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***Liposcelis pubescens* (Psocoptera: Liposcelididae): an under-recorded British booklouse in Glasgow, Scotland**

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Booklice and barklice (Psocoptera) are small to minute insects (Fig. 1), some with wings and others without, that live in vegetation or among dried materials. The subject of this Short Note – the booklouse *Liposcelis pubescens* Broadhead, 1947 – was first found on “dusty shelves and old paper” at the Biology Field Station cellar at Slough, Berkshire, England on 10th March 1943 (the type locality), and again on 16th April that year at Millwall Central Granary, London. The specimens are in the spirit collection at the Natural History Museum (NHM) in London (P. Brown, pers. comm.).



Fig. 1. *Liposcelis* sp. In flour, Manheim-Vogelstang, Baden-Württemberg, Germany, 5th November 2017; size ca. 1 mm. (Photo: Andreas Eichler, <https://creativecommons.org/licenses/by-sa/4.0/deed.en>)

NHM also have specimens from a London SW11 “household” on 14th October 1980 and from Camelford, Cornwall, England in an egg custard mix from 1981. There are no occurrences shown on the NBN Gateway

(NBN, 2021), and there are no specimens in the collections at the National Museum of Scotland (NMS), though they have the records and collection donated by the late organiser of the U.K. Psocoptera recording scheme, Bob Saville (A. Whiffin, pers. comm.)

It is therefore surprising to be able to report the presence of thriving populations of *L. pubescens* in a kitchen cupboard at the author’s address (see above) in October 2019 during renovations. The populations were in an opened, but long-neglected, bag of plain flour (best-before date 2014), and a partly-used packet of vegetable suet of similar age. In both, the presence of the booklice was signalled by a layer of “caking” on the top surface of the contents of the packets, though there were also vacated lepidopteran pupae in the flour.

Having identified the insect to genus level, I sent the specimens, as advised by the identification key (BRC, 2019) to Charles Lienhard, an Honorary Curator of Arthropoda at the Geneva Museum, Switzerland. I sent about a dozen specimens, which Dr Lienhard identified as *L. pubescens*; both males and females were present. Further specimens from the same populations were donated to the Hunterian Museum in Glasgow.

This seems to be another example of an under-recorded species, though from a generally under-recorded taxonomic order in the U.K. Turner & Bishop (1998) examined 727 yeast trap samples from households throughout the U.K.; of these households, 186 had *L. bostrychophila*, which is a common pest of stored products, whereas only two specimens of *L. pubescens* were found during the survey. This demonstrates the relative rarity of the latter across the U.K. It is rather small (ca. 1 mm in length) and wingless; the better-recorded species of barklice tend to be winged and found outdoors on trees, as the alternative common name “barkfly” would suggest. However, the common name “booklouse” generally refers to the wingless indoor species, particularly of the genus *Liposcelis*, which are typically found feeding on books, particularly on the starch used in the bindings, or on moulds growing in the bindings, though they are also known as pests of stored food products (Turner, 1994).

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REFERENCES

- Biological Records Centre (BRC) (2019). National barkfly recording scheme. www.brc.ac.uk/schemes/barkfly/homepage.htm Accessed November 2019.
- National Biodiversity Network (NBN) Atlas (2021). <https://species.nbnatlas.org/species/NBNSYS0000022473> Accessed 17th December 2021.

Turner, B.D. (1994). *Liposcelis bostrychophila* (Psocoptera: Liposcelididae), a stored food pest in the UK. *International Journal of Pest Management* 40, 179-190.

<https://doi.org/10.1080/09670879409371879>

Turner, B. & Bishop, J. (1998). An analysis of the incidence of psocids in domestic kitchens: The PPFA 1997 Household Survey: What's bugging your kitchen? *Environmental Health Journal* 106, 310-314.