



A new species of *Orthosia* Ochseneimer, 1816 from North-East Kazakhstan (Lepidoptera, Noctuidae)

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Orthosia Ochseneimer, 1816 is a Holarctic-Oriental noctuid genus comprising more than 60 described species, with most distributed in the eastern and southeastern Palaearctic and Oriental regions. Many species have recently been described from Asia (Hreblay 1991, 1993, 1994; Yoshimoto 1993; Hreblay & Plante 1994; Hreblay & Ronkay 1998, 1999; Ronkay *et al.* 2010, Saldaitis *et al.* 2011, etc.). The *O. incerta* species-group includes 10 described species (see Ronkay *et al.* 2001), and during the course of faunistic studies on the Noctuidae of North-East Kazakhstan, a new member of this species-group was found; it is described herein as new.

Orthosia (Orthosia) ronkayorum Volynkin & Titov, sp. n.

(Figs 1–4, 11, 12, 17, 21, 22)

Type material. Holotype: male, 08.v.2013, NE Kazakhstan, Pavlodar area, Ekibastuz district, 12 km NW Shiderty village, coast of Shiderty Reservoir, 51°47'54.21" N, 74°35'11.57" E, Volynkin A.V. & Titov S.V. leg. (Coll. Zoological Institute, Russian Academy of Sciences, St. Petersburg, Russia [ZISP]). Slide AV0855 Volynkin. Paratypes: 1 female, with the same data as holotype (Coll. A. V. Volynkin, Barnaul, Russia [AVB]); 15 males, 1 female, 19.iv.2012, NE Kazakhstan, Pavlodar area, Ekibastuz district, 11–12 km NW Shiderty, 51°48' N, 74°35' E, S.V. Titov leg. (Colls. ZISP; AVB; S. V. Titov, Pavlodar, Kazakhstan [STP]). Slides AV0845 Volynkin (male), AV0846 Volynkin (female).

Diagnosis. The species belongs to the *O. incerta* species-group. It is the northernmost species of the *O. picata* lineage which includes five described species: *O. picata* (Bang-Haas, 1912) (Figs. 5–7), *O. faqiri* Hreblay & Plante, 1994, *O. feda* Hreblay & Plante, 1994, *O. ariuna* Hreblay, 1991 (Fig. 8) and *O. reshoeffti* Hreblay, 1994. *O. ronkayorum* is closely related to Central Asian *O. picata* and *O. ariuna*. It is the smallest species of the group. As well as other members of the group, it is an externally variable species, and other than its small size the remaining differences are in the genitalia; in addition, *O. ronkayorum* has relatively smaller eyes than the related species *O. picata*. The male genitalia of *O. ronkayorum* (Figs 11, 12) are most similar to those of *O. picata* (Figs 13, 14), but differ by longer and medially broader uncus, narrower juxta, longer vinculum, somewhat narrower apical part of cucullus, narrower basal part of pollex, smaller clavus, broader distal part of clasper and somewhat shorter thorn of carina; from other Central Asian species of the group – Mongolian *O. ariuna* (Fig. 15), the male genitalia of the new species differ by broader medial part of uncus, narrower juxta, somewhat shorter vinculum, smaller cucullus with narrower neck, narrower and longer pollex, smaller clavus, broader distal part of clasper, broader lateral bar of carina and longer thorn of carina; from Pakistanian *O. faqiri* and *O. feda* (figured by Hreblay & Plante 1994) the male genitalia of *O. ronkayorum* differ by broader medial part of uncus, somewhat narrower juxta, longer vinculum, narrower valva, smaller cucullus with narrower neck, narrower basal part of pollex, smaller clavus, broader distal part of clasper, larger lateral bar of carina and longer thorn of carina; from *O. incerta* (Hufnagel, 1766) (Figs. 9, 10, 16) which occur sympatrically in North-East Kazakhstan, the male genitalia of *O. ronkayorum* differ by apically pointed uncus, shorter and narrower juxta, longer vinculum, smaller and narrower cucullus, narrower pollex, smaller clavus, broader lateral bar of carina and shorter thorn of carina. In the female genitalia *O. ronkayorum* (Fig. 17) differs from *O. picata* (Fig. 18) by less sclerotised ostium bursae, somewhat shorter ductus bursae, shorter and less sclerotised appendix bursae and larger corpus bursae; from *O. ariuna* (Fig. 19) differs by less sclerotised ostium bursae with shorter lateral crests, larger broad posterior part of ductus bursae, shorter and stronger



FIGURES 21–23. *Orthosia ronkayorum*, adults in nature and biotope. 21, adult, NE Kazakhstan; 22, adult, NE Kazakhstan; 23, NE Kazakhstan, 12 km NW Shiderty village, coast of Shiderty Reservoir, 51°47'54.21" N, 74°35'11.57", biotope of *O. ronkayorum* and *O. incerta*.

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