

Report on beetles (Coleoptera) collected from the Dartington Hall Estate, 2012 by Dr Martin Luff.

1. Introduction

As in 2011, beetles were collected on the Estate on nine occasions but on a more restricted range of dates between 8th May and 31st October. The wet weather during most of June and July meant that most species were recorded before or after these months. This also limited the amount of collecting off herbaceous vegetation by sweeping, which I had intended to concentrate on. However this was compensated for by investigating previously unrecorded habitats, especially those species found in compost: Mary Bartlett kindly allowed access to her garden for this purpose. I was also requested to check or identify beetles recorded from Huxhams by Dr Carly Benefer of Plymouth University, as part of her study on trapping methods in conjunction with Schumacher College.

2. Results

A total of 120 beetle species from 21 families were recorded. Of these, 76 were not recorded in my earlier (2010 and 2011) lists. The three lists together now total 283 species. A list of all the additional species is appended to this Report. The compost heaps yielded 28 species of beetle, of which 25 had not previously been recorded from the Estate. The beetles recorded in Dr Benefer's work comprised 31 species, of which 12 were additions to the overall list.

3. Notable species

Five of the 2012 species are either listed as Nationally Notable or rarer in the JNCC Review of Scarce and Threatened Coleoptera (Hyman & Parsons, 1992, 1994), or are notable in Devon. Details of these, in taxonomic order, are given below. The figures show each species.

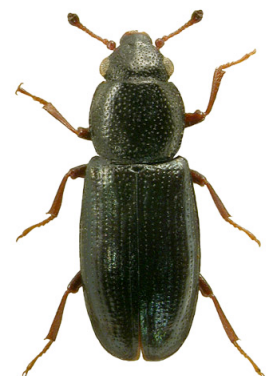
Family: Staphylinidae (rove beetles)

Rugilus angustatus (Geoffroy, 1785) (= *fragilis* (Gravenhorst, 1806)). Notable.
A rather small (5mm), slender rove beetle with a characteristic red pro-thorax. One was found in woody flood refuse by the River Dart near the lower drive on 15th May. It is found in various types of damp litter and refuse, where it is presumed to be predatory. This is probably a new species for Devon.



Family: Rhizophagidae

Cyanostolus aeneus (Richter, 1820). Notable A, Saproxyllic Rarity Score 16.
Beetles of this family are small (ca. 3mm), cylindrical predators mostly living under the bark of dead trees. A single specimen of *C. aeneus* was found in the

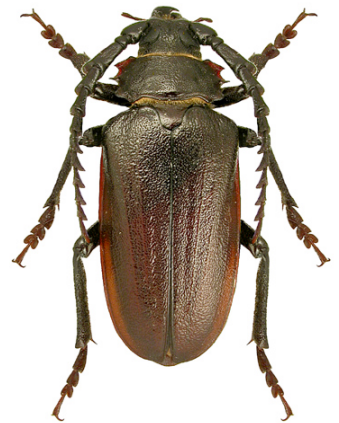


same site as the previous species. It is known to live on wet or even partially submerged trees; there are previous Devon records.

Family Cerambycidae (longhorn beetles)

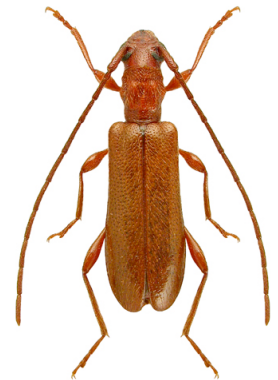
Prionus coriarius (L., 1758), the Sawyer or Tanner beetle. Notable A, Saproxylic Rarity Score 16.

At up to 40mm long, this is arguably the second largest species of beetle occurring in Britain. Its larvae develop in roots and dead stumps of a wide range of deciduous trees. It occurs widely in the southern half of the country, there is a record from the Totnes area in the 1930's. A single specimen was seen and photographed crossing the lower drive by Mike Newby in August.



Obrium brunneum (F., 1792). Immigrant, new to Devon.

Four specimens of this rather small (6mm), brown longhorn were beaten from a pine tree above the lower drive on 29th May. The species was first recorded in Britain in 1936 and has gradually spread throughout the southern coastal counties. It usually breeds in coniferous trees; Dartington is the most westerly published locality, although there is an unpublished record from Cornwall (Keith Alexander, *pers. comm.*)



Family Curculionidae (weevils and bark beetles)

Hylesinus toranio (Danthoine in Bernard, 1788) (= *oleiperda* F., 1792)). Notable in Devon. Saproxylic Rarity Score 2.

A small (2.5mm) hairy bark beetle, usually found (like the other two species of the genus, both of which have occurred at Dartington) on ash, but in this case one was beaten from the same pine tree as the previous species. It is not on the G H Ashe manuscript index of Devon beetles, and there is only one Devon record (from the north of the county) in the National Biodiversity Network database.



4. General Remarks

Despite the poor weather, this year's collecting added more species to the Dartington Hall Estate list of beetles than was the case in 2011. This resulted primarily from the sampling of different habitats than in 2010 and 2011, especially the compost-living species. Again the work confirms the value of the saproxylic (dead wood) beetles of the Estate; four of the five notable species found this year are associated with dead wood and three are listed in the Saproxylic Quality Index (SQI, Fowles *et al.*, 1999) with Rarity Scores of 16 or 2. As evidence of the diversity of the dead wood fauna, I picked up a 2m length of detached rotting tree branch, approximately 5cm diameter, near the river below the lower drive on 25th September. Removal of the loose bark along the length of this single branch yielded 10 beetle species of which seven were new to the Dartington list. So how much more remains, hopefully, to be discovered in future years!

5. Acknowledgements

I am indebted to John Channon for permission to collect on the Estate. I also owe sincere thanks again to the invaluable wardens Will Wallis and Mike Newby and especially to Mike for his photograph of the tanner beetle. Mary Bartlett kindly encouraged me to dismantle her compost heap and Carly Benefer supplied specimens from her work with Schumacher College. The colour figures are from <http://www.colpolon.biol.uni.wroc.pl>, by permission of Lech Borowiec.

6. References Cited

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- HYMAN, P.S. (revised PARSONS, M.S.), 1992, 1994. A review of the scarce and threatened Coleoptera of Great Britain. Parts 1 & 2. UK Nature Conservation: 3 & 12, Peterborough: Joint Nature Conservation Committee.
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7. List of additional beetle species found in 2012

Family	Taxon	Vernacular	Status
Carabidae	Carabus violaceus	Violet ground beetle	
	Loricera pilicornis		
	Asaphidion curtum		
	Asaphidion flavipes		
	Bembidion tetracolum		
	Poecilus cupreus		
	Abax parallelepipedus		
	Hydrophilidae	Cercyon impressus	
	Cercyon analis		
Ptiliidae	Ptenidium pusillum		
Scydmaenidae	Stenichnus collaris		
Silphidae	Silpha atrata		
	Silpha tristis		
Staphylinidae	Megarthus denticollis		
	Megarthus depressus (= sinuatocollis)		
	Bryaxis puncticollis		
	Tychus niger		
	Tachinus proximus		
	Mycetoporus angularis		
	Ischnosoma splendidum		
	Lordithon thoracicus		
	Lordithon trinotatus		
	Oxypoda brevicornis		
	Amischa forcipata		
	Dinaraea aequata		
	Dinaraea angustula		
	Philhygra melanocera		
	Anopleta corvina		

	<i>Atheta aeneicollis</i>		
	<i>Atheta crassicornis</i>		
	<i>Mycetota laticollis</i>		
	<i>Drusilla canaliculata</i>		
	<i>Cordalia obscura</i>		
	<i>Autalia rivularis</i>		
	<i>Agaricochara latissima</i>		
	<i>Leptusa ruficollis</i>		
	<i>Bolitochara lucida</i>		
	<i>Thinodromus arcuatus</i>		
	<i>Platystethus arenarius</i>		
	<i>Oxytelus sculptus</i>		
	<i>Anotylus sculpturatus</i>		
	<i>Anotylus tetracarinatus</i>		
	<i>Stenus bimaculatus</i>		
	<i>Stenus nanus</i>		
	<i>Stenus bifoveolatus</i>		
	<i>Rugilus angustatus</i>		Notable
	<i>Lithocharis nigriceps</i>		
	<i>Lathrobium brunnipes</i>		
	<i>Philonthus carbonarius</i>		
	<i>Philonthus succicola</i>		
	<i>Staphylinus dimidiaticornis</i>		
	<i>Ocypus aeneocephalus</i>		
	<i>Quedius mesomelinus</i>		
	<i>Xantholinus longiventris</i>		
Cantharidae	<i>Cantharis nigra</i>		
	<i>Cantharis thoracica</i>		
Nitidulidae	<i>Epuraea biguttata</i>		
Rhizophagidae	<i>Cyanostolus aeneus</i>		Notable A
Cryptophagidae	<i>Atomaria apicalis</i>		
	<i>Atomaria fuscata</i>		
	<i>Atomaria lewisi</i>		
	<i>Atomaria testacea</i>		
	<i>Ephistemus globulus/reitteri</i>		
Byturidae	<i>Byturus tomentosus</i>	Raspberry beetle	
Coccinellidae	<i>Subcoccinella vigintiquatuorpunctata</i>	24 spot ladybird	
Corylophidae	<i>Sericoderus lateralis</i>		
Latridiidae	<i>Corticarina minuta</i>		
Cerambycidae	<i>Prionus coriarius</i>	Sawyer or tanner beetle	Notable A
	<i>Obrium brunneum</i>		
Chrysomelidae	<i>Lochmaea crataegi</i>	Hawthorn leaf beetle	
Curculionidae	<i>Barypeithes pellucidus</i>		
	<i>Sitona lineatus</i>		
	<i>Leiosoma deflexum</i>		
	<i>Rhinoncus pericarpus</i>		
	<i>Trichosirocalus troglodytes</i>		
	<i>Hylesinus toranio</i>	Hairy Ash bark beetle	