

File ref:

County: Somerset/Devon **Site Name:** Southey and Gotleigh Moors

District: Taunton Deane, East Devon, Mid Devon

Status: Site of Special Scientific Interest (SSSI) notified under Section 28 of the Wildlife and Countryside Act, 1981, as amended

Local Planning Authority: Taunton Dean, Mid Devon, East Devon District Councils, Somerset County Council, Devon County Council

National Grid Reference: ST 192110 **Area:** 81.3 (ha) 200.8 (ac)

Ordnance Survey Sheet 1:50,000: 193 **1:10,000:** ST 11 SE

Date Notified (Under 1949 Act): – **Date of Last Revision:** –

Date Notified (Under 1981 Act): 1988 **Date of Last Revision:** –

Other Information:

A new site.

Description and Reasons for Notification:

Southey and Gotleigh Moors is one of the richest mosaics of valley mire, acid-marsh grassland and alder-birch carr to be found on the Blackdown Hills. The site contains a large and diverse, moderately acid flush and bog complex.

The Bolham River has cut through the Cretaceous Greensand on the Blackdown Hills creating a valley with shallowly sloping sides occupied by the two Moors. The Greensand gives rise to permeable coarse and loamy soils of the Hense series. Frequent springs emerge from the valley sides locally raising the water table and producing shallow peaty surface horizons. In profile the valley sides appear terraced with a pronounced upper plateau, a sharp drop over Greensand to the mire system and a further gentle slope down to the valley basin. On Southey Moor this transition is marked by abrupt vegetation changes.

The centre of the valley mire system lies on the spring line where bog pool communities have developed over exposed waterlogged peat with bog pond weed *Potamogeton polygonifolius*, common cottongrass *Eriophorum angustifolium* and marsh St John's-wort *Hypericum elodes*. As water moves away from the springs it spreads into channels which intersect low hummocks of *Sphagnum papillosum*. Dividing hollows contain *Drepanocladus revolvens*, a moss very rare in Somerset. A very large population of white beak-sedge *Rhynchospora alba* is dominated over much of this relatively base-poor 'plateau' bog. Further down the slope hummocks are dominated by *Sphagnum subnitens* enjoying increasingly base-rich conditions. Round-leaved sundew *Drosera rotundifolia*, oblong-leaved sundew *D. intermedia* and pale butterwort *Pinguicula lusitanica* occur in the hollows here, with bog asphodel *Narthecium ossifragum*. The tops of the hummocks host a wet heath community of cross-leaved heath *Erica tetralix*, heath milkwort *Polygala serpyllifolia* and heath spotted-orchid *Dactylorhiza maculata*.

Transitions to several related plant communities can be seen within the site. With increasing distance from springs and seepages the water table falls allowing colonisation by heather *Calluna vulgaris*, bell heather *Erica cinerea* and European gorse *Ulex europaeus*. A small population of fir club moss *Hypersia selago* occurs in the dry heath community on Gotleigh Moor. Acid marshy grassland tends to arise over flushed and lightly grazed areas. Sharp-flowered rush *Juncus acutiflorus* is often dominant in a sward containing red fescue *Festuca rubra*, sweet vernal-grass *Anthoxanthum odoratum* and heath wood-rush *Luzula multiflora*. Where channels

form within the marsh grassland, marsh marigold *Caltha palustris*, marsh violet *Viola palustris* and ragged robin *Lychnis flos-cuculi* can be found.

Heavily waterlogged mineral soils in the valley basin and seepages on the valley sides are colonised by alder *Alnus glutinosa* with a ground flora dominated by greater tussock sedge *Carex paniculata* or remote sedge *Carex remota*. Bryophyte cover is extensive with mats of *Rhizomnium punctatum* and *Brachythecium rutabulum*. At the extreme west of the site acid-marshy grassland grades into a grassland community dominated by crested dog's-tail *Cynosurus cristatus*, common bent *Agrostis capillaris* and heath grass *Danthonia decumbens* containing abundant common knapweed *Centaurea nigra*.

The diversity of the site is enhanced by the presence of the Bolham River and small areas of standing water which increase the amphibian and invertebrate interest. The nationally scarce leaf beetle *Phyllobrotica quadrimaculata* has recently been found here.