

Supplementary Electronic Material

Table S1. A description of the larval habitat of *B. menetriesii* in Eastern Siberia

Locality*	Habitat type	Habitat location	Plant community description
Baikal Lake Area, foothills of the Baikalsky Mountain Ridge, Upper Lena River drainage, Bolshoy Anay River valley (53° 56' 19" N, 107° 24' 35" E)	Mixed coniferous taiga forest	On the terrace of the Bolshoy Anay River at 50 m from shoreline, ca 770 m alt., situated in a large primary taiga forest massif, belonging to the Nature Reserve	The Siberian spruce (<i>Picea abies</i> ssp. <i>obovata</i> (Ledeb.) Domin, Pinaceae), Siberian fir (<i>Abies sibirica</i> Ledeb., Pinaceae) and Siberian cedar (<i>Pinus sibirica</i> Du Tour, Pinaceae) are the basis of a forest stand. Birch (<i>Betula pendula</i> Roth, Betulaceae) was present in small patches. Shrub species of the habitat were <i>Sorbus sibirica</i> Hedl., <i>Prunus padus</i> L., <i>Rosa acicularis</i> Lindl. and <i>Ribes nigrum</i> L. (Rosaceae); a single dwarf shrub species was <i>Vaccinium vitis-idaea</i> L. (Ericaceae). The most abundant herb species were <i>Aconitum rubicundum</i> Fischer, <i>Delphinium elatum</i> L. (Ranunculaceae), <i>Cardamine macrophylla</i> Willd. (Brassicaceae), <i>Parasenecio hastatus</i> (L.) Koyama (Asteraceae), <i>Maianthemum bifolium</i> (L.) Schmidt (Asparagaceae), <i>Pyrola rotundifolia</i> L. (Ericaceae), <i>Vicia venosa</i> (Willd. ex Link) Maxim. (Fabaceae), <i>Filipendula palmata</i> (Pall.) Maxim. (Rosaceae), <i>Carex iljinii</i> Krecz (Cyperaceae), <i>Calamagrostis obtusata</i> Trin. (Poaceae), <i>Equisetum scirpoides</i> Michx. and <i>E. pratense</i> Ehrh. (Equisetaceae).

* - Climate data (Vorob'ev 2004; Stepantsova 2013): the region has an extreme continental climate. The annual mean air temperature is approximately -4 °C, annual precipitation is 600–800 mm, mean air temperature of the coldest month (January) is -26.7 °C, and of the warmest month (July) is 16.1°C; the summarised daily means above 10 °C are approximately 1000–1100 °C. The frost-free period is 70–90 days. However, night air temperatures up -5 °C are often observed in several days up to June – early July.



Figure S1. The collection locality of *B. menetriesii* larvae near the Bolshoy Anay River, Baikalo-Lensky Nature Reserve, 9.viii.2013 (photo: O. E. Berlov).

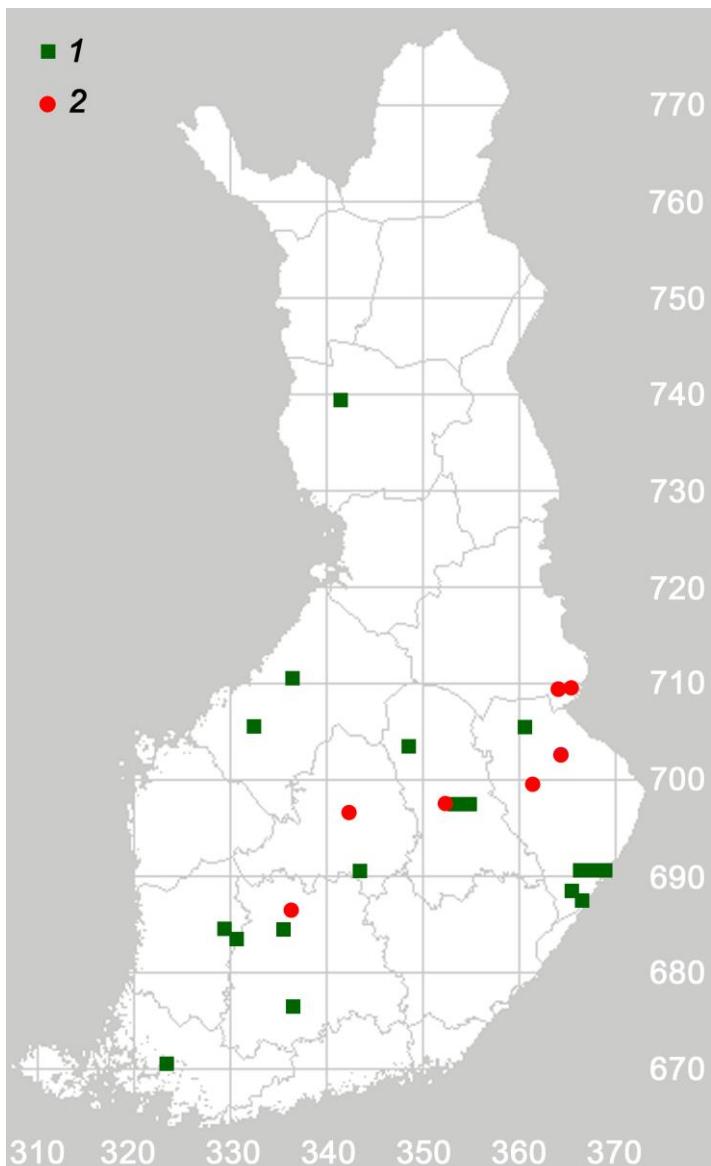


Figure S2. Records of *Aconitum lycoctonum* (1) and *Borearctia menetriesii* (2) in Finland. The base of the map and the host plant records have been taken from Lampinen et al. (2014). The tiger moth localities were obtained from Pakkanen & Wettenhovi (2014).

References

- Lampinen R, Lahti T, Heikkinen M (2014) Kasviatlas (Atlas of the distribution of vascular plants in Finland) 2013. Helsingin Yliopisto, Luonnontieteellinen keskuskäytävä, Helsinki, <http://www.luomus.fi/kasviatlas> [accessed 21.xi.2014]
- Pakkanen P, Wettenhovi J (2014) *Borearctia menetriesii* in Finland, <http://perhoset.nettitieto.fi/historia/arctiinae/bor-menetriesi.htm> [accessed 21.xi.2014]
- Stepantssova NV (2013) Biota of the Baikalo-Lensky Nature Reserve: plant cover [in Russian]. Time of Travel Publ., Irkutsk, 208 pp.
- Vorob'ev VV (ed.) (2004) Atlas of Irkutsk Oblast: ecological features of development [in Russian]. Institute of Geography of Siberian Branch of the Russian Academy of Sciences, Moscow-Irkutsk.