

In search of mountain flowers

ALEX TEWNION

The particular feature that attracted me to the mountains of South Norway was the mountain flora. I knew that the mountain plants of Britain and Scandinavia share many affinities, that the richness and variety found on the Scandinavian mountains contrast very favourably with our own undoubtedly impoverished mountain flora, and that flowers that are scarce or rare here are common there. However, since seeing for oneself usually brings a personal satisfaction transcending mere second-hand knowledge, high summer one year found my family up on the Sognefjell at 1,200 metres, driving through cuttings in deep snow drifts and looking for a suitable spot to park so that Doreen and our children, Lesley and Hamish, could get out and enjoy the sun while I examined the flowers. The mountain scenery also demanded attention. A few kilometres to the south rose the spiry peaks of the Hurrungadn mountains, and equally eye-catching was the greeny-blue sheen of glaciers that hugged the steep slopes and corries of these westerly lying flankers of the Jotunheimen. Once halted, a few steps took us up a bank on to the gently undulating fjell, here partly covered with a shrubby heath composed largely of crowberry, blaeberry, cowberry and other dwarf shrubs. Beside a lichen-encrusted boulder grew a patch of purple-flowered heather. It looked vaguely unfamiliar and I peered more closely at it. The bells were large, deep purple in colour, and unmistakable – it was *Phyllodoce coerulea*, the blue mountain heath.

Avoiding the numerous patches of melting snow I walked about for a few minutes and examined various plants to get my eye in. Wherever I glanced, it seemed, the *Phyllodoce* was growing beside the low rocks which dotted the fjell. The sight gave cause for some satisfaction. Within a few minutes of arriving in the mountains, quite by chance I had stumbled on a profusion of flowers of one of the species I had come hoping to photograph – one rare at home, common here. Although the blue mountain heath is a sub-arctic plant with an almost circumboreal distribution, in Britain it grows only in a few spots in Badenoch and Atholl and is one of our rarest mountain plants. Until a few years ago its only known site in Scotland was on the Sow of Atholl. The flowers are purple at first but turn blue later, hence *coerulea*. In Scotland, as in Norway, the species grows in sites with late

snow cover in spring and there are other understandable similarities of habitat, though the Scottish sites lie at much steeper angles than those I saw on Sognefjell and elsewhere in Norway.

Another very attractive snowbed heath species that I photographed on Sognefjell was *Harrimanella hypnoides*, probably better known to most mountain plant lovers as *Cassiope hypnoides*, the mossy mountain-heather. It is not found in Britain. As this small shrub attains only about 5 centimetres in height, and the specimens I found were growing in the middle of carpets of the least willow, *Salix herbacea* – so common also on Scottish hills – it was difficult to see its slender moss-like branches among the relatively broad spreading leaves of the willow. The heather's short erect stems with their terminal drooping white bells seemed to spring straight from the willow leaves. Nearby on more open ground among lichens and trifid rush grew tufts of *Lychnis alpina*, the red alpine catchfly. This attractively-flowered plant with its rather grass-like leaves is another very rare mountain species in Britain, in Scotland occurring only on serpentine outcrops near the summit of one of the Clova hills. While I knelt in the meltwater to photograph it I became aware that the light had dulled. Clouds were rolling across the mountains and spilling down the glaciers towards the fjell. But I had time to feel only a momentary regret. As I gazed across the fjell a sparrow-sized black and white bird alighted on a boulder only 50 metres away and emitted a burst of loud, sweet, whistling notes. A cock snow-bunting! I now realised I had been so engrossed in examining the flowers that I had successfully been ignoring snow-bunting song in the background for some considerable time – an admission that will surprise those of my ornithological friends who know of my 20-years study of this bird in the Cairngorms. Later as we motored slowly along the Sognefjell road I counted five cocks with food in bills in a one-kilometre stretch. The terrain was not unlike the high stony plateau of the Cairngorms but the mosaic carpeting of dwarf heath with its admixture of herbaceous species here provided a richer vegetation which undoubtedly nourished large numbers of insects and other invertebrates on which the snow-buntings could feed. In this part of Norway, however, as in Scotland, the snow-bunting occupies marginal habitat at the southern limit of its breeding distribution and I may have been lucky to see such a number in a small area at an altitude equal to that of the summit of Ben Macdhui but only a few degrees of latitude farther north. Perhaps numbers are increasing here at present, just as they have been in the Cairngorms since about 1970. From a knoll at the roadside I watched two cocks

flying purposefully across the fjell and alighting on heaps of jumbled scree, where they vanished into holes to feed their young. Even at 100 metres the loud chirping of the feeding nestlings was plainly audible. This decided me. Next day if the weather cleared I would return and inspect the nests, search for others, and perhaps obtain a few pictures. Meantime rain had begun falling and the green glacial rivers and lakes with their snow-and-ice-floes dimmed and disappeared as the rain increased to a downpour. We motored 30 kilometres north to Rysheim and camped in dismal weather. With only one naturalist in a family of four the odds were against my returning to the Sognefjell to study snow-buntings unless a sunny spell intervened, while the nearby Galdhøpiggen, highest peak of the Jotunheimen and an alternative focal point of our interests, held no attraction for Lesley, Hamish or myself in the miserable conditions prevailing.

Having only a limited time in Norway, after three days hanging about we changed plans, moved east and leaving our car at Hövringen on the outskirts of Rondane National Park, set off on a walking tour in the Rondane mountains. The weather seemed to be improving. Dark clouds still hung over the Jotunheimen but the sun shone warmly at Hövringen and the peaks of Rondane beckoned ahead. A gravelled road ran 5 kilometres eastwards to a small lake, stocked with trout for anglers. We followed the road across a moor covered with dense thickets of dwarf birch and dwarf juniper, the birch growing much more luxuriantly than in Scotland and reaching about 40 centimetres in height. Redstarts flitted about in the juniper thickets and wheatears chacked on the open moor. Beyond the lake a footpath led us past a large pool in the middle of a marsh where a greenshank called anxiously, probably with chicks, while another anxious parent, a peregrine falcon, betrayed its nest site by flying backwards and forwards and making a tremendous fuss at a crag above. The lower hill slopes here were so thickly covered with a dominant yellow lichen, *Cladonia alpestris*, that hundreds of acres literally bore a yellow carpet. Our feet sank 5 or 6 centimetres in it at every step. This yellow quickly changed to grey when a chill east wind sprang up and brought a return of the rain. Passing Per Gyntyttå – named after Peer Gynt, the Rondane being Peer Gynt's country where seemingly he associated with mountain trolls – we trudged on in increasingly heavy, ice-cold rain and were soon soaked, Lesley being particularly miserable as she was suffering from mosquito bites and now felt quite ill and light-headed. Nothing else but to push on, though, and at length we saw ahead the long narrow lake, Rondvatnet, with at its mouth the

mountain chalet of Rondvassbu where we intended staying the night. Following a slippery descent on a steep muddy path we soon got cleaned up by having to wade through floodwaters to reach the bridge over the river, the chalet being on the far side. The main building was very large (for a mountain hut), comfortable and warm, fortunately for us, for last call for dinner was just sounding. After booking in we had dinner straight away, still in our wet clothes.

After dinner we experienced the greatest disappointment of our Norwegian trip – nothing to do with the Norwegians, I hasten to add: throughout our 25-day stay all we met were consistently friendly, considerate and helpful. No; it was when Doreen and I came to unpack our new packframe Karrimor sacs to change into dry clothing and found our dry changes wetter than those we were wearing! The new nylon sacs had leaked badly at the seams and every item in them bar my camera equipment – which I had wrapped separately in polythene bags – had got soaked. How we regretted dispensing with our old frame rucksacks. Uncomfortable they no doubt were compared with the packframes, but at least they were waterproof. But Rondvassbu possessed a most efficient drying room and in another hour or so we were again dry and warmly clad. Discussing the matter afterwards with some Norwegians, we learned they had encountered the same problem with modern nylon sacs and either lined each pocket with a large polythene bag or had a waterproof outer cover for the whole sac. These remarks on rucksacks are included in the hope that some reader may benefit from our experience and thoroughly test a newly purchased nylon sac before using it in remote regions. We were lucky because our goal that night had been a serviced mountain hut; had we been camping we could easily have landed in difficulty.

About the mountain chalet at Rondvassbu. Before leaving Scotland we had become members of Den Norske Turistforening (the Norwegian Mountain Travel Association, DNT for short), which owns networks of mountain huts throughout the ranges of South Norway. These huts are so conveniently situated at anything from a few hours' to a day's walk from each other that walking tours to suit most hikers are easily planned. Nobody seeking overnight accommodation is turned away, since even when a hut is already fully occupied, mattress, blankets and a space on the living room floor can usually be provided. At one hut we stayed in later, Gjendebu in south Jotunheimen, hikers even slept in the hallway and on staircase landings one exceptionally busy night. Rondvassbu however was quite large, with accommodation for about 150 people. Our intention was to stay

in it for a couple of nights and climb Rondslottet, Rondane's highest peak at 2,183 metres. But, as frequently happens, our plans went agley. I still like climbing a mountain occasionally, but only if I can enjoy a view from it and take photographs unimpeded by mist or rain. On this occasion the rain was past a joke, even to the Norwegians who seemed to go everywhere in the mountains perpetually clad in water-proofs. Some of them even wore rubber boots in preference to climbing boots. But even rubber boots were now useless for a crossing of the bridge at the mouth of Rondvatnet – the lake had risen about two metres and the footbridge was a tiny isolated object in the middle of a roaring flood. Its footboards were awash but miraculously it was not swept away. Next evening when five hikers arrived on the far side and a boat had to be sent out to ferry them across, it transpired they had not intended visiting Rondvassbu at all but another hut farther east which they had been unable to reach because of another unfordable river about one kilometre from it. Altogether they had walked 50 kilometres that day, practically non-stop.

When the rain eventually eased, Doreen and I walked up to the foot of the Rondslottet ridge, passing on the way late-flowering patches of mountain *Loiseleuria* bedecked with tiny china-pink bells. Other plants in flower included blue mountain-heath, cowberry, alpine catchfly, red campion, starry saxifrage and *Polygonum viviparum*, while the few birds populating the slopes were meadow pipits and wheatears. At Rondvassbu a recently fledged family of pied wagtails flitted about the buildings looking for scraps and three house martins hawked for insects over the lake. That evening the rain ceased and by next morning the level of the lake had dropped more than a metre. With streams once more fordable, numerous parties of walkers packed up and left. We too moved out and hiked eastwards through Illmandalen to another DNT chalet at Bjornholia, a short walk of 12 kilometres but thoroughly enjoyable as Illmandalen resembles a glorified Lairig Ghru. Steep snow-patched slopes rose on either hand, on our left reaching to around 2,000 metres in altitude and only a little less on the right. Clumps of a bushy willow, *Salix glauca*, grew by the path lower down and on damper ground by the stream; but up towards the summit of the pass at over 1,200 metres we again entered the more barren country of snow-buntings. Snow-birds were surprisingly common, with newly fledged young being fed by their parents every 100 metres or so alongside the path. With about a dozen families on this stretch, snow-buntings here were commoner than wheatears and meadow pipits. In the Rondane 10 years ago, snow-buntings were as scarce

as in the Cairngorms then, so that here too a noticeable, perhaps even remarkable, increase has occurred. Almost as interesting in another way was the presence of a woodland plant, *Trientalis europaea* (chickweed wintergreen), which was flowering here in snow-bunting habitat along with the heathy shrubs, alpine catchfly, etc., that I have already described for the Sognefjell.

Along the highest part of Illmandalen was a chain of shapely small lakes with common sandpipers calling and curtseying on their banks. Over the watershed, bramblings flitted among the thickets of *Salix glauca* and purple splashes of crowberry juice and seeds on flat-topped rocks suggested some kind of thrush – probably fieldfares, which we saw on reaching the widespread birch woods above Bjornholia and again next day on the open hillside above the tree line. Bjornholia occupied an ideal site on the eastern border of Rondane, in a hollow near a small lake and surrounded by birch-clad foothills. We spent two nights there, then hiked southwest up the valley of Musvoldalen and across an extensive grassy heath, apparently ideal for dotterel – though we saw only one cock with a very young chick, in addition to several golden plovers – to the mountain hamlet of Mysusetter where we stayed overnight in a comfortable, scrupulously clean *pensjonat* (boarding house).

The rest of our Norwegian visit continued in similar vein. We camped a few days at Dovre and while the others rested and sunbathed at the camp-site I motored on two successive days to Dovrefjell to photograph arctic-alpine plants. The more interesting species included *Saussurea alpina* and *Bartsia alpina*, the latter rare in Britain, and *Astragalus norvegicus* and *A. frigidus*, two milkvetches which do not grow in Britain. Another was an orange-petalled variety of yellow mountain saxifrage, *Saxifraga aizoides*. I have not seen this variety in Scotland – where the normal yellow-flowered type is common in wet stony places in the mountains – but since both varieties were growing side by side on Dovrefjell the genetic difference presumably is small and the mutant may yet appear in Scotland (I have seen similar plants in Switzerland).

Towards the close of our Norwegian tour Doreen, Hamish and I passed a couple of days walking in south Jotunheimen in the neighbourhood of Lake Bygdin, where we stayed a night at Eidsbugaren and another in the DNT hut, Gjendebu, at the head of Lake Gjende. Conditions for mountain photography were again disappointing. Clouds and drizzle prevailed and shrouded the peaks and glaciers on either side of Svartdalen when we crossed the pass to Gjendebu,



Hahnenmoos, Wildstrubel beyond

[photo by Alex. Tewnton



Rondvassbu, a DNT hut in Rondane

[photo by Alex. Tewnton

tantalisingly lifting and falling, lifting and falling again so that we caught only fleeting glimpses of jagged ridges above and a glacier snout 200 metres distant across the valley. But again the mountain plants made my day. Among others I photographed – despite the drizzle – a mountain variety of the Scottish bluebell with only one terminal flower per stem; and a most striking lousewort, named *Pedicularis sceptrum-carolinum* in honour of the Swedish King Charles XII. Other species new to me were the dwarf fleabane, *Erigeron uniflorus*, whose single-headed stems with yellow disk-flowers and purple rays decorated grassy patches among stones; and the glacier buttercup, *Ranunculus glacialis*, which grew in the most barren spots affected by solifluction. At first I thought there were two varieties of this species – one white-flowered, the other purple – until I found a plant with both colours of flowers growing on it. This apparently is quite normal; I read later that the petals, at first white, change through pink to purple. On a dry stony bank at Gjendebu I photographed alpine cat's foot, *Antennaria alpina*, a plant similar to our own common cat's foot or mountain everlasting. Cottongrass can make quite an attractive picture given suitable conditions and next day during a sunny spell on the return to Lake Bygdin via Vesladalen I could not resist photographing an especially fine cluster of the arctic cottongrass, *Eriophorum scheuchzeri*. Equally irresistible proved a clump of roseroot, so familiar at home on cliff ledges and crannies by the sea and on the higher hills. But this clump was growing by the pathside on as level a stretch of ground as we had covered all day and I snapped it with Hamish kneeling beside it and studying it intently, the ideal image of a budding botanist.

Interesting though had been this Norwegian visit, the mountain plants observed were mainly species that flourish in acidic soils. To see the other side of the picture, as it were, a visit to a region with basic soils was indicated. The Bernese Oberland in the Swiss Alps seemed ideal for such a trip, partly because the mountains are of limestone, partly because, by joining an organised tour, finances would not be overstrained. Thus it was that, sans children, sans car, sans camping gear and most of our usual impedimenta, Doreen and I found ourselves in circumstances that until now we had abhorred – in a fixed base and associated with a party of complete strangers. However, the hotel, located in Adelboden in the Engstligen valley, was quite comfortable and as our associates proved to be very pleasant, an agreeable routine was soon established. Since I was the only botanising member of the party and the others were walkers, not climbers, this routine can be

easily guessed – during the day I usually went my own way alone and the others mostly went in a group led by the party courier, walking in the valleys or on the lower mountains. When planning the trip I had read that Engstligenalp at the head of the valley was an excellent site for alpine flowers, consequently a couple of days after arrival I joined a locally arranged botanical excursion to the alp. Led by a German-speaking Swiss, the plant-hunting group formed a motley crowd composed of at least half a dozen nationalities, oddly enough including three Scots – Doreen, myself, and even more oddly another member of the Cairngorm Club,* one of our Adelboden party who had decided to accompany Doreen for the day.

Travelling by bus and gondola car we were soon at 2,000 metres altitude on the floor of the alp, an enormous, level, richly verdant arena about $1\frac{1}{2}$ kilometres square and walled on three sides by steep snow slopes and sheer cliffs of the Steghorn (3,147 metres), Wildstrubel (3,243 metres) and other rather lower mountains. Once on the alp our guide was in his element and led us from one spot to another, discoursing the while on the habits and habitats of the wonderful variety of lime-loving flowers – but of course all in Swiss-German of which I understood about one word in ten. Terms like 'Zwerg-Mannschild', 'Immergrüner Steinbrech' and 'Bärtige Glockenblume' flowing from his lips meant nothing to me, but an English-speaking French Algerian who was accompanied by his German wife providentially solved my difficulties. My queries regarding nomenclature were passed in French to his wife, who in German elicited the desired information from the guide and relayed it in French to her husband, who in turn told me the English or Latin name. A week later when I was the only English speaker on another botanical excursion to a mountain ridge in a different valley I had to fend for myself; but by then, having recalled sufficient German to ask 'Die Lateinische Name, bitte', I managed tolerably well. In addition I had obtained a copy of Professor Landolt's little book, *Unsere Alpenflora*, and found it extremely useful. It listed the Latin, French and English names in parallel columns, and also gave the German and Latin names under descriptions of individual species.

Immediately after my first visit to Engstligenalp there followed several days of snowstorms high up, cloud and rain low down. But the return of the sun took me once again up to the alp, where I spent a further four delightful days mainly photographing alpinists in a variety of habitats on the level floor, on rocky knolls and ridges and on

* Eva McLennan.

the surrounding slopes. The non-botanical reader would find detailed lists or series of descriptions equally dull but I think brief mention of several calcicolous species that I considered especially attractive is justified. The white alpine anemone, *Pulsatilla alpina*, with white petals delicately tinged with blue is one; another the alpine snowbell, *Soldanella alpina*, with pale violet, pendulous bell-shaped flowers deeply cut into narrow segments. This plant graced snowbeds and snowpatches and in several places, truly an astonishing spectacle, its flowers protruded through holes their unfolding stalks had made in the snow. A dainty little plant, the alpine toadflax, *Linaria alpina*, beautified otherwise bare scree patches with its terminal clusters of orange-blotched violet flowers. Here and there the tops of angular limestone blocks were thickly covered with white or cream-flowered carpets of the livelong saxifrage, *Saxifraga aizoon*. On level grassy patches grew a most striking orchid – *Nigritella nigra* – with small dark-red flowers grouped in dense terminal spikes. Gentians included the trumpet gentian *Gentiana clusii* with magnificent large blue flowers pointing towards the sun, and the even more spectacular purple gentian *Gentiana purpurea*. Other plants that my camera found irresistible were the two species of brilliant red-flowered alpenroses, which are not roses at all but rhododendrons – *Rhododendron hirsutum*, the hairy alpenrose, and *R. ferrugineum* which is just called alpenrose (this latter grows on acidic soils as well as on limestone). And of course I could not leave the Oberland without photographing the flower that perhaps more than any other has come to symbolise the alpine flora – edelweiss. This species has become rare in Switzerland through thoughtless overcollecting in the past, but luckily I was advised of the location of a number of clumps on a massive limestone knob in a nature reserve and there I obtained the desired pictures.

While the primary objective of this Swiss visit was to photograph a wide range of alpine flowers, other items demanded attention from time to time. One unnatural phenomenon that could not be ignored was the supersonic bangs created by jet-fighters of the Swiss Air Force. These were deliberately done to avalanche the vast masses of newly fallen snow and make the peaks safe for climbers. On a much smaller scale but more pleasing to ear and mind, the wild whistlings of alpine marmots resounded across the boulder-fields littering the slopes on the few occasions I tried to stalk these animals – always unsuccessfully, for this species proved to be much wilder than the hoary marmots I had stalked and photographed in the Canadian Rockies a few years earlier. Other cherished memories include sight of a swallowtail

butterfly at 2,200 metres on a ridge of the Tierberg, a flock of 140 alpine choughs probing for insect larvae in the grassy floor of Engstligenalp, a family of snow finches in what I would regard as typical snow-bunting habitat below the snowy slopes and crags of Wildstrubel, an alpine hare loping easily up an alpine ridge, the sweet heady scent rising on a hot sunny day from the incredible luxuriance of wild flowers adorning a steep slope above Hahnenmoos; and, equally unforgettable yet so very different, the wild jangling carillon-like music that chimed all day long across the broad basin of Engstligenalp from the cow-bells worn by herds of cattle up for the summer grazing.

