

# The original head-bangers: Deathwatch beetles

During the Somerset meeting adult deathwatch beetles (*Xestobium rufovillosum*) were found on the aisle floor and within pews at St Mary and All Saints, Broomfield church. This insect is infamous for structural damage caused by larvae within old oak timber. Both sexes produce tapping noises by banging their heads on wood surfaces in order to locate each other. This behaviour was often heard in the quiet of the night when it was traditional to keep vigil by dying relatives or their corpses and accounts for its vernacular name. Thomas Browne's *Pseudodoxia Epidemica or Vulgar Errors* (1646) seems to have first used the word '... few ears have escaped the noise of the death-watch, that is, the little clicking sound heard often in many rooms, somewhat resembling that of a watch; and this is conceived to be of an evil omen or prediction of some person's death ... there is nothing of rational presage or just cause of terror ... this noise is made by a little



Deathwatch beetle Photo Creative Commons Wikipedia  
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FIGURE II: Population of Humans and Wood-Boring Beetles at Bartons End

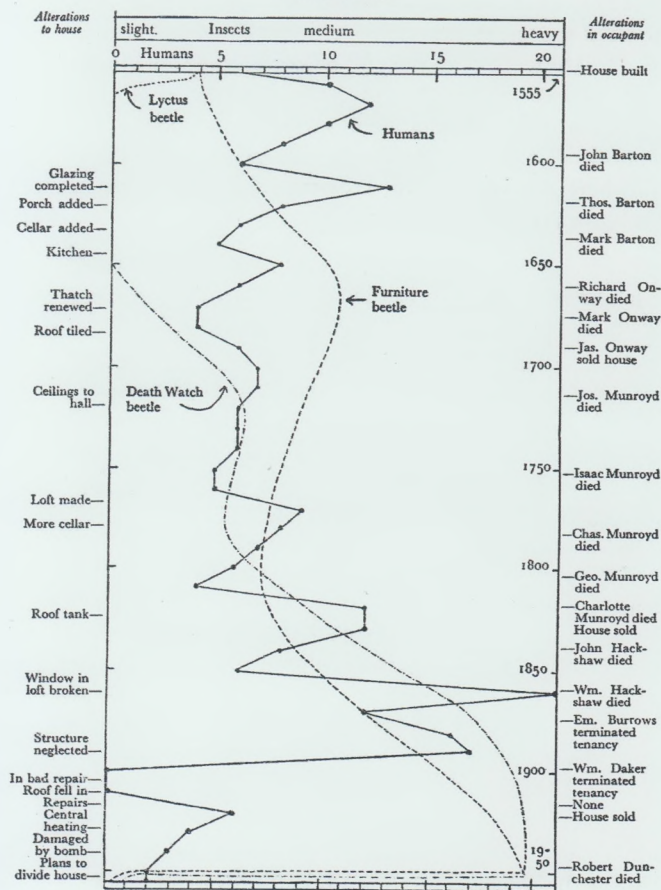


Chart from George Ordish (1959) *The Living House* showing the estimated appearance of deathwatch in 1650 and its demise along with furniture beetle when the house was treated in 1955.

sheathwinged grey insect, found often in wainscot benches and wood-work in the summer'. Then, as now, few people would actually see a beetle.

The natural distribution of the species is as far north as Yorkshire. In Scotland there is one old record (pre

1853) from an ancient tree. Without a tradition of building oak-timbered houses, even if infested firewood was brought into the house — the usual mechanism of entry — there was no further opportunity to cause damage. George Ordish (1906–1992) wrote an entertaining account of the organisms that would have occupied a Kentish farmhouse, Bartons End, (*The Living House*, 1959; my copy is the Scientific Book Club edition). Over the centuries bats roosted in the roof and parasitic worms occupied the human residents' intestines. Ordish, by profession an economic entomologist, also reconstructed past populations of furniture beetle (*Anobium punctatum*) and deathwatch. Furniture beetles were a constant presence from the first build but deathwatch requires oak to be more than 60 years old. During this time and under damp conditions certain decaying fungi slowly develop and the timber is then rendered palatable for the larvae.

Broomfield church [visited on the Somerset conference — see p. 40–42 below] showed signs of historic insect damage of both these pests in many pew ends, but of concern are currently active deathwatch beetles. In addition to seeing recently emerged adults there were small areas of exposed pale damaged wood from larval feeding. This leads to questions concerning treatment. DDT and other organochlorine insecticides developed after the Second World War are no longer available following environmental problems. Such treatment was used at Bartons End in 1955. Deathwatch adults are reluctant flyers and the females usually deposit eggs directly on the wood from which they emerge. By annual surface treatment using legally available insecticides with due diligence over a period of 10–15 years (the maximum period larvae can take to develop) re-infestation will cease. It has been observed that deathwatch is now quite rare in buildings as over the centuries they have used up all available resources and sources of dampness have been eliminated. It is predicted that they will become extinct in such situations, only inhabiting veteran trees in the countryside.