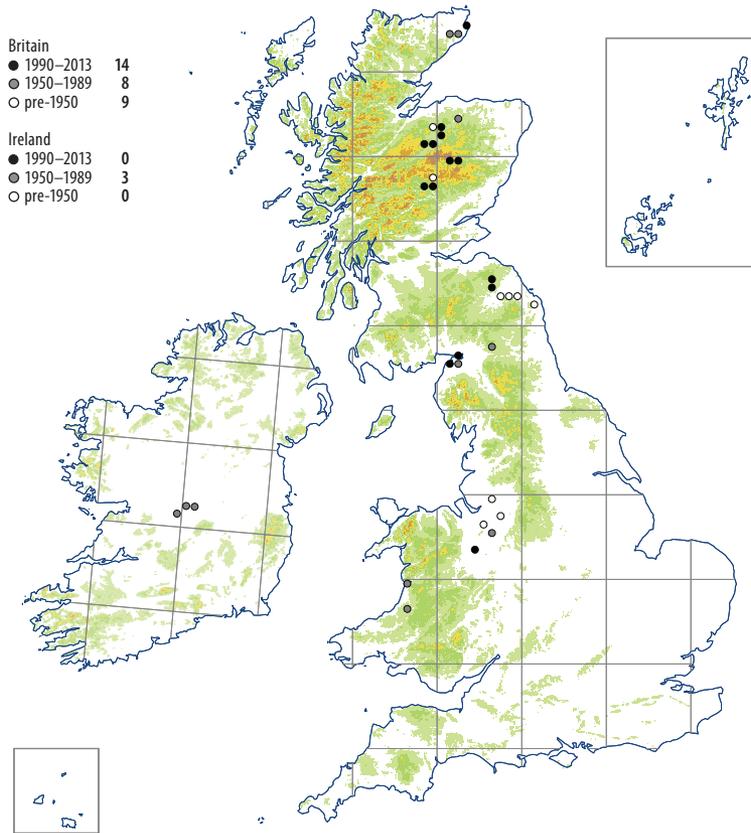


# Dicranum undulatum



This moss is confined to bogs, typically relatively undisturbed raised bogs, less often in flushed sphagnum mires. It usually forms hummocks in amongst heather and *Sphagnum* spp. or on mounds on higher ground within flushes. It is found in two rather different habitats; it occurs on deep acid peat in the Solway mires, the Borders, Grampian and Caithness, and within calcareous flushes in Perthshire and near Braemar. The main associates in each case are often rather similar and it would appear that the plant occurs on acid 'islands' within the flushes. Recorded associates are typical of the habitat and include *Calluna vulgaris*, *Sphagnum capillifolium* and *S. papillosum*, which may be abundant; others include *Erica tetralix*, *Eriophorum vaginatum*, *Myrica anomala*, *Odontoschisma sphagni*, *Aulacomnium palustre*, *Hypnum jutlandicum*, *Pleurozium schreberi* and *Cladonia portentosa*. In the flushed mires

associates may be more calcicolous, including *Carex demissa* and *C. flacca*, but sometimes also with hummocks of *S. fuscum*. Altitudinal range: 0–450 m.

Drainage of mires and afforestation has led to the loss of all but one of its sites south of Cumbria, and it is probably extinct in Ireland (Lockhart *et al.*, 2012). Extant populations are often rather small but show little signs of decline where left undisturbed. Subfossil records of this species indicate that it was formerly more widespread than at present.

Dioicous, with minute male plants; capsules are occasional, mature in summer.

Circumpolar Boreo-arctic montane. C and N Europe to N Fennoscandia and Arctic Russia, rare in the south and extending to the Pyrenees, Alps and Balkan mountains, east to the Urals. Caucasus, Armenia, and widely across N Asia to China and Japan. N America (south to North Carolina), Greenland.

G.P. Rothero

