 - 2 - 2 - 2 - 0	1p-0-1p-0-0/2-2-2-0	
	f	0-1-1-1•1p/none	0-1p-0-0/2-2-2-0	1p-0-1p-0-0/2-2-2-0	
Ш	S <sup>™</sup>	0-0-1-3/none	1r-2-0-2/0-0-1p-2	0-2-2-0/2-0-2-2	
	f	0 - 0 - 1 - 3 / none	0- 2-0-2/none	0-2-2-0/2-0-2-2	
IV	3	0 - 0 - 1 - 3 / none	2 -0 -3/1p-1p-0	2-0-2-2/1p-1r-0-2-2	
	f	0 - 0 - 1 - 3 / none	0 - 0 - 2 - 0 / 1 p - 2 - 2	0-2-2-0/0-0-2-2	

behind the undivided atrium. Accessory glands present.

Coloration and markings in ethanol (Figs. 1-3). Male: Prosoma whitish yellow with white hairs, a pair of brown longitudinal stripes and brown margin of thoracic part. Fovea long. Eyes with black surrounds except AME, fringed by white hairs. PLE behind with orange hairs. Clypeus whitish yellow, marked with a pair of black spots below AME with white hairs. Chelicerae, maxillae and labium white. Sternum whitish yellow covered with white hairs. Opisthosoma dorsum whitish yellow with nine black spots, clothed with brown hairs. Venter of opisthosoma whitish yellow with white hairs. Leg I: All segments whitish yellow with black spots on lateral side of both the ends of tibia and femoral distal end. The coloration of the remaining legs as same as that of leg I.

Female: Same as in male, but brown margin of prosoma and black spots below AME and white hairs behind PLE lacking. Black spots present at tibial ends of legs III and IV. The other segments of legs white, without spots.

*Distribution*. Japan [Iriomotejima Is. and Okinawa Is. (ONO, pers. comm.)]. CHIKUNI (1989) described that this species was widely distributed in Okinawa Prefecture.

*Remarks*. This species resembles *Asemonea maculata* WANLESS, 1980 from Ivory Coast in the colour pattern and *Asemonea pinangensis* WANLESS, 1980 from Pinang Island, Malaysia in the male palpal figure, but can be distinguished from these species by the shape of dorsal tibial apophysis and femoral apophysis of the male palp.

*Etymology*. This species is dedicated to Mr. Akio TANIKAWA who collected the specimens of the new species.

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西表島産の標本に基づいて, Asemonea ヨリメハエトリグモ属(新称)の1新種 Asemonea tanikawai タニカワヨリメハエトリ(新称)を記載した。ヨリメハエトリグモ 属はリセイハエトリグモ亜科に属し、日本新記録属である。

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