

11. The Heath Plateau – area 1



1. The stony topsoil of a heathland regeneration area is a good place to look for geological specimens.

The surface of the Heath here is a level plateau area, founded on Ice Age sands with a tough capping of coarse, boulder gravel. These sediments were laid down as part of an outwash plain or 'sandur' during the Anglian glacial period.

You may find an interesting variety in the topsoil, ranging from local flints of all shapes and sizes to 'erratic' rocks from other parts of Britain, brought to the area by the ice sheets or in the bedload of pre-glacial rivers. All have been rolled and rounded by the eroding power of meltwater streams.

'It was a joy to go over the Ferry to Mousehold Heath, where delightful pebbles were to be picked up'. (Augustus Hare 'The Story of my Life'; 1900).



2. A flint from the local Cretaceous Chalk, bleached by exposure to weathering and pitted by frost action on the land surface during a glacial period.



3. A fossil *Micraster* sea urchin preserved in flint, from the local chalk.



4. A pebble of vein quartz from the Triassic Bunter Beds of the Midlands. This is an 'erratic', brought to the area by a pre-glacial river.



5. A piece of volcanic rock, probably from North Wales. This is another example of an 'erratic'.

The heathland story



6. The open expanse of Mousehold Heath, painted by John Sell Cotman, c.1810.

Two hundred years ago, Mousehold Heath was a tract of open heathland, with very few trees. Local people dug for sand and gravel, herded sheep and cattle and collected turf, firewood and furze, all of which disturbed the soil, controlled vegetation and promoted heathland wildlife. Once the Heath became a public recreation area in the 1880s, these traditional land-uses ceased, and trees began to invade.

Today, the Conservators and Wardens are working together to restore as much of the open heath as possible. This means combating the spread of trees and gorse scrub, and encouraging the re-growth of heather and other heathland plants. They are also improving geological exposures by clearing away slumped earth and vegetation cover. This work will benefit a wide variety of species. There are three restoration areas on the Heath; this is Area 1.

Heathland wildlife



7. A gravel exposure near Five-ways Corner. Such sandy, sunny banks are excellent sites for ground-nesting insect species.



8. Tree and scrub clearance and ground disturbance help heather to regenerate, and benefits insects.



9. Bracken *Pteridium aquilinum* is common on acidic, heathland soils. It creates deep leaf litter and can be very invasive, and so is controlled on Mousehold to promote regeneration of heather and other light-loving plants.

The dry, calcium-poor soils support typical heathland plants such as Heather, Sheep's Sorrel and Wavy Hair-grass. A range of lichens and mosses can also thrive on such soils.

The Heath is rich in invertebrates, including bees, wasps, grasshoppers, beetles, butterflies, moths and spiders. Many of them are heathland specialities which rely on dry, sandy habitats for nesting, basking and hunting, especially warm, south-facing banks. The Norfolk and Norwich Naturalists' Society has been recording the wildlife of Mousehold for many years, and has identified several interesting and notable species on the Heath.



10. The caterpillars of the Green Hairstreak butterfly *Callophrys rubi* feed on heathland plants including gorse and heather.



11. The distinctive blue-violet flowers of Viper's Bugloss *Echium vulgare*, a plant of dry, open soils.



12. The Mottled Grasshopper *Myrmeleotettix maculatus* is a native of heathland and sandy soils. It needs short turf and bare ground for breeding.



13. The Green Tiger Beetle *Cicindela campestris* is a fast-running predator which favours bare, dry soils.



14. Common Cudweed *Filago vulgaris* is a plant with a woolly stem, favouring sandy, disturbed soils.



15. The digger wasp *Cerceris arenaria* hunts weevils and makes underground nests in sandy soil; seen here provisioning its nest



16. Fronds of the Heath Plait-moss *Hypnum jutlandicum*. This is a heathland species which favours acidic soils.



17. The brown ant *Lasius niger* favours bare, sunny ground, but not too dry. It is widespread across the heathland areas of Mousehold.



18. The ruby-tailed wasp *Hedychridium roseum* is an ingenious kleptoparasitic species of open, sandy areas. It invades the nest of the digger wasp *Astata boops*, kills the host's egg then lays its own. When the larva hatches it eats the host's larder of food.



19. Mossy Stonecrop *Crassula tillaea* is a small, moss-like plant found on gravelly and compacted soils. It is able to withstand dry conditions by storing water in its leaves.



20. Trailing St John's-wort *Hypericum humifusum* is a small, creeping plant of acidic soils.

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