

# *Clepsis dumicolana* (Lepidoptera: Tortricidae), new to the Belgian fauna

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**Samenvatting.** *Clepsis dumicolana* (Lepidoptera: Tortricidae), een nieuwe soort voor de Belgische fauna.

Op 17 augustus 2008 werd te Luik een exemplaar van *Clepsis dumicolana* (Zeller, 1847) (Lepidoptera: Tortricidae) waargenomen rustend op *Hedera helix*, in de buurt van de Kennedy-brug, leg. J.-Y. Baugnée. Nadien werd in dezelfde stad nog een veertigtal exemplaren waargenomen op twee plaatsen op de hellingen van de citadel. Het is de eerste maal dat deze soort uit België wordt vermeld. Details over de levenswijze en de verspreiding worden gegeven.

**Résumé.** *Clepsis dumicolana* (Lepidoptera: Tortricidae), une espèce nouvelle pour la faune belge.

Le 17 août 2008, un exemplaire de *Clepsis dumicolana* (Zeller, 1847) (Lepidoptera: Tortricidae), posé sur une feuille de *Hedera helix*, fut observé à Liège, près du pont Kennedy, leg. J.-Y. Baugnée. Une quarantaine d'autres exemplaires furent ensuite notés dans la même ville, en deux endroits des Coteaux de la Citadelle. C'est la première fois que cette espèce est mentionnée pour la faune de Belgique. Des informations concernant sa biologie et sa répartition sont données.

**Key words:** *Clepsis dumicolana* – Faunistics – First record – Belgium.

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On 17 August 2008, a specimen of *Clepsis dumicolana* (Zeller, 1847) was observed in the city of Liège near the "Pont Kennedy", while it was resting on a leaf of *Hedera helix*, leg. J.-Y. Baugnée (Fig. 1). In September 2008, more than forty specimens were observed in the same city, respectively at the "Esplanade Saint-Léonard" (8 September) and at the "Terrasse des Minimes" (29 September), in a south exposition, leg. J.-Y. Baugnée. It is the first time that this species is observed in Belgium and it increases the number of Tortricidae species recorded from Belgium to 363 (De Prins & Steeman 2008).

The species is readily recognized as a *Clepsis* mainly by its wing shape, but it is quite different from the other *Clepsis* species which have been recorded from Belgium (De Prins & Steeman 2008). The male has a costal fold. The head is orange brown. The thorax is of the same colour as the basal blotch or a little bit darker brown and has a yellowish ochreous collar. The ground colour of the fore wings is brownish grey and the markings are darker brown, in fresh specimens with a faint violet hue. The basal blotch is less dark brown than the median band, but in many specimens more prominent than in the picture in Razowski (2002, pl. 15). In some specimens, the basal blotch has almost the same colour as the ground colour of the forewing, but then at least two small dark brown spots remain delimiting the proximal edge of this blotch. The postmedian fascia is very broad and sometimes connected to the rather small subapical blotch. Its interior

border shows two concave waves. Both the basal blotch and the median fascia are edged with some light ochreous yellowish scales (Fig. 1).

### **Distribution**

*Clepsis dumicolana* has a southern European distribution but it is expanding its areal northwards during the last years. Whether this is due to anthropogenic factors or is caused by the active expansion of its areal, has to be studied. It is known from the following countries or islands (Aarvik 2007): Corsica, Italy, Sardinia, Sicily, Slovenia, Spain, and Switzerland. It has furthermore been recorded from Austria, Croatia and mainland France; the most northern localities in this country are situated in Saône-et-Loire (Seliger *et al.* 2008). Outside Europe, it occurs in Syria and Lebanon (Razowski 2002: 118).

In 2006, it was observed for the first time in Germany, Baden-Württemberg, when in many regions of the city of Stuttgart well established populations of the species were noticed (Hausenblas 2006, 2007). The species was common in the same localities in 2007. *C. dumicolana* was furthermore recorded in Germany from Gaggenau (Hausenblas 2006) and from Berlin-Steglitz (Peschel *et al.* 2008). In 2007, the species had spread till Nordrhein-Westfalen. Many specimens were observed on 3 October in the city of Kempen, flying around *Hedera helix* which was growing on a southern exposed wall (Seliger *et al.* 2008).

In June 2008, *C. dumicolana* was first reported from the Netherlands when some specimens were seen in Amsterdam (Werkgroep Vlinderfaunistiek).

It is unclear how this species reached Germany and Belgium. Perhaps, it was imported with its foodplant. It can certainly establish strong populations in a short period as was observed in several German cities (Seliger *et al.* 2008). The Belgian specimens could well have originated from the population in Kempen, but it is also possible that it has been imported from the Mediterranean region by anthropological activities. The fact that the species has been recorded from several localities in Central Europe, makes it clear that the species is expanding its range, probably in part by its own means, and partly because of the introduction of specimens in more northern regions.

### **Biology**

The early stages are still not described (Razowski 2002: 118) but the biology of the species is rather well known. The eggs are deposited on the leaves of *Hedera helix*. As far as known, the caterpillars feed exclusively on this foodplant (Spuler 1910: 248). First instar larvae consume the upper layer of the leaves, and later instars eat holes in the leaves. The species was bred indoors at ca. 18°C from eggs laid in October producing the first adult in March of the next year (Seliger *et al.* 2008).



Figs. 1–2. *Clepsid dumicolana* (Zeller, 1847), Pont Kennedy, Liège, 17.viii.2008, leg. J.-Y. Baugnée; 3. Southern exposed wall at Liège partly covered with *Hedera helix* (photo J.-Y. Baugnée).

Under natural circumstances the species hibernates in the larval stage. Full-grown larvae have been found in April–May. Pupation takes place between leaves of the foodplant spun together. Adults usually fly in the evening around the larval foodplant, but sometimes they are also active during daytime. The flight period is from mid May till mid July (Razowski 2002: 118). However, the species was observed in Belgium from mid August to end of September and in Baden-Württemberg and Nordrhein-Westfalen in October which presumes the occurrence of a (partial) second generation. Such a generation has never been recorded from the south of Europe. The Belgian records are situated in between the known dates and this makes it difficult to distinguish clearly between generations. It is perhaps possible that the caterpillar develops whenever the favourable temperatures are reached, which, in the temperate climate zone, can be throughout the year, except for the cold winter months. In South Europe, it might be too hot and dry during the summer months for the caterpillar to develop.

The species seems to prefer xerotherm habitats as in most of the observations the moths were present in gardens, graveyards, parks etc. where *Hedera helix* was growing on walls, tree trunks or other substrates directed to the south.

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