

SOMERSET RARE PLANTS GROUP

Recording all plants growing wild in Somerset, not just the rarities



Meeting Report



Exploring the Wind Pump Field. Photo: Val Graham

Sunday 1st August 2021 Westhay Moor NNR (VC6)

Leader: Val Graham

Report: Val Graham and Helena Crouch

1st August turned out to be a cool day of heavy showers and we all experienced flooded roads and poor visibility as we drove to the site. However, the weather lightened considerably by the time eleven of us set off from the car park.

Westhay Moor National Nature Reserve, south-east of Wedmore, is owned and managed by the Somerset Wildlife Trust. It is mainly an area of former peat diggings now replaced by lakes and reed-beds. The peat in this area, so valuable to the horticultural trade, is sphagnum peat laid down in a huge raised bog which, in early medieval times, filled the low-lying land between Wedmore and the Polden ridge.

The few preserved patches of sphagnum peat are low in nutrients and acidic, which gives rise to the characteristic vegetation. The largest such remnant is the 12 ha area of Westhay Moor known as the Mire which was our principal target for this visit.

We walked up Dagg's Lane Drove and turned west past the Viridor hide. We made our first stop at the edge of the reed-bed on the north side of the track where the yellow flowers of Greater Bladderwort (*Utricularia vulgaris* sens. str.) could be seen. This was our first insectivorous plant of the day. Also found here was the red-listed plant Frogbit (*Hydrocharis morsus-ranae*) which had a few of its white three-petaled flowers showing. We also found the very common ditch plant Rigid Hornwort (*Ceratophyllum demersum*) and the non-native – but widespread – Nuttall's Pondweed (*Elodea nuttallii*). On the bank we found several typical wetland plants including Gypsywort (*Lycopus europaeus*) and Hemp-nettle (*Galeopsis* sp.), of which more later.

We walked north from here to see the “totem pole”: a 4m pole with a carved pelican on top and a beaver at the bottom which represents the height of the raised bog surface in 700 AD and the typical residents at that time. 1300 years of climate change, and particularly drainage and peat extraction have made enormous changes to the landscape here.

Turning south again we noted the sharp contrast between the birch-alder carr and a long ditch at the edge of the mire. The abruptness of the vegetation change is somewhat artificial as this ditch and the Mire are protected by a buried barrier of plastic sheeting to prevent loss of water and ingress of nutrients.

The most eye-catching plant here was the North American pitcher plant Trumpets (*Sarracenia flava*) [insect-eater number 2]. This species has been known at this location for a number of years but does not seem to be spreading.

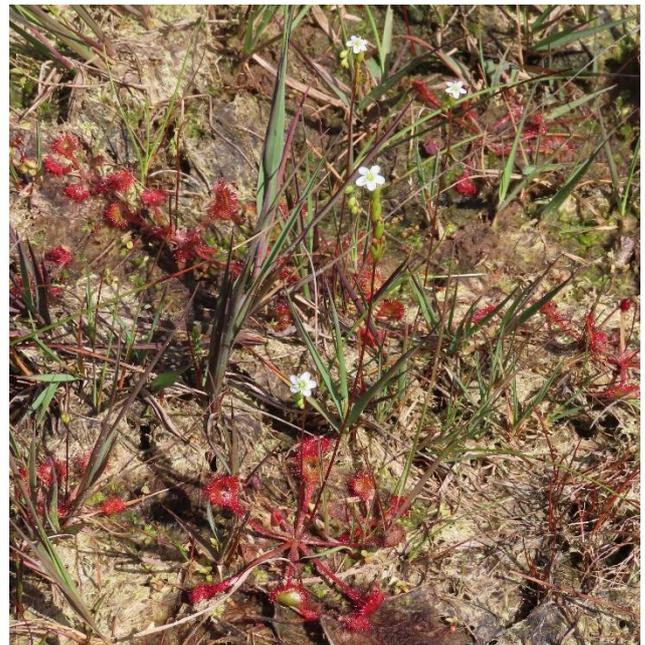


A North American native at Westhay Moor. Photo: Helena Crouch

From there we went through a kissing gate to the main Mire compartment where the vegetation is dominated by Purple Moor-grass (*Molinia caerulea*) with scattered Cross-leaved Heath (*Erica tetralix*) and Heather (*Calluna vulgaris*), Soft-rush (*Juncus effusus*),

Downy Birch (*Betula pubescens*) and Alder-buckthorn (*Frangula alnus*).

As we had had plenty of rain, surface water was visible in the lowest lying area known as the scrapes, where we saw Common and Hare’s-tail Cottongrass (*Eriophorum angustifolium* and *E. vaginatum*), Bog Pondweed (*Potamogeton polygonifolius*), Round-leaved Sundew (*Drosera rotundifolia*) [insect-eater number 3], Marsh Pennywort (*Hydrocotyle vulgaris*) and Feathery Bog-moss (*Sphagnum cuspidatum*).



Round-leaved Sundew in flower on the Mire growing on dried-out *Sphagnum* (taken during the heatwave a few weeks earlier) Photo: Alison Uren



Marsh Pennywort with Cottongrass growing through a carpet of *Sphagnum* – now re-hydrated and colourful. Photo: Val Graham

Ferns are also prominent on the mire, in particular Narrow-leaved Buckler-fern (*Dryopteris carthusiana*) with its narrow pale green fronds and pale straw-coloured scales on the rachis, and the magnificent Royal Fern (*Osmunda regalis*).

After sheltering from a heavy shower under an oak tree at the southern end of the mire, while we had lunch, we walked across the field to the south where the wind-pump brings water (and, unfortunately, nutrients) onto the Mire. We met the on-site team of environmental managers – Exmoor ponies.



Exmoor ponies Photo: Val Graham

A ditch near the wind-pump yielded Lesser Water-parsnip (*Berula erecta*). One member saw a Sundew in this field, but we had hoped to find more, especially as the surface was wet in places with several sedges present. Next, we walked through a strip of woodland with a ferny understory of Royal Fern, Broad Buckler-fern (*Dryopteris dilatata*), Lady-fern (*Athyrium filix-femina*), and Bracken (*Pteridium aquilinum*). Great Wood-rush (*Luzula sylvatica*) was re-found beside the path. There is a lot of surface water in this woodland now thanks to work by SWT last winter to install another waterproof barrier along the southern edge of the wood, which it is hoped will reduce water loss from the Mire as a whole.



Bog Myrtle (left) with Royal Fern (showing brown fertile fronds) and Downy Birch Photo: Val Graham

Returning along the west side of the Mire, which is dominated by Bracken we detoured to admire the richly

aromatic stand of Bog Myrtle (*Myrica gale*) and more examples of Royal Fern.

We carried out a search for Marsh Fern (*Thelypteris palustris*), where it had been previously reported, but failed to find any. We had some cause to doubt the earlier record as it generally seems to prefer higher nutrient (fen) conditions (Lockton, 2021). Some of us went to look at it later along the Sweet Track at Shapwick Heath where the vegetation is quite different.



Bifid Hemp-nettle showing the notched lower lip. Photo: Karen Andrews. Inset shows downcurved edges of lip under a microscope. Photo: Val Graham

During the day, we found both Common Hemp-nettle and Bifid Hemp-nettle (*Galeopsis tetrahit* and *G. bifida*). We discussed the distinguishing features of these very similar species. The key is the lower lip of the flower, which is notched in the latter but straight in the former. The lower lip also tends to be flat in Common Hemp-nettle, but with downcurved sides in Bifid Hemp-nettle.

References

Lockton, A.J. (accessed 2021). Species account: *Thelypteris palustris*. Botanical Society of the British Isles, bsbi.org.