

Site Name: Carrowbehy/Caher Bog SAC

Site Code: 000597

Carrowbehy/Caher Bog is a large floodplain bog developed between low drumlin hills in the headwaters of the River Suck, close to Lough O'Flynn and 8 km northeast of Ballyhaunis, Co. Roscommon. Unusually, the bog has partly enveloped a drumlin to the north. The site is a good example of a western raised bog.

The site is a Special Area of Conservation (SAC) selected for the following habitats and/or species listed on Annex I / II of the E.U. Habitats Directive (* = priority; numbers in brackets are Natura 2000 codes):

[7110] Raised Bog (Active)*[7120] Degraded Raised Bog[7150] Rhynchosporion Vegetation

Active raised bog comprises areas of high bog that are wet and actively peatforming, where the percentage cover of bog mosses (*Sphagnum* spp.) is high, and where some or all of the following features occur: hummocks, pools, wet flats, *Sphagnum* lawns, flushes and soaks. Degraded raised bog corresponds to those areas of high bog whose hydrology has been adversely affected by peat cutting, drainage and other land use activities, but which are capable of regeneration. The Rhynchosporion habitat occurs in wet depressions, pool edges and erosion channels where the vegetation includes White Beak-sedge (*Rhynchospora alba*) and/or Brown Beak-sedge (*R. fusca*), and at least some of the following associated species, Bog Asphodel (*Narthecium ossifragum*), sundews (*Drosera* spp.), Deergrass (*Scirpus cespitosus*) and Carnation Sedge (*Carex panicea*).

The uncut high bog at this site is remarkably intact and contains a central, active area. Here, good examples of hummocks occur and there are extensive quaking areas and large inter-connecting, steep-sided pools. It is within this wet area that Rhynchosporion vegetation is best represented. The associated flora is characteristically species-poor with typical plant species including the bog mosses *S. cuspidatum* and *S. auriculatum*, Bogbean (*Menyanthes trifoliata*), Bog-sedge (*Carex limosa*), White Beak-sedge, Common Cottongrass (*Eriophorum angustifolium*) and Lesser Bladderwort (*Utricularia minor*). The relatively rare Brown Beak-sedge has been noted from wet pools within the site. The active area features two small infilling lakes with several bog mosses species, including *S. auriculatum* var. *auriculatum*, *S. recurvum* var. *mucronatum* and *S. recurvum* var. *tenue*, as well as Soft Rush (*Juncus effusus*) and Many-stalked Spike-rush (*Eleocharis multicaulis*), amongst others. The presence of *E. multicaulis*, a species typically found in pools within

blanket bog areas, emphasises the westerly nature of the site. The very scarce leafy liverwort, *Cephaloziella elachista*, was recorded here in 1985.

To the west of the main section, and separated by a small stream, a smaller circular dome exists. This area of bog appears to have been little burned and a well-developed lichen flora has developed. The hummocks contain the uncommon lichen *Cladonia rangiferina* and the bushy Heather (*Calluna vulgaris*) has many epiphytic lichens, such as *Ramalina farinacea*, *Physcia tenella* and *Parmelia perlata*. Well-developed pools also occur here.

The degraded areas of bog are largely confined to the more marginal areas of high bog where plant species such as Heather, Bog Asphodel, Hare's-tail Cottongrass (*Eriophorum vaginatum*), Deergrass, Cross-leaved Heath (*Erica tetralix*) and Carnation Sedge are typically dominant. Indicator species of western raised bog such as *Racomitrium lanuginosum, Pleurozia purpurea* and Lousewort (*Pedicularis sylvatica*) are frequent in both areas of degraded and intact bog.

To the north, an area of old cut-away adjoins a drumlin and a well-developed bog moss community which resembles the original base-rich 'lagg' zone, with a gradual transition to bog is found. The bog moss species *Sphagnum teres*, considered to be rare in lowland fens, has been recorded from here.

Marsh Fritillary (*Euphydryas aurinia*, Order Lepidoptera), a butterfly listed on Annex II of the E.U. Habitats Directive, has been recorded from the site, but in its present condition the habitat is only marginally suitable for the species and any populations present are likely to be intermittent, small and short-lived. Natural and humaninduced changes are likely to make the habitat less suitable in the future.

The site has already been damaged as a result of drying-out of the surface from past peat cutting. Further drying-out of the surface is a continued threat. Burning is also a threat.

Carrowbehy/Caher bog is an important example of a medium-sized, western raised bog site, which contains examples of the E.U. Habitats Directive Annex I habitats active raised bog, degraded raised bog and depressions on peat substrates (Rhynchosporion). It is a notably species-rich bog featuring extensive, welldeveloped hummock/pool systems, small in-filling lakes, scarce species and, in places, semi-natural margins undisturbed by recent peat cutting.