



New record of *Apsilops scotinus* (Tosquinet) (Hymenoptera: Ichneumonidae: Cryptinae) from India

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ABSTRACT: Incidence of a species of *Apsilops* was noted as a parasitoid of rice case worm *Parapoynx stagnalis* (Zeller), in Pattambi, Kerala, India, in large numbers. It was a larval-pupal parasitoid attacking 4th to 5th instar larvae. This species has been identified as *A. scotinus* (Tosquinet) and is new record from India. © 2014 Association for Advancement of Entomology

KEY WORDS: Rice case worm, *Parapoynx stagnalis*, Parasitoid, *Apsilops scotinus*

Apsilops Förster is a small genus of the subfamily Cryptinae with eight known species. The species are known from North America, Europe, and Asia (Indonesia and Japan). Available reports indicate species of this genus parasitize aquatic or semi aquatic moths of the families Crambidae and Noctuidae (Yoshida et al., 2011). From India, undetermined species of *Apsilops* have been reported as larval parasitoids of rice yellow stem borer, *Scirpophaga incertulas* (Walker) and rice caseworm, *Parapoynx stagnalis* (Zeller), both belonging to Crambidae (Rao et al., 1968, 1969).

Sinu et al. (2007) reported a species of Cryptinae identified as nr. *Litochila* as a pupal parasitoid of rice caseworm and studied its host searching behavior and reported its ovipositing under the water. Yoshida et al. (2011) surmised that this is probably a species of *Apsilops* based on this behavior.

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We came across a species of *Apsilops* parasitizing the larvae of *P. stagnalis* in Pattambi, Kerala, India, in large numbers. Incidence was observed in August 2014 as larval-pupal parasitoid attacking 4th to 5th instar larvae and adults emerged from the pupal stage of the host. Out of a total of 70 larvae sampled during August 2014, nearly 32 were found to be parasitized (45.7%). This species was identified based on key given by Yoshida *et al.* (2011) as *A. scotinus*.



Fig. 1. *Apsilops scotinus*, new record

Until now, *A. scotinus* has been known only from Indonesia (Java, Sumatra) (Yu *et al.*, 2014) and thus is new record of *A. scotinus* from India.

When the second author examined unidentified material of Ichneumonidae collected by the Commonwealth Institute of Biological Control – Indian Station, Bangalore, additional specimens of *Apsilops* from West Bengal were located and these were also found to be conspecific with *A. scotinus* (Rao *et al.*, 1968) recorded *Apsilops* sp. on the larvae of rice yellow stem borer from Lucknow, Uttar Pradesh. It is likely that the parasitoid is widely distributed in India.

Material examined: INDIA: Kerala: Pattambi, 2014, Ex. rice caseworm, K. Karthikeyan, 4 males, 4 females (NBAIR).

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REFERENCES

- Rao V.P., Basu A.N., Phalak V.R., Chacko M.J. and Dinesh Rao H. (1968) Some new records of parasites of rice stem-borers in India. Proceedings of the Indian Academy of Sciences (B), 68: 91–110.
- Rao V.P., Chacko M.J., Phalak V.R. and Dinesh Rao H. (1969) Leaf-feeding caterpillars of paddy and their natural enemies in India. Journal of Bombay Natural History Society, 66: 455–477.
- Sinu P.A., Nasser M. and Dharmarajan P. (2007) Host searching behavior and potential of an aquatic ichneumonid pupal parasitoid of rice caseworm (*Paraponyx stagnalis*) in an upland rice paddy agro-ecosystem of the Western Ghats, India. Biocontrol Science and Technology, 17: 1037–1045.
- Yoshida T., Nagasaki T. and Hirayama T. (2011) A new species of the genus *Apsilops* Förster (Hymenoptera: Ichneumonidae: Cryptinae) from Japan; parasitoid of an aquatic crambid moth. Zootaxa, 2916: 41–50.
- Yu D.S.K., Van Achterberg C. and Horstmann K. (2014) Home of Ichneumonoidea. Available online at <http://www.taxapad.com>.

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