

## Distributional Records of Some Fireflies (Coleoptera, Lampyridae and Rhagophthalmidae) from the Ryukyu Islands, Southwest Japan

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**Abstract** Six species of the family Lampyridae and one species of the family Rhagophthalmidae are recorded from new localities in the Ryukyu Islands, Southwest Japan. In addition, distributional ranges hitherto known of all the species concerned are summarized.

In the course of our ecological and distributional investigation of fireflies belonging to the families Lampyridae and Rhagophthalmidae in the Ryukyu Islands, Southwest Japan, seven species were discovered from previously unknown localities and some others were recorded from little-known localities. In the present brief report, we are going to formally record them as given below.

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### Family Lampyridae

#### Subfamily Ototretinae

#### *Drilaster flavicollis* NAKANE, 1977

[Japanese name: Yonaguni-minami-botaru]

*Materials examined.* [Ishigaki-jima Is.] 3 ♂♂, Yonehara, 18–IV–1999, Y. GOTO leg.; 1 ex., Takeda-rindô, 1–V–1999, S. URAKAMI leg. (deposited in the private collection of Mr. SANO).

*Range.* Taiwan, Japan (Yaeyama Isls. – Ishigaki-jima Is. (new record) and Yonaguni-jima Is.).

*Remarks.* This minute species has hitherto been recorded from Taiwan (LAI *et*

al., 1998) and Yonaguni-jima, the southwesternmost island of the Ryukyus in Southwest Japan. The above record gives a second locality of the species in Japan.

***Drilaster fuscicollis* NAKANE, 1977**

[Japanese name: Okinawa-aka-minami-botaru]

*Material examined.* [Kume-jima Is.] 1 ♀, Mt. Uegusuku (drainage of the Shirasegawa Riv.), 30–IV–1994, T. TOYOGUCHI leg.

*Range.* Japan (Okinawa Isls.–Okinawa-hontô Is. and Kume-jima Is. (new record)).

*Remarks.* This remarkable reddish species has hitherto been recorded from only Okinawa-hontô Is. of the Okinawa Islands (SATÔ, 1989), so that the above record gives a second locality of the species in Japan.

Subfamily Luciolinae

***Curtos costipennis* (GORHAM, 1880)**

[Japanese name: Kiiro-suji-botaru]

*Materials examined.* [Tokuno-shima Is.] 8 ♂♂, 1 ♀, Mt. Hake-dake, 28–VIII–1996, Y. GOTO leg.

*Range.* China, Taiwan, Japan (Tokara Isls. – Kuchino-shima Is., Nakano-shima Is. and Suwanose-jima Is.; Amami Isls. – Amami-Ôshima Is. and Tokuno-shima Is. (new record); Miyako Isls. – Miyako-jima Is., Ikema-jima Is. and Kurima-jima Is.; Yaeyama Isls. – Ishigaki-jima Is., Iriomote-jima Is., Taketomi-jima Is. and Yonaguni-jima Is.).

*Remarks.* This species is widely distributed in the Ryukyu Islands (OHBA & GOTO, 1996), that is, the Tokara, Amami, Miyako and Yaeyama Groups. Up to the present, it has never been found in the southern part of the Amami Group and the islands of the Okinawa Group including the Kerama Islands and Kume-jima Is., on which this species is replaced by the next one.

***Curtos okinawanus* MATSUMURA, 1918**

[Japanese name: Okinawa-suji-botaru]

*Materials examined.* [Tokashiki-jima Is.] 3 ♂♂, 26–IV–1997, Y. GOTO leg.; [Zamami-jima Is.] 1 ♂, Asa, 26–IV–1997, I. KAWASHIMA leg.; 2 ♂♂, 1 ♀, Zamami-dam, 27–IV–1997, I. KAWASHIMA & Y. SATO leg.; [Kume-jima Is.] 2 ♂♂, Ohta (drainage of the Urachi-gawa Riv.), 25–IV–1996, I. KAWASHIMA leg.; 2 ♂♂, Kumaji, 22–24–IV–1997, I. KAWASHIMA leg.; 2 ♂♂, Kitahara (near Yajâ-gama Cave), 23–IV–1996, I. KAWASHIMA leg.; 12 ♂♂, Shimajiri, 7–8–V–1993, Y. GOTO leg.

*Range.* Japan (Amami Isls. – Okinoerabu-jima Is.; Kerama Isls. – Tokashiki-jima Is. (new record) and Zamami-jima Is. (new record); Okinawa Isls. – Okinawa-hontô Is.

and Kume-jima Is.).

*Remarks.* As was mentioned in the remarks of the preceding species, the distributional range of this species are restricted to Okinoerabu-jima Is. of the Amami Group and the Okinawan islands including the Kerama Group and Kume-jima Is.

#### Subfamily Lampyrinae

##### *Pyrocoelia abdominalis* NAKANE, 1977

[Japanese name: Sakishima-mado-botaru]

*Materials examined.* [Kohama-jima Is.] 8 larvae, Mt. Ufu-daki, 20–XII–1999, Y. GOTO leg.

*Range.* Japan (Yaeyama Isls. – Ishigaki-jima Is., Iriomote-jima Is. and Kohama-jima Is. (new record)).

*Remarks.* This species has hitherto been recorded from the two large islands of the Yaeyama Group, that is, Ishigaki-jima Is. and Iriomote-jima Is., and is recorded for the first time from the smaller islands of the island group. In spite of our careful investigations, it has never been found from the other small islands.

##### *Pyrocoelia atripennis* LEWIS, 1896

[Japanese name: Ôshima-mado-botaru]

*Materials examined.* [Kohama-jima Is.] 3 ♂♂, 2 larvae, Mt. Ufu-daki, 20–XII–1999, Y. GOTO leg.

*Range.* Japan (Yaeyama Isls. – Ishigaki-jima Is., Iriomote-jima Is., Kuro-shima Is., Taketomi-jima Is. and Kohama-jima Is. (new record)).

*Remarks.* In contrast to the restricted distribution of the preceding species, this species is widespread over almost all the islands of the Yaeyama Group (KAWASHIMA, 1999). However, it has never been met with on Hateruma-jima Is. and Yonaguni-jima Is.

#### Family Rhagophthalmidae

##### *Rhagophthalmus ohbai* WITTMER, 1994

[Japanese name: Iriomote-botaru]

*Material examined.* [Kohama-jima Is.] 1 ♀, Mt. Ufu-daki, 20–XII–1999, Y. GOTO leg.

*Range.* Japan (Yaeyama Isls. – Ishigaki-jima Is., Iriomote-jima Is. and Kohama-jima Is. (new record)).

*Remarks.* This distinctive species has also been recorded from the two large islands of the Yaeyama Group, Ishigaki-jima Is. and Iriomote-jima Is. (OHBA *et al.*, 1996), and is discovered for the first time from a smaller island of the island group.

## 要 約

後藤好正・川島逸郎：琉球列島からのホタル類数種の分布記録。——トカラ諸島から八重山諸島までの琉球列島に産するホタル科6種およびイリオモテボタル科1種の新分布を記録し、加えて各種についてこれまでの分布知見を総括した。

## References (Selected)

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