

WIDESPREAD DECLINING SPECIES IN UK



GHOST ORCHID (EPIOGIUM APHYLLUM)

Status: critically endangered

This is a particularly rare and beautiful woodland orchid that doesn't use sunlight to produce food, instead relying on a special kind of fungi.

It is found in shaded woodland confined to deep, moist leaf litter and emerges above ground only to flower and set seed. It was declared extinct in the UK in 2005, but was rediscovered at a single site in 2009. Due to its elusive behaviour this species could be in other areas of the UK but it is certainly a very rare plant.

DAVALL'S SEDGE (CAREX DAVALLIANA)

Status: extinct in the UK This sedge plant was only recorded in the UK in a calcareous mire near Bath in Somerset, but there has been no trace of the plant here since 1852. It's believed this is because the mire was drained and built upon. It is common in Europe, especially Switzerland.



DOWNY HEMP-NETTLE (GALEOPSIS SEGETUM)

Status: extinct in the UK

This annual species has previously been described as a beautiful large cornfield flower.

Commonly found in lowland areas and formerly established in some farmland near Bangor, it only appeared annually. However, the last time this species was seen was in 1975, when the field that was previously used to grow oats and potatoes was converted to permanent sheep grazing. It is now considered extinct in the UK and the population is unknown in many other European countries.





LAMB-SUCCORY (*CARNOSERIS MINIMA*)

UStatus: extinct in the UK

This is an annual species that was common to woodland rides, cornfields and fallow ground. It was most often found in lowland areas or areas with acidic and sandy soils. In 1953 it was only found in 12 locations across the UK.

It was introduced to Suffolk, but the attempt was unsuccessful and due to the increased use of herbicides and fertilisers, the species has not been recorded since 1971.

WOOD CALAMINT (*CLINOPODIUM MENTHIFOLIUM*)

Status: critically endangered (Vascular plant red data list for Great Britain)

Wood calamint is a perennial herb named after its minty scent, commonly found at the edges of woodland or scrubland overlying chalky soils.

Only a small number of patches could be found in the UK by the 1950s, but conservation work has prevented further loss. The plant remains rare in the UK and is only really found in a patch bordering some woodland on the Isle of Wight.



CRESTED COW-WHEAT (*MELAMPYRUM CRISTATUM*)

Status: vulnerable (Vascular plant red data list for Great Britain)

This brightly coloured woodland annual herb is far more than just good looks. This particular woodland flower is semi-parasitic, topping up its resources from many host plants as well as using wood ants to disperse its seeds by mimicking the ant's cocoon. It's likely to be found on woodland rides, road verges and in the bases of hedges. It was once a widespread woodland flower as coppicing of woods allowed the herb to thrive, but it has dramatically declined since the cessation of coppicing.



*RED HELLEBORINE
(CEPHALANTHERA RUBRA)*

Status: critically endangered

This is another orchid species rare in the UK with only a localised population in the south of England, although it is more common in other areas of Europe. It prefers shaded broadleaved woods and is identifiable by its slender wavy stems with long narrow grey-green leaves. Each specimen can carry 7 or more flowers that have a pink colour.

CLINPODIUM ACINOS

A usually annual herb of open habitats in dry grassland, rocky ground or arable fields. In Britain it usually grows on calcareous soils, whereas in Ireland it occurs on sandy and gravelly sites, including eskers. It is also a rare casual of waste ground, quarries and banks by roads and railways. Lowland.

Status: *C. acinos* has substantially declined as a result of more efficient methods of weed control and, in Ireland, gravel extraction. In many areas it is no longer found in arable fields, surviving only in less intensively managed habitats. It is considered to be alien in Ireland (Scannell & Synnott, 1987).



COELOGLOSSUM VIRIDE

A tuberous perennial herb restricted in S. Britain to dry, well-grazed, base-rich grassland such as chalk downland and dunes, and in chalk-pits. Elsewhere it grows in a wider range of calcareous grasslands, flushes, limestone pavement, scree, rocky ledges, roadsides and quarries. 0-915 m (Glen Doll, Angus).

Status: *C. viride* has declined considerably, particularly in C. England and East Anglia. Many losses occurred before 1930, but have continued since then, and are largely due to the ploughing and improvement of pastures. Molecular evidence suggests that this species should be included within *Dactylorhiza* (Bateman et al., 1997).





NEOTINEA USTULATA

This tuberous perennial herb grows in a wide range of habitats on base-rich rocky or gravelly substrates. It can be found in the crevices of limestone pavement, in old pastures, hill grasslands, dunes and on road verges. Occasionally, it occurs on peat overlying more acidic rocks, and in *Corylus-Fraxinus* woodland. Lowland.

Status: Although this species has been lost from many sites in Ireland, it has recently been found at several new sites and its overall distribution is stable. It was found in the Isle of Man in 1967, but has not been recorded from there since 1986.

CEPHALANTHERA DAMASONIUM

A shade-loving rhizomatous perennial herb usually found in woods with little ground cover, especially those of *Fagus*, but also extending into chalk scrub. It is restricted to well-drained soils on chalk and oolitic limestone. It is usually self-pollinated and the flowers often fail to open entirely. Lowland.

Status: Clearance of woodland, particularly since 1930, has resulted in the loss of many sites for *C. damasonium*. It is still plentiful, however, in suitable habitats, and its ability to colonise young *Fagus* plantations means that new populations are occasionally found



HYPOPITYS MONOTROPA

A saprophytic perennial herb of leaf litter in shaded woodlands, most frequent under *Fagus* and *Corylus* on calcareous substrates, and under *Pinus* on more acidic soils. It also grows in damp dune-slacks, where it is usually associated with *Salix repens*.

Status: A polyploid complex, with two subspecies in our area which are not easily separable morphologically. Although many sites were lost before 1930, the species has suffered a further marked decline in S. England since the 1962 Atlas. Though rare in Ireland, Curtis & McGough (1988) considered it to have been under-recorded in recent years.





PLATANThERA BIFOLIA

A perennial herb of heathy pastures, grassland, open scrub, woodland edges and rides, and on moorland, often amongst Pteridium; it is found on a wide variety of acidic and calcareous soils overlying sands, gravels and clays. It is tolerant of considerable soil moisture, also being found in acidic bogs and calcareous fens.

Status: This species has suffered a considerable decline, with many losses in England occurring before 1930. In the lowlands it has been lost through drainage, woodland disturbance and agricultural intensification, while upland populations have also been lost to increased grazing.

OPHRYS INSECTIFERA

A shade-tolerant tuberous herb usually found on chalk and limestone soils in open deciduous woodland and scrub, but also recorded from grassland, chalk-pits, limestone pavement, disused railways, spoil heaps and, rarely, unstable coastal cliffs. In Ireland and Anglesey it is found only in open calcareous flushes and fens.

Status: This species declined dramatically before 1930, especially in East Anglia. Since then the losses have continued, but at a reduced rate. Most losses are due to scrub encroachment, the closing of woodland canopies, woodland clearance and drainage of fens.



STELLARIA PALUSTRIS

This perennial, rhizomatous herb is a species of damp and wet places, including pastures, grassy fens and marshes, especially in areas with standing water in winter. It is also able to colonise artificial habitats such as old peat diggings.

Status: Many sites were lost in C. & E. England before 1930, and losses have continued in most parts of its British range.



MELITTIS MELISSOPHYLLUM

A strong-smelling perennial herb of woodland, wood-borders, hedge banks and scrub on base-rich soils. In the New Forest (S. Hants.), it is a plant of ancient woodland. It favours light shade and can be abundant in cleared or coppiced woodland. It is intolerant of grazing. Lowland. Status: The distribution of *M. melissophyllum* in Devon and Cornwall is apparently stable. However, it has declined markedly in the New Forest and Dorset over the past twenty years as a result of overshadowing and pony grazing, although at some sites it has reappeared after scrub clearance and coppicing.

ASTRAGALUS DANICUS

A perennial herb of short unimproved turf on well-drained calcareous soils, predominantly on chalk and limestone, but also on sand dunes and machair. In Scotland, it also grows on Old Red Sandstone sea-cliffs and on mica-schist.

Status: *A. danicus* showed only a modest loss, mainly in Gloucestershire and Yorkshire, before 1930. Since then it has declined substantially on the chalk in S. England and limestone in N.E. England, largely due to agricultural improvement or lack of grazing. It is stable elsewhere.



LYCOPODIELLA INUNDATA

A prostrate perennial herb of wet, bare, peaty or sandy margins of lakes, pools, flushes and trackways. It can rapidly colonise substrates kept open by winter inundation, cattle poaching or peat cutting.

Status: Many sites for *L. inundata* were lost before 1930, and losses have continued due to drainage, a lack of grazing and other disturbance, and conversion to scrub, especially in England. However, it is easily overlooked and new sites have been found outside England since the 1962 Atlas





GENTIANELLA CAMPESTRIS

A biennial, occasionally annual, herb of mildly acidic to neutral soils in a variety of open habitats, including pastures, hill grassland, grassy heaths, sand dunes, machair and road verges. On limestone it probably indicates surface leaching or the presence of non-calcareous superficial deposits.

Status: *G. campestris* had already suffered a marked decline before 1930 and sites are still being lost through overgrazing in the uplands and the neglect of lowland pastures. In its English stronghold, Cumbria, it has disappeared from half the 10-km squares for which there are post-1930 records.

SCLERANTHUS ANNUUS

An annual or biennial herb found in soil pockets on summer-droughted rocks, and on disturbed sandy soil on heaths, commons, waste places, arable fields and, rarely, river or maritime shingle.

Status: *S. annuus* was mapped as 'all records' in the 1962 Atlas. It has declined significantly throughout its range and analysis of the database shows that most losses have occurred since 1950. Subsp. *annuus* occurs throughout the range of the species, subsp. *polycarpus* is mapped separately.



FALLOPIA DUMETORUM

A climbing annual of hedges, thickets and wood-borders on well-drained soils. Erratic in appearance, it sometimes occurs in quantity following the felling, thinning or coppicing of hedgerows and woodland.

Status: This species has always been local in distribution. It seems to have declined since the 1962 Atlas, probably due to a lack of woodland management. In Oxfordshire, however, where it was first recorded between 1968 and 1973, it has now been found in at least 12 tetrads.