A record of the larvae of Box-tree Moth Cydalima perspectalis feeding on Holly Ilex aquifolium Wendy Carter

In May 2023 I was contacted by Chris Oliver of St Johns, Worcester, who was concerned about caterpillars "demolishing a holly bush" (01) in his front garden. The caterpillars were identified as those of the Box-tree Moth Cydalima perspectalis and it appears to be the first record of this species eating Holly Ilex aquifolium in the UK (although it is likely that more records of new foodplants will emerge as records are collated and published). The caterpillars had not only eaten most of the Holly but had also denuded several large hedges of Box Buxus sempervirens on the street (02 & 03).



01. Holly "demolished" by Box-tree Moth caterpillars, Worcester May 2023. Chris Oliver



02. Box hedges denuded by Box-tree Moth caterpillars, Worcester. Chris Oliver.

Box-tree Moths are native to Asia but have been introduced to Europe (probably through the horticultural trade) where they were first recorded in Germany in 2006, and by 2007 they had reached England. First recorded in Worcestershire in 2017, it seemingly took a while for them to spread, but 2023 saw a boom in records from right across the county.

An email conversation between Oliver Wadsworth and the author confirmed that previous reports have indicated that the larvae have been recorded on other species. In its native range in Asia, it has been recorded on certain types of spindle *Euonymus spp.* as well as Chinese/Purple Holly *Ilex chinensis* and Orange Jasmine *Murraya*

paniculata (Korycinska & Eyre 2011). In Europe, they've been recorded as moving to species other than Box (both wild and cultivated varieties) only when their primary foodplant has been completely eliminated; host-species recorded in Europe have been Butcher's-broom Ruscus aculeatus and Plaited-leaved Bramble Rubus plicatus. The new Guide to the Pyralid and Crambid Moths of Britain and Ireland records that Variegated Myrtle Myrtus communis 'variegata' has been used 'on one occasion' (Parsons & Clancy 2023).



03. Box-tree Moth caterpillars at work on Box. Chris Oliver.

It is probable that the larvae had moved to the Holly because they'd eaten all the Box in the area, but it remains a possibility that a female had laid eggs onto the Holly in the first place. It will be interesting to record how well the larvae do on alternative foodplants; will the currently large numbers of adults be curtailed once there is very little Box left? If they do well on alternative foodplants, what does this mean for those potential foodplants? Current observations indicate that an infestation of Box-tree Moth larvae destroys Box entirely, but Chris Oliver's observations in St Johns suggest that the Holly is bouncing back. Will native parasites catch up with them and reduce their numbers? Records that have been submitted via the Wildlife Sightings Project alongside anecdotal observations, are indicating that birds are beginning to get a taste for Box-tree Moth caterpillars with both House Sparrows *Passer domesticus* and Blue Tits *Cyanistes caeruleus* being recorded eating them.

We would welcome any sightings of Box-tree Moth and, in particular, information about host plants and interactions with other species.

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Images

- 01. Holly "demolished" by Box-tree Moth caterpillars, Worcester May 2023. Chris Oliver
- 02. Box hedges denuded by Box-tree Moth caterpillars, Worcester. Chris Oliver.
- 03. Box-tree Moth caterpillars at work on Box. Chris Oliver.