Available online at www.easletters.com

ISSN No: 2349-2864

Entomology and Applied Science Letters, 2016, 3, 2:29-33

First report of *Apomecyna saltator* Fabricius,1781 from Sunderban Biosphere Reserve, West Bengal

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ABSTRACT

Present communication reports Apomecyna saltator (Fabricius, 1781) and Genus Apomecyna Latreille, 1829 for the first time from Sunderban Biosphere reserve of the Indian part.

Key words: Sunderban Biosphere Reserve, Cerambycidae, Lamiinae, Apomecyna

INTRODUCTION

Studies on cerambycid beetles (Cerambycidae) in Sunderban region is very poor and scanty. Recently, Mitra *et al.* (2015) published a comprehensive list of 8 species under 7 tribes belonging to 3 subfamilies of cermabycid beetles of this Biosphere Reserve.[1]

The cucurbit longicorn, *Apomecyna saltator* Fabricius, under the tribe Apomecynini Lacordaire, 1872, is widely distributed species in the Afrotropical, Oriental, Australasian regions [2-3], Hawaii, and India[4-5]. This beetle was first reported in the state of Oahu in 1896 and has been reported in Hawaii, Kauai, and Maui.

In India, this species was reported by Biswas and Basak (1992) and Mazumder *et al.* (2014) from Andaman & Nicobar Islands, Arunachal Pradesh, Chhatishgarh, Orissa, Tamil Nadu, Uttarakhand and West Bengal (Kolkata, Darjeeling, Maldah)[6][7]. This is the first species of the genus *Apomecyna* and second species under the tribe Apomecynini of the family Cerambycidae, reported from Sunderban Biopshere Reserve.

The coordinates of the collection sites were recorded using GPS (Garmin Oregon 550) which were further used in preparing maps of the survey sites. Map has been prepared using Bhuvan Imagery, (http://bhuvan.nrsc.gov.in) accessed on dated 16/11/2015 (Fig. 1).

TRIBE APOMECYNINI Lacordaire, 1872
GENUS *Apomecyna* Latreille, 1829
Apomecyna saltator (Fabricius,)
Lamia saltator Fabricius, 1781. *Mant. Ins*. 1 : 141.
Apomecyna neglecta Pascoe, 1865. *Trans .ent. Soc. Lond*. (3) 3: 141.
Apomecyna saltator : Rondon & Breuning, 1970. *Pacif. Insects Monogr*. 24: 352.

Type-locality: Orient

Material examined:1 ex, Laxmipur, Bakkhali, South 24 Parganas district, dt. 07. xi. 2015, at night, coll. Udayan Sutar. 21°34.716′ N; 088°15.065' E.

Diagnostic characters: Body small (1.5cm), elongated, dark brown, clothed with densely yellow pubescence throughout (Fig. 2); head small, vertical, mandible black, robust, clypeus trapezoid, frons clothed with densely yellowish pubescent, strongly punctate, broad in between the antennal tubercles gradually narrowed down towards clypeus, vertex broad clothed with densely yellowish pubescent, sparsely punctate little depressed in between the antennal tubercles, antenna 11-segmented, extended beyond the middle of elytra, segments apically darker, segment-I small, robust, almost globular, segment-III largest, bow like (Fig. 7); pronotum elongate, narrowing anteriorly , basally weakly constricted, margined, angulate laterally, coarsely, densely punctate, clothed with thick, dense pubescence; scutellum brown in colour, small, broadly 'U' shaped ; elytra elongate, clothed with densely yellowish pubescent , ornamented with three sets of white irregular spots on each elytron (Fig. 4 and Fig. 5), parallel sided, basally widened, gradually converging towards apex, apex sub-rounded, coarsely punctate, punctures almost in a line; venter densely clothed with yellowish pubescence intermingled with whitish spots and patches of pubescence (Fig. 3), prosternum narrow, lower down in between the coxal cavities, mesosternum broad, anteriorly sub divided, almost at the height of coxa, coxal cavities open ; legs stumpy, femur pedunculate, mid tibia with pre-apical "rainure" (fig.6), tarsal claws divergent.

Biological notes: The life history was recorded by Lefroy (1910) (under the name of *Apomecyna pertigera*)[8].This borer species has been recorded in host plants *Coccinia indica*, *Cucurbita moschaeta*, *Lagenaria vulgaris*, *Luffa acutangula* and *L. aegyptica* from India[6]. This is a pest of various Cucurbitaceae and infrequent pests of cucumbers, pumpkins, squashes, watermelons, and gourds. The grubs of this beetle tunnel in the vines and stems of many cucurbit plants. Grubs bore into the main vines of plants and produce a swelling of the stem. The feeding tunnel is usually directed towards nodes and is filled with glutinous waste material[2]. The larvae enter the stem and infest plants usually showing no conspicuous symptoms. Under very severe infestations, young plants may die, but older plants often live to produce reduced yields. Biswas and Basak (1992) observed that the beetle feeds on and lays eggs in the stem of living pumpkin and the larvae tunnels along this pith and surrounding tissues.[6]

As this borer causes damage to the sap wood of the host plants, so their damage to the timber appears to be less significant. But, Mitra *et al.* reported *Dracontomelum mangiferum, Lannea coromandelica, Parishia insignis, Canarium euphyllum* as the host plants of this borer species from Andaman & Nicobar Islands. Therefore, this borer is of considerable economic importance since it ruins many of commercially important timber yielding species (in press).

Distribution : India **:** Andaman[9]**,** Arunachal Pradesh and Tamil Nadu[10], Odisha, West Bengal (Calcutta, Darjeeling, Maldah)[6], Chattishgarh[7]

Elsewhere : Orient (Fabricius, 1781) , SriLanka, Japan[10], Bangladesh and Srilanka (Pascoe,1865) ; China (Gressitt, 1942), Laos (Breuning), Formosa, Malayasia, Singapore, Penang.

DISCUSSION

So far, 92 recognised species and subspecies of the genus *Apomecyna* has been known from the World and only 23 species reported from the Oriental Region (catalogue des Lamiares du monde)[11]. The biology of this beetle has not been studied well and the duration of each life stage is not known. May (1946) reports that the cucurbit longicorn may have two or three generations per year in melons in Queensland, Australia which is slightly warmer than Hawaii.[2]

Report of this species from Sunderban confirm its distribution throughout West Bengal.

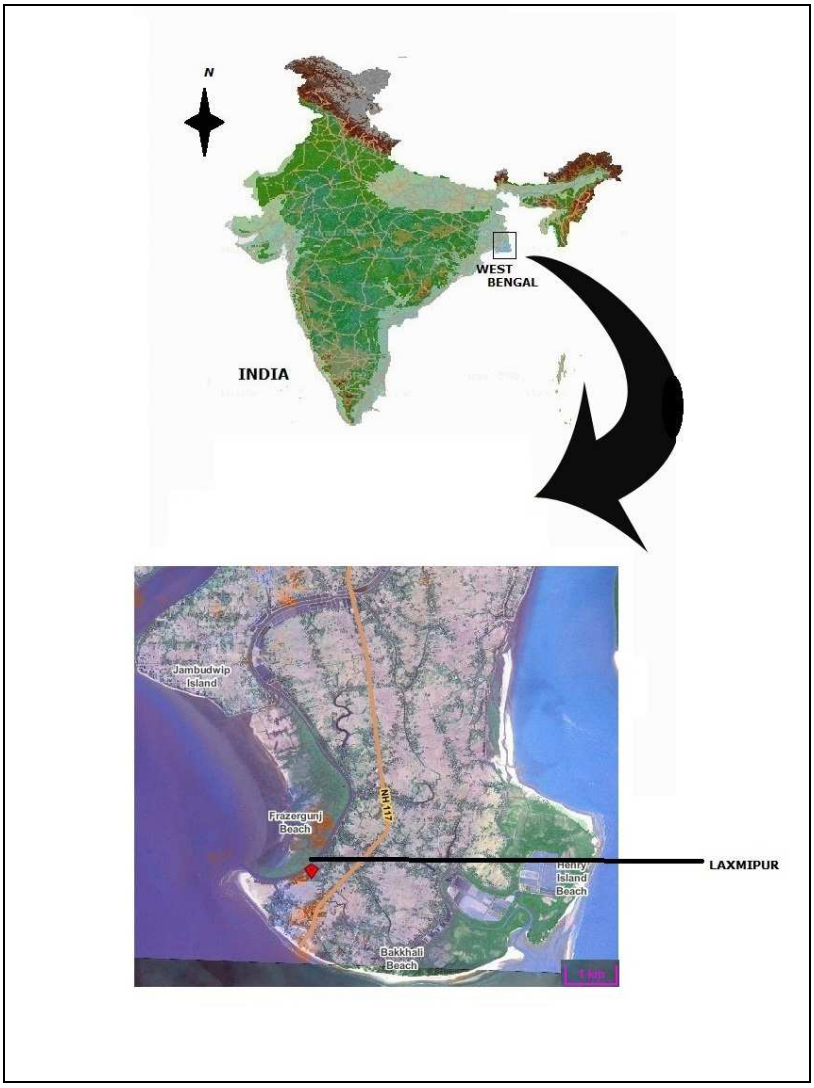

Fig.1. Map showing the collection locality

Fig. 2. Dorsal view

Fig. 3. Ventral view

Fig. 4. Lateral view

Fig. 5. Three spots on elytron

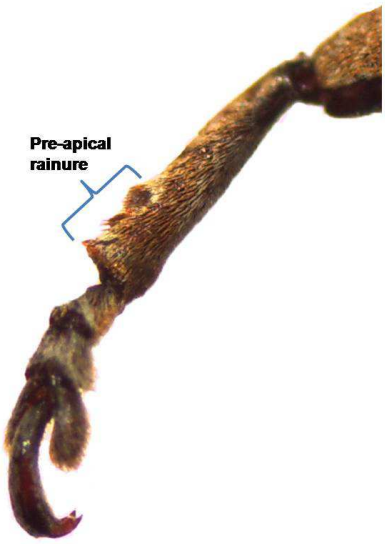

Fig.6. Mid tibia with pre-apical "rainure"

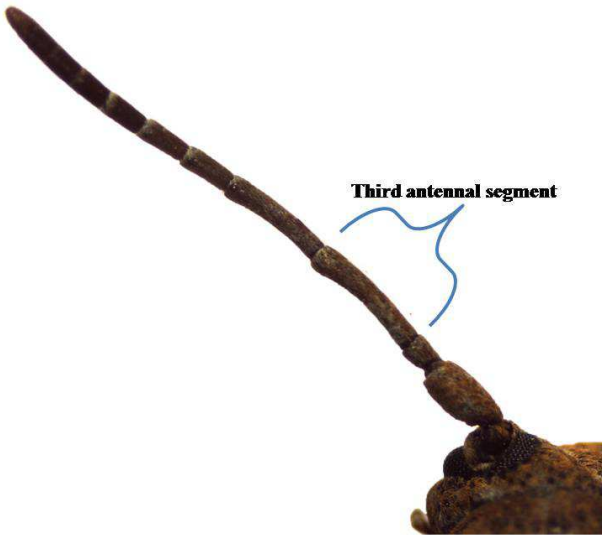

Fig. 7. Antenna

Acknowledgement
Authors are grateful to the, Director, Zoological Survey of India for providing necessary facilities and encouragements.

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