

Dumfriesshire Botany at Wanlockhead Saturday 10th August 2024

On a dry fine day eight of us met on the northern edge of Wanlockhead. We aimed to record in two squares along the Southern Upland Way down the valley of the Wanlock Water which runs north to meet the Spango Water and forming the Crawick Water at their confluence. These squares NS8514 and NS8415 had only 2 records and 0 records respectively in the database.

The area, including the adjacent Leadhills, is of course famous for the extent of old mine workings. It may have been mined in the Roman era for lead and in the 1500s much gold was collected which features in Scottish Crown jewels. Lead was mined here commercially until the 1950s. This means a greater extent of bare gravel and rocky ground than almost anywhere else in the county. Some of this has high levels of lead and other minerals making it challenging for plants to establish and survive.

This old industrial landscape is set amongst the heather dominated Lowther Hills. NS8514 has old workings of this type whereas NS8415 is largely just sheep grazed heath and grassland.



Bare gravels and stone around old mine workings below Glendorch Rig in NS8514. Bob Meritt

The long presence of sheep has also suppressed the vegetation and any tree or shrub growth requires protective walls or fences. Consequently the landscape is very open and plant life has to contend with these pressures. This is not a new landscape though as Thomas Pennant in his *A Tour of Scotland...* remarked in a visit in 1772 “ Nothing can equal the barren and gloomy appearance of the country round... neither tree nor shrub, nor verdure, nor picturesque rock, appear to amuse the eye...”

I was recently asked whether the soils meant that any plants particularly adapted to the conditions were found here. I had to answer that there were in fact very few if any plants that were unique to or more abundant in this district. There are perhaps a couple of exceptions. The sites of the old mine buildings are known to support **Wall Whitlowgrass** *Drabella muralis*, the pastures around the village are one of the few places to see the yellow form of **Mountain Pansy** *Viola lutea* (across all other hills the flowers are usually purple) and the open gravelly areas support a good population of Moonwort *Botrychium lunaria*.

We missed the first two but Bob found a nice little colony of **Moonwort** on a gravelly bank adjacent to the burn.



Moonwort on sparsely vegetated banking beside Wanlock Water. Bob Meritt

Much of the rest of the vegetation was what might be expected in the surrounding Lowther Hills. Largely acid grassland and heath species with a few areas of flushed ground supporting populations of **Grass of Parnassus** *Parnassia palustris*, **Common Butterwort** *Pinguicula vulgaris* and **Marsh Lousewort** *Pedicularis palustris*. We saw in one fenced plot that **Reed Canary Grass** *Phalaris arundinacia* had been planted as part of a study into remediating contaminated land. It was not looking at all happy. Under heather on a flat area beside the Wanlock Water we searched for **Lesser Twayblade** *Neottia cordata*

finding just one partly eaten specimen! The open gravels did suit a sizable population of the bee **Heather (Girdled) Colletes** *Colletes succinctus*. This was identified by Malcolm. It was flying into chambers in the ground and appearing to be a colony though we were advised they are solitary operating in close proximity.

After lunch we moved on down the valley into the second square around Duntercleuch. There was no mining this far down the valley so we were looking at the diversity in the natural flora for this part of the Lowther Hills. The upper slopes are fairly uniform and species poor with acid grassland predominantly of **Wavy Hair-grass** *Avenella flexuosa*, **Sheep's Fescue** *Festuca ovina*, and **Mat-grass** *Nardus stricta*. There are also stands of **Heather** with *Calluna vulgaris* and large stands of **Bracken** *Pteridium aquilinum*. On the lower slopes, hill cleuchs and along the Wanlock Water seepage and flushing gave moderate enrichment.



Grass of Parnassus beside Wanlock Water

Here the grassland is more mixed with **Sneezewort** *Achillea ptarmica*, **Common Spotted-orchid** *Dactylorhiza fuchsia*, **Heath Spotted-orchid** *Dactylorhiza maculata*, **Marsh Hawk's-beard** *Crepis paludosa*, **Ragged Robin** *Silene flos-cuculi* and **Wild Angelica** *Angelica sylvestris*. In flushed areas like where the Breckeny Cleuch meets the Mennock water the wetter conditions supported not only those plants mentioned at the start but in addition **Marsh Marigold** *Caltha palustris*, **Marsh Cinquefoil** *Comarum palustre*, **Common Spike-rush** *Eleocharis palustris*, **Marsh Horsetail** *Equisetum palustre*, **Square-stalked St John's-wort** *Hypericum tetrapterum* and **Ivy-leaved Crowfoot** *Ranunculus hederaceus*.

On the way back along the track an eyebright with intermediate characters looked like the

hybrid between **Arctic Eyebright** *Euphrasia arctica* and **Common Eyebright** *Euphrasia nemorosa*. In the first square we had 115 taxa and in the second square 98 taxa.

Chris Miles BSBI county recorder for Dumfriesshire VC72 – see bsbi.org/dumfriesshire

