

On the presence of the Caddisfly *Stenopsyche siamensis* Martynov, 1931 from Central Thailand (Trichoptera Stenopsychidae)

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ABSTRACT

In the present paper, caddisfly larvae and pupae of *Stenopsyche siamensis* Martynov, 1931 (Trichoptera Stenopsychidae) are recorded from upstream of Maewong Basin, Central Thailand.

KEY WORDS

Caddisflies; *Stenopsyche siamensis*; Stenopsychidae; Trichoptera.

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INTRODUCTION

Caddisflies are aquatic insects of the order Trichoptera Kirby, 1813. This order of aquatic insects is a very large one comprising more than 10,000 species in the world (Sangpradub & BoonSoong, 2006).

In tropical Asia, Caddisflies include about 28 families (Dudgeon, 1999) and, more particularly, 491 species were recorded in Thailand (Malicky & Chantaramongkol, 1999). In natural freshwater ecosystems Caddisflies are important and fundamental components.

Caddisflies of the family Stenopsychidae Martynov, 1924 are different from other families of Trichoptera by the combination of the following morphological and ecological characters: a) head longer than 2 times as long as wide; b) mesopleuron not extended anteriorly; c) dorsum of abdominal segment 9 without sclerotized plate; d) larvae of the family building nests between large stones (Sangpradub & BoonSoong, 2006).

In Thailand, Stenopsychidae comprise one genus, *Stenopsyche* McLachlan, 1868, and six species (Malicky & Chantaramongkol, 1999) including *Stenopsyche siamensis* Martynov, 1931; life cycle

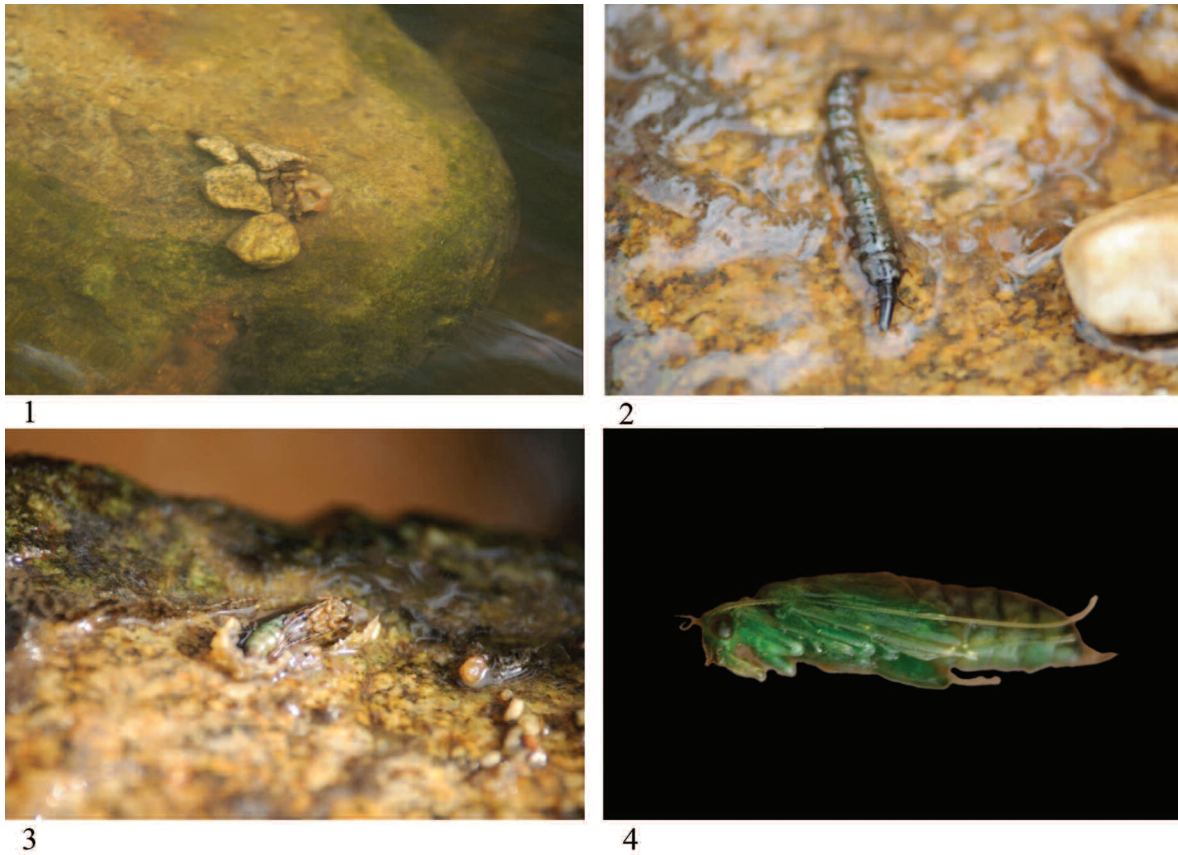
and feeding habits of *S. siamensis* in Thailand were studied by Laudee & Chantaramongkol (2003).

Stenopsyche siamensis Martynov, 1931

This species is widely distributed in Thailand and Malaysia (Laudee & Chantaramongkol, 2003). In a survey project of aquatic ecology at upstream of Maewong Basin, Pangsira Thong District, Kamphaeng Phet Province, Central Thailand, carried out in May 2012, we found many specimens of *S. siamensis* at larvae and pupae stage.

This report is important for faunistic and ecological aspects, considering that all the Trichoptera are good ecological indicators. Particularly, larvae and pupae of *S. siamensis* (Laudee & Chantaramongkol, 2003), were found in upstream mountainous areas or islets of Maewong Basin, where water is of high-quality, the stream is transparent and running fast, on average about less than 1 m deep and the stream ground is made of rough sand and large stones.

These larvae make protective cases by fibers between large stones and/or under stones, stay in-



Figures 1-4. Residence constructions under stones (Fig. 1), larva (Fig. 2) and pupa (Fig. 3, 4) of *Stenopsyche siamensis* from Maewong Basin, Thailand.

side the construction and live in the stream since they get to pupa stage when, the small sticky fiber, reinforced by rough sand from the stream ground, is wrapped around the body of the insect (Figs. 1-4).

Present paper reports on an additional record of the species from Central Thailand confirming indirectly the good water quality of upstream of Maewong Basin.

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