

Family Tenebrionidae

References

The information for this key is compiled from three sources:

Buck F. (1954) Handbooks for the Identification of British Insects, Volume 5, Part 9

Brendell M. (1975) Handbooks for the Identification of British Insects, Volume 5, Part 10

Lombe A (2013) Käfer Europas: Tenebrionidae, based on earlier keys by E. Reitter and Z. Kaszab et al <http://www.coleo-net.de/coleo/texte/tenebrionidae.htm>.

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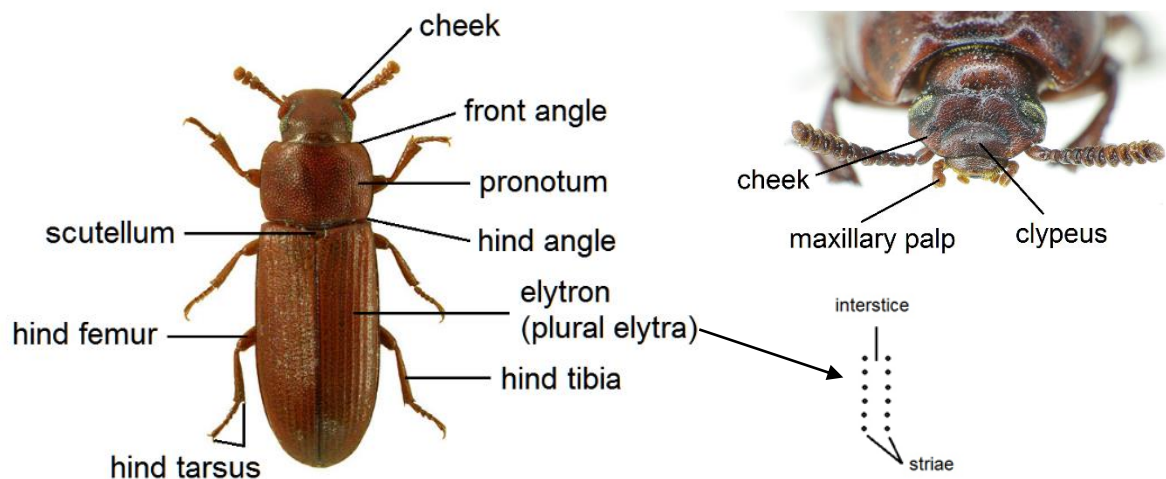


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Checklist of species

From the Checklist of Beetles of the British Isles, 2012 edition, edited by A. G. Duff (available from www.coleopterist.org.uk/checklist.htm). The 47 species are classified in four subfamilies.

Subfamily LAGRIINAE

LAGRIA Fabricius, 1775

atripes Mulsant & Guillebeau, 1855

hirta (Linnaeus, 1758)

Subfamily TENEBRIONINAE

BOLITOPHAGUS Illiger, 1798

reticulatus (Linnaeus, 1767)

ELEDONA Latreille, 1796

agricola (Herbst, 1783)

TENEBRIO Linnaeus, 1758

molitor Linnaeus, 1758

obscurus Fabricius, 1792

ALPHITOBIUS Stephens, 1829

diaperinus (Panzer, 1796)

laevigatus (Fabricius, 1781)

TRIBOLIUM MacLeay, 1825

castaneum (Herbst, 1797)

confusum Jacquelin du Val, 1863

destructor Uyttenboogaart, 1934

LATHETICUS Waterhouse, C.O., 1880

oryzae Waterhouse, C.O., 1880

PALORUS Mulsant, 1854

ratzeburgii (Wissmann, 1848)

subdepressus (Wollaston, 1864)

ULOMA Dejean, 1821

culinaris (Linnaeus, 1758)

PHYLAN Dejean, 1821

gibbus (Fabricius, 1775)

MELANIMON von Steven, 1829

tibialis (Fabricius, 1781)

OPATRUM Fabricius, 1775

sabulosum (Linnaeus, 1760)

HELOPS Fabricius, 1775

caeruleus (Linnaeus, 1758)

NALASSUS Mulsant, 1854

laevioctostriatus (Goeze, 1777)

XANTHOMUS Mulsant, 1854

pallidus (Curtis, 1830)

BLAPS Fabricius, 1775

lethifera Marsham, 1802

mortisaga (Linnaeus, 1758)

mucronata Latreille, 1804

Subfamily DIAPERINAE

CRYPTICUS Latreille, 1817

quisquilius (Linnaeus, 1760)

PHALERIA Latreille, 1802

cadaverina (Fabricius, 1792)

MYRMECHIXENUS Chevrolat, 1835

subterraneus Chevrolat, 1835

vaporariorum Guérin-Méneville, 1843

CORTICEUS Piller & Mitterpacher, 1783

bicolor (Olivier, 1790)

fraxini (Kugelann, 1794)

linearis (Fabricius, 1790)

unicolor Piller & Mitterpacher, 1783

SCAPHIDEMA Redtenbacher, 1849

metallicum (Fabricius, 1792)

ALPHITOPHAGUS Stephens, 1832

bifasciatus (Say, 1824)

GNATOCERUS Thunberg, 1814

cornutus (Fabricius, 1798)

maxillosus (Fabricius, 1801)

PENTAPHYLLUS Dejean, 1821

testaceus (Hellwig, 1792) 642

PLATYDEMA Laporte & Brullé, 1831

violaceum (Fabricius, 1790)

DIAPERIS Geoffroy, 1762

boleti (Linnaeus, 1758)

Subfamily ALLECULINAE

PRIONYCHUS Solier, 1835

ater (Fabricius, 1775)

melanarius (Germar, 1813)

GONODERA Mulsant, 1856

luperus (Herbst, 1783)

PSEUDOCISTELA Crotch, 1873

ceramboides (Linnaeus, 1758)

ISOMIRA Mulsant, 1856

murina (Linnaeus, 1758)

MYCETOCHARA Berthold, 1827

humeralis (Fabricius, 1787)

CTENIOPUS Solier, 1835

sulphureus (Linnaeus, 1758)

OMOPHLUS Dejean, 1834

pubescens (Linnaeus, 1758)



Family Tenebrionidae

Key to British species

- 1 4 segments on the tarsi of all legs. Tribe Mymecoxenini.[2](#)
- 5 segments on the front and middle tarsi and 4 on the hind tarsi.[3](#)



2 Pronotum broadest in the front quarter and then narrowing to the base in a straight line; hind angles almost right-angled. Head and pronotum densely and quite deeply punctured. Elytra very finely punctured. Brownish-black or pitch-black; elytra reddish-brown with darker areas around the shoulders. Antennae and legs yellowish-red. Antennal club short, the last four segments becoming broader. Length 1.3-1.6 mm.

..... ***Myrmexixenus subterraneus***

Associated with ants of the genus *Formica*. Rare but sometimes found in large numbers.



Pronotum rounded at the sides, broader than long, broadest at about half way; hind angles of the pronotum obtuse. Last four segments of the antennae almost the same breadth. Upper surface with scattered, fine punctures, rather dull and densely hairy. Upper surface reddish-brown, sometimes darker around the scutellum and often darker towards the tips of the elytra. Length 1.7-2.2 mm.

..... ***Myrmexixenus vaporariorum***

In greenhouses, manure and compost heaps. Often caught using insect nets attached to cars (autocatchers). Commoner than the previous species.



- 3 Antennae attached on top of or on the side of the head, so that the base of the antennae is easily visible from above. Front coxae (the base of the front legs, viewed from below) conical or elongate-oval, projecting forwards.4

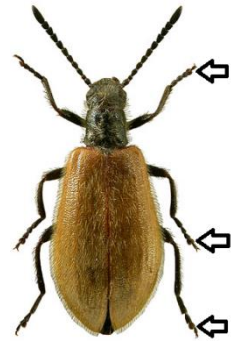
Antennae attached underneath the head because the section of the head between the eyes and mouth parts forms a shelf. Front coxae spherical. Cavities in which the coxae sit completely enclosed.13



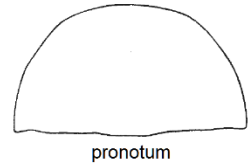
- 4 Claws with a comb of teeth (the teeth are sometimes so fine that they require 40x magnification to see). Subfamily Alleculinae. ...[5](#)



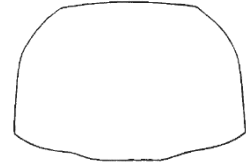
Claws untoothed. Second to last segment of the tarsi lobed with a felt of hairs underneath. Elytra without rows of punctures or striae, usually densely hairy. Subfamily Lagriinae. Genus *Lagria*.[12](#)



5 Pronotum broadest at the base, strongly narrowly towards the front margins directly from the basal angles; front angles absent.6



Pronotum, if broadest at the base, then more or less parallel for basal half; front angles present, but indistinct.9



6 Antennae toothed with segment 3 shorter than segment 4.

..... ***Pseudocistela ceramboides***

Length 9-13 mm. England northwards to Nottinghamshire. On oaks and at flowers.



Antennae untoothed with segment 3 as long as segment 4.[7](#)



7 Elytra with punctures arranged in rows. Larger species - 12-15 mm. Genus *Prionychus*.8



Elytra with randomly arranged punctures. Smaller species - 5-6 mm.
..... ***Isomira murina***
Widely distributed in Great Britain. At flowers.



- 8 A shining species with the head and pronotum with sparse punctures. Length 10-11 mm.
..... ***Prionychus melanarius***
Scattered records in England northwards to Nottinghamshire. Under bark.



- A dull species with the head and pronotum densely and coarsely punctured. Length 14-15 mm.
..... ***Prionychus ater***
England and Wales northwards to Yorkshire. In wood mould of decaying trees e.g. oak, willow, elm, ash and fruit trees.



- 9 Segment 3 of antennae as long as or longer than segment 4. Eyes small, separated by more than twice their width.[10](#)

Segment 3 of the antennae shorter than segment 4. Eyes large, separated by less than twice their width.

..... ***Gonodera luperus***

Length 7-9 mm. England and Wales northwards to North Yorkshire. At flowers.



10 Mandibles prominent and partly exposed. Eyes prominent. Elytra orange-brown or paler in colour. Length 8-10 mm.[11](#)

Mandibles not prominent, covered by clypeus. Eyes not prominent. Length 5.5-6 mm. Black species with the elytra each with a yellow spot near the base.
..... ***Mycetochara humeralis***

See clearer image at <http://www.biolib.cz/en/image/id226259/>. England and Welsh borders, northwards to Merseyside.



- 11 Head, pronotum and scutellum black. Elytra orange-brown. Legs black with the tarsi brown. Head and pronotum covered with long grey hair.
..... ***Omophilus rufitarsis***
Weymouth area (Dorset).



- Head and pronotum yellowish. Scutellum and elytra yellowish
..... ***Cteniopus sulphureus***
One variety has the head and pronotum reddish-brown. Mainly coastal. North
Wales and Humberside southwards.

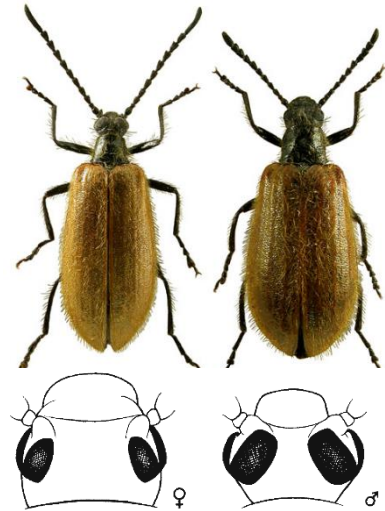


Genus *Lagria*

12 Larger species, 10- 12 mm. Eyes larger and more deeply divided. Pronotum very finely and sparsely punctured, except on the depression in the centre which is deepened towards the front. Hairs on the elytra arranged in a "herring-bone" fashion.

..... ***Lagria atripes***

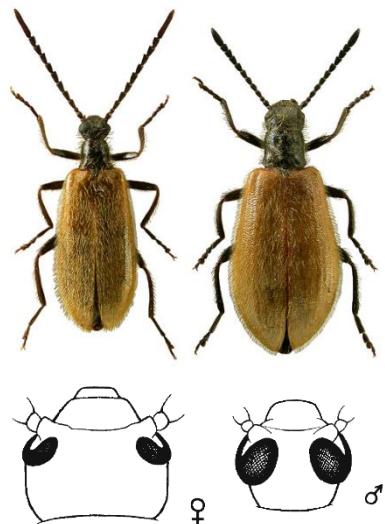
South-east Kent and the New Forest, Hampshire.



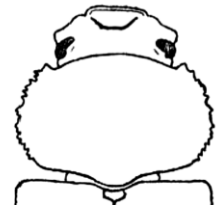
Smaller species, 7- 9 mm. Eyes smaller and less deeply incised. Pronotum rather strongly and densely punctured, except on the depression in the centre which is shallow throughout. Hairs on the elytra not in a distinctive arrangement.

..... ***Lagria hirta***

Widely distributed in England, Ireland, SW and NE Scotland.



13 Side margins of the pronotum irregularly toothed.14
Tribe Bolitophagini



Sides of the pronotum smooth.15



14 Eyes completely divided. Sides of pronotum extended at the front into rounded lobes and with pointed hind angles. Length over 5 mm.

..... ***Bolitophagus reticulatus***

In old *polyporus fomentarius* on birch. Scotland. Photo by K.V. Makarov published at www.zin.ru



Eyes not divided. Sides of pronotum evenly curved from the front angles to the base. Length 2.5-4 mm.

..... ***Eledona agricola***

In bracket fungi *Laetiporus sulphureus* and *Polyporus squamosus* on willow, oak and beech. Fairly common in England and Wales.



15 Pronotum and elytra with fine, sparse golden hair (never with short stout bristles).
Length 3 mm. or less.16

Pronotum and elytra without hair; if with short, stout bristles then the overall
length is over 3 mm.17



16 Elytra with rows of punctures. Antennae at least as long as the length of the head + pronotum. Elytra dark brown with variable lighter patches.

..... ***Alphitophagus bifasciatus***

Fairly common in England and Wales. Feeding on mould. Found indoors, often in large numbers, in granaries, warehouses and stables. Outside In compost heaps, decaying tree stumps and brackets of *Polyporus squamosus*.



Elytra with random punctures. Antennae shorter. Uniformly orange- to reddish-brown.

..... ***Pentaphyllus testaceus***

Until recently known from one London record of 1876. Discovered in Windsor Great Park in 2001 and Langley Park in 2006, reported by Hammond (2007), *The Coleopterist* 16: 47-52. *Pentaphyllus testaceus* (Hellwig) (Tenebrionidae): an established and perhaps native British species? Feeds on fungi in heartwood of recently fallen oak trees.

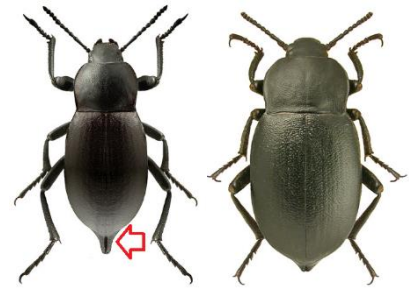


17 Length from front of head to the tip of the elytra at least 12 mm.[18](#)

Length from front of head to the tip of the elytra less than 12 mm.[23](#)



18 Tips of the elytra drawn into short to long points.
Genus *Blaps*.[19](#)



Tips of elytra rounded.[21](#)



19 Antennae shorter than the head + pronotum; segments 4-7 about as long as wide. Hind angles of pronotum rounded. Surface of the elytra finely wrinkled, particularly towards the sides; punctures distinct. Underside of male abdomen with the second visible segment with a depression near the base, about 2 mm. wide and containing a patch of dense, yellow hair. Dull black, wingless species. Length 21-24 mm.



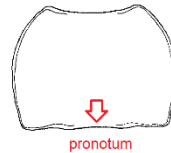
..... ***Blaps lethifera***

Old records from widespread localities in cellars, outbuildings and granaries. Few recent records.

Antennae at least as long as the head + pronotum; segments 4-7 longer than wide. Hind angles of pronotum almost right-angled. Surface of the elytra not wrinkled and with very fine punctures.[20](#)



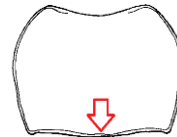
20 Line parallel to the hind margin of the pronotum interrupted in the middle. Hind tibiae smooth on the upper surface, only with evenly-spaced small punctures; each puncture has a short golden hair arising from it. Punctures on the pronotum more or less evenly spaced. Extended tip of the elytra short and blunt. Underneath the male abdomen, the first visible segment has up to twelve transverse ridges in the middle; second segment without a patch of hair. Underneath the female abdomen the first segment has only faint transverse lines. Wingless. Length 18-25 mm.



..... ***Blaps mucronata***

Formerly a fairly common, generally distributed species in or near buildings, sheds, cellars etc. Recent records seem to indicate a decline in the UK. Nocturnal and omnivorous. Known as the churchyard beetle or the cellar beetle.

Line parallel to the hind margin of the pronotum continuous. Hind tibiae rough on the upper surface with short bristles, particularly towards the tip. Punctures on the pronotum denser in the centre than elsewhere. Extended tip of the elytra better developed. Underside of male abdomen with the second visible segment with a depression near the base, about 2 mm. wide and containing a patch of dense, yellow hair.



..... ***Blaps mortisaga***

Probably associated with buildings and omnivorous, but very rarely recorded.



21 Antennae longer than the head + pronotum. Sides of the pronotum slightly S-curved. Colour metallic black-violet. Front tibiae more or less straight.

..... ***Helops caeruleus***

Length 14-19 mm. In decaying trees, particularly oaks but also elm, willow and (rarely) pines. Also occurring in prepared timber, in posts, window frames etc. Fairly frequent in central and south east England. Photograph © Oleg Berlov.



Antennae shorter than the head + pronotum. Sides of pronotum not doubly curved. Colour brown or reddish-brown. Front tibiae distinctly curved. Genus *Tenebrio*.[22](#)



Genus *Tenebrio*

22 Upper surface with numerous, small, well-separated punctures; punctures on the elytra separated by more than the width of a puncture. General appearance shining. Length 12-17.5 mm.

..... ***Tenebrio molitor***

Common throughout the British Isles. Usually associated with buildings and a minor pest. Very common in birds' nests in roofs, especially pigeons and in bat roosts. The (yellow) mealworm beetle.



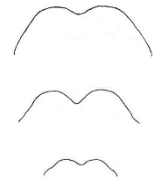
Upper surface with very dense punctures, those on the elytra so close that the surface appears finely ridged and dull.

..... ***Tenebrio obscurus***

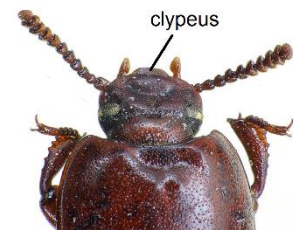
Uncommon but widely distributed near or in buildings, mainly flour mills or grain stores; also in stables. The dark mealworm beetle.



23 Front central notch of the clypeus relatively deep, narrowly rounded at the base. Upper surface of beetle with a coarse sculpture or minute ridges, granules or dense, deep punctures. Black species found in sandy habitats, mainly coastal.[24](#)



Front central notch of the clypeus (if present) broad and shallow. Upper surface of beetle smooth, without a coarse sculpture and without minute ridges. Colour various.[26](#)



24 Outer edge of the front tibiae broadly rounded at the tip and fringed with short stout bristles. Male with conspicuous tufts of long white hair on the middle and hind femora and with the first three segments of the front tarsus dilated and short-hairy underneath.

..... ***Phylan gibbus***

Sandy habitats on the coast. Local but not uncommon in suitable habitats all along the west coast of England and Wales, along the south coast of England and up the east coast as far as North Yorkshire



Outer edge of the front tibiae not broadly rounded, but ending in a large blunt tooth.[25](#)



25 Length 3-4.5 mm. General surface sculpture of large, coarse punctures. Pronotum with at least three smooth, raised areas in the centre and with the base almost straight. Last segment of the maxillary palps cylindrical.

..... ***Melanimon tibialis***

Sandy habitats; mainly coastal. Local but not uncommon in suitable areas from the Lake District coast southwards.



Length 6.75-8.75 mm. General surface sculpture of granules, most of them bearing short bristles. Pronotum without smooth patches in the central area and with the base distinctly s-curved. Last segment of the maxillary palps triangular.

..... ***Opatrum sabulosum***

Sandy habitats, mainly coastal, amongst the roots of plants and under stones. Local from Cumbria round the coast of Wales and southern England to Norfolk.

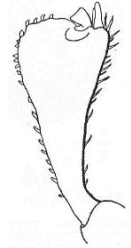


26 A coastal species. Front tibiae greatly expanded towards the tip with the width at the tip equal to half the total length of the tibia. Pale reddish brown species. Each elytron with a dark patch in the middle (sometimes very small to absent and sometimes covering most of the elytra). Pronotum widest at the base. Length 5.0-7.25 mm.



..... ***Phaleria cadaverina***

Sand dunes and sandy beaches. Under seaweed and other rotting material; also at the roots of plants. From the coast of Cumbria, round the west and south coast and up the east coast as far as the Humber. Image from the German Wikipedia site. There are better photographs e.g. at <http://www.fugleognatur.dk/gallery.asp?mode=ShowLarge&ID=31660>.



Front tibiae not so greatly expanded towards the tip, the width at most, equal to one third of the total length of the tibia.[27](#)



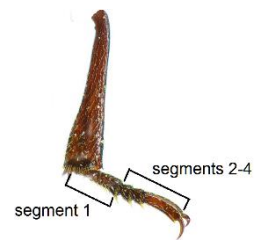
27 First segment of the hind tarsus nearly as long as segments 2-4 combined (excluding the claws). The longer apical spur of the hind tibia is as long as the widest breadth of the tibia. Pronotum at it widest point, at least as wide as the base of the elytra. Front tibia with the whole top edge fringed with short stout spines.

..... ***Crypticus quisquilius***

Sandy habitats, particularly on the coast. From west Wales, round the south coast of England and as far up the east coast as North Yorkshire; rarely inland. A black shining species with the upper surface quite densely punctured. Length 4.5-7.0 mm. Males have the last segment of the maxillary palps greatly enlarged.



First segment of the hind tarsus shorter than segments 2-4 combined (excluding claws). The longer apical spur of the hind tibia is at most only half as long as the greatest width of the tibia.28



28 Third segment of the antennae elongate and at least twice as long as the second segment; antennae longer, at least as long as head + pronotum. Pronotum broadest near the base.[29](#)
Tribe Helopini

Third segment of the antennae not elongate and less than twice as long as the second segment; antennae at most just less than head + pronotum.[30](#)

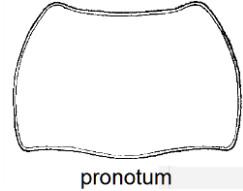


29 Colour dark rust-coloured to dark brownish-grey, usually with a bronze metallic shine. Sides of pronotum evenly rounded from the front to the rear angles. Side of head in front of the eyes evenly curved. Male with the first three segments of the front and middle tarsi expanded and felted with hair underneath. Female without remarkable tarsi. Length 6.5-11.85 mm.



..... ***Nalassus laevioctostriatus***

Under loose bark, at the bases of trees, in rotten wood, on the roots of heather on heathland; under stones on exposed cliffs and high ground. Common and generally distributed through the British Isles, becoming scarce to the north. Image © Malcolm Storey, 2010, www.bioimages.org.uk.

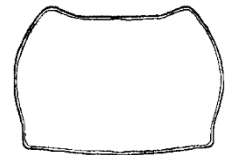


Colour dull brown, the upper surface rather translucent. Sides of pronotum narrowing in the rear third. Sides of head in front of the eyes suddenly incised at the junction between the clypeus and cheeks. Male and female tarsi without modifications. Wingless. Length 6-10 mm.



..... ***Xanthomus pallidus***

Local in sand dunes and other coastal sandy habitats, often at the roots of marram grass. Lancashire southwards, south coast of England, east coast as far as SE Yorkshire. Photograph by Roy Kleukers, published at www.nederlandsesoorten.nl.



30 Length less than twice the greatest width.[31](#)

More elongate beetles with the length more than twice the greatest width.[33](#)



31 Last segment of the maxillary palps broadly triangular.
Upper surface shining black with violet reflections.
Length 7.5-8.25 mm.

..... ***Platydema violaceum***

Very rare with records in old woodland. On the Continent associated with the Jew's Ear Fungi of genus *Auricularia*.



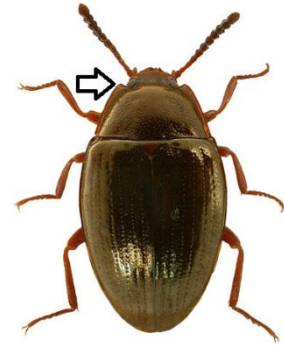
Last segment of the maxillary palps cylindrical. Colour not as above.[32](#)



32 Pronotum with the front angles acute and strongly projecting. Upper surface olive-green metallic (sometimes brown with a metallic olive-green shine). Length 3.9-5.4 mm.

..... ***Scaphidema metallicum***

Under moist bark or decaying wood, frequently on quite small branches. Often on elm. Fairly common in England and Wales.



Pronotum with the front angles evenly rounded and not projecting. Upper surface shining black. Elytra with two transverse orange bands and with orange tips. Length 7-8 mm.

..... ***Diaperis boleti***

In the bracket fungus *Piptoporus betulinus* on birch. Rare.



33 Antennae shorter than the length of the head, with the last five segments forming a clearly-defined club; last segment of the club as long as wide, distinctly squared off at the tip and narrower than the previous segment. Length 2.75-3 mm.

..... ***Latheticus oryzae***

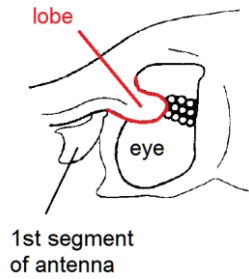
The long-headed flour beetle. Frequently imported with cereals and other foodstuffs. Cannot survive in unheated buildings. Rarely found except on imports in stores and ships. Image © J Reibnitz, reproduced with permission.



Antennae at least as long as the head (if equally the length of the head the antennae do not have a club of five segments); last segment of antennae rounded and usually broader than the previous segment.[34](#)



34 Cheeks well-developed at the sides, extending as a lobe which partially or almost completely divides the eye.[35](#)



Cheeks not expanded at the sides to form a lobe. Eyes rounded or vertically elongate, sometimes slightly curved around the base of the antennae.[41](#)



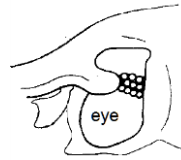
35 Pronotum broader than long (width about 1.5 times length); more than 2 mm. across. Male middle tibia with one of the spurs curved inwards and the other straight; female with both spurs straight. Genus *Alphitobius*.[36](#)



Pronotum more or less as broad as long and distinctly less than 2 mm. across.[37](#)



36 Eyes only partly divided by the lobe of the cheeks, about 3-4 facets wide at its narrowest point. Antennae with segments 5-10 broadened asymmetrically. Front tibia with the tip more distinctly broadened and rounded externally Length 5.5-6.75 mm.



..... ***Alphitobius diaperinus***

The lesser mealworm beetle. Omnivorous, associated with stored foodstuffs such as cereals, nuts, leather etc. Often in large numbers in poultry houses. Common and widely distributed.

Eyes nearly completely divided by the lobe of the cheeks, only 1-2 facets wide at the narrowest point. Antennae with segments 6-10 broadened asymmetrically. Front tibiae with the tip less distinctly broadening towards the tip and with the tip obliquely sheared off. Length 4.5-6.25 mm.



..... ***Alphitobius laevigatus***

The black fungus beetle. Habitat as above but less common and not in poultry houses. Occasionally recorded away from buildings in garden refuse near trees. Generally distributed.



37 Elytra with fine, slightly raised ridges on interstices 4-8; striae towards the suture rather ill-defined. Males without mandibles and cheeks as below. Genus *Tribolium*.[38](#)



Elytra without ridges and with the striae indicated by clear rows of punctures. Males with distinct horns on the mandibles and with outgrowths at the sides of the cheeks which may be greatly enlarged. Genus *Gnatocerus*.[40](#)



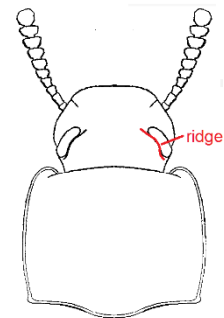
38 Antennae with a distinct club formed of the last three segments. Eyes about four facets wide at their narrowest point. Head without a ridge above the eye. Length 2.3-4.4 mm.

..... ***Tribolium castaneum***

The rust-red flour beetle. The most frequently imported beetle pest in stored products, particularly cereals. Can only overwinter in well-heated buildings.



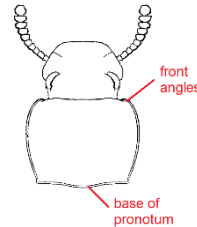
Antennae with a loose club formed from the last 5-6 segments, or only gradually broadening towards the tip. Eyes 1-2 facets wide at the narrowest point. Head with a distinct ridge running over the eye.[39](#)



39 Smaller species, length 2.6-4.4 mm. Upper surface reddish-brown. Base of pronotum very slightly wavy; front angles hardly projecting. Head and pronotum with rounded separate punctures. Male with all the striae of the elytra ceasing before the tip.

..... ***Tribolium confusum***

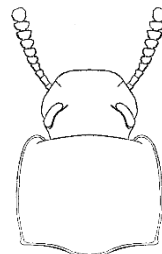
The confused flour beetle. Throughout the British Isles. A common pest in flour mills. Less often in imported foodstuffs than *castaneum*.



Longer species, 4.5-5.75 mm. Upper surface darker brownish-grey. Base of the pronotum strongly wavy; front angles project well forward. Sides of pronotum and middle of head between the eyes with large punctures which often merge together.

..... ***Tribolium destructor***

Much less common than the other species although an important pest on the Continent in domestic situations. Has been found as a pest in insect collections.



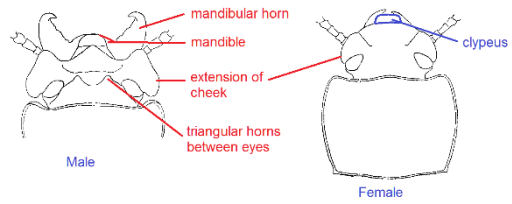
40 Head broadest between the side edges of the cheeks. Length 3.5-4.9 mm.

Males: conspicuous mandibular horns present which are flattened in section with toothed inner edges. Cheeks broadly extended and curved upwards. Greatest width of head equal to or almost equalling the front margin of the pronotum. Head between the eyes with two flattened triangular horns.

Females: cheeks quite well-developed but without mandibular horns or extensions between the eyes. Clypeus about 2.5 times as broad as long.

..... ***Gnathocerus cornutus***

The broad-horned flour beetle. Fairly common in Britain. A minor pest of cereals and animal products.



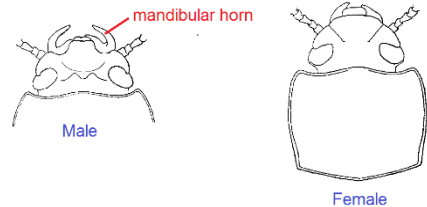
Head broadest across the eyes. Length 3-4 mm.

Male with the mandibular horns small and almost round in section, untoothed. Cheeks much less developed. Head not as wide as the front margin of the pronotum. Horns on top of the head between the eyes reduced, smaller than the upper surface of an eye.

Females without enlarged cheeks, mandibular horns or horns between the eyes. Clypeus about twice as broad as long.

..... ***Gnathocerus maxillosus***

The slender-horned flour beetle. Occasionally imported into Britain



41 A larger species, 10-11.5 mm. in length. Head comparatively narrower, a little more than half as wide as the pronotum and less than half as wide as the elytra.
..... ***Uloma culinaris***



Smaller species, 2.5-7 mm. in length. Head comparatively broader, much more than half the width of the pronotum and more than half as wide as the elytra. ...[42](#)



42 Elytra sheared off at the tip, exposing the tip of the abdomen. Eyes vertically elongate. Head distinctly narrowing from in front of the eyes to the clypeus. If the front angles of the pronotum are extended then the front border of the pronotum extends well beyond them. Upper surface sometimes two-coloured. Length 2.5-7 mm. Genus *Corticeus*.[43](#)
Under bark in natural habitats.



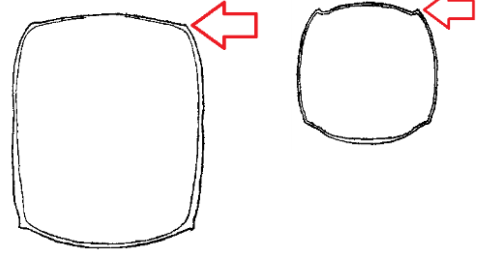
Elytra completely covering the abdomen at the tip. Eyes circular when viewed from the side. Front angles of the pronotum extended in front of the front border. Upper surface rusty brown. Length 2.4-3 mm. Genus *Palorus*.[46](#)
In domestic situations, in stored products.



Genus *Corticeus*

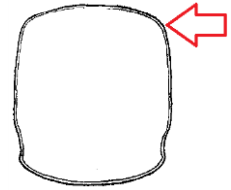
43 Front angles of the pronotum clearly indicated and projecting slightly forwards. Uniformly coloured, chestnut or rusty brown.

.....[44](#)



Front angles of the pronotum rounded, unclear and not projecting forwards. Upper surface usually two-coloured.

.....[45](#)



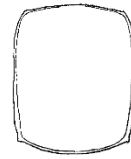
44 Top surface of the elytra with lines of punctures with a single wavy line of smaller punctures in between. More elongate species with the pronotum much longer than broad. Dark brown species. Length 4.9-7 mm.

..... ***Corticeus unicolor***

Locally common under the bark of decaying beech, oak and birch.



punctures on elytra



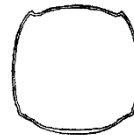
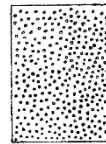
pronotum



Top surface of the elytra with the punctures randomly distributed. More compact species, the pronotum only slightly longer than broad. Orange-brown species. Length 3.0-4.25 mm.

..... ***Corticeus fraxini***

Rare in southern England and SE Wales. Under the bark of pines, usually associated with the burrows of the bark beetle *Ips sexdentatus* (rarely *Onthotomicus suturalis*)



45 Head and pronotum black or dark brown, elytra paler. Length 2.5-3 mm. Pronotum longer compared to its width.

..... ***Corticeus linearis***

Under the bark of conifers, usually in the burrows of the bark beetle *Pityogenes bidentatus* in the smaller, upper branches. England south of the Humber, and south Wales.



Head, pronotum and base of elytra reddish brown; rest of elytra shining black (sometimes the whole of the elytra are uniformly dark brown). Length 3.5-4.5 mm. Pronotum more nearly square.

..... ***Corticeus bicolor***

Under the bark of elms, usually in or near burrows of the elm bark beetle *Scolytus scolytus*. Rarely recorded from bracket fungi. Fairly common in England and Wales northwards to Cumbria.

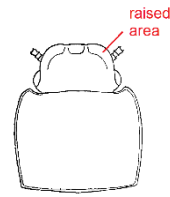


Genus *Palorus*

46 Cheeks enlarged and raised above the clypeus, extending towards the rear with parallel sides and continuous in a straight line with the ridge over the eyes. Pronotum with the sides slightly rounded or more or less parallel, usually widest near the middle. Length 2.7-3.0 mm.

..... ***Palorus subdepressus***

The depressed flour beetle. Rarely found in Britain, occasionally on imported produce. Almost worldwide.



Cheeks hardly enlarged, only slightly raised above the base of the antennae; sides converging towards the rear, meeting the ridge over the eyes at an obtuse angle above the front of the eye. Pronotum usually widest across the front quarter, sometimes almost parallel-sided. Length 2.4-3.0 mm.

..... ***Palorus ratzeburgii***

The small-eyed flour beetle. Uncommon in Britain but may occur in large infestations. In stored cereals, especially where the grain has been attacked by grain weevils (*Sitophilus* sp). Worldwide.

