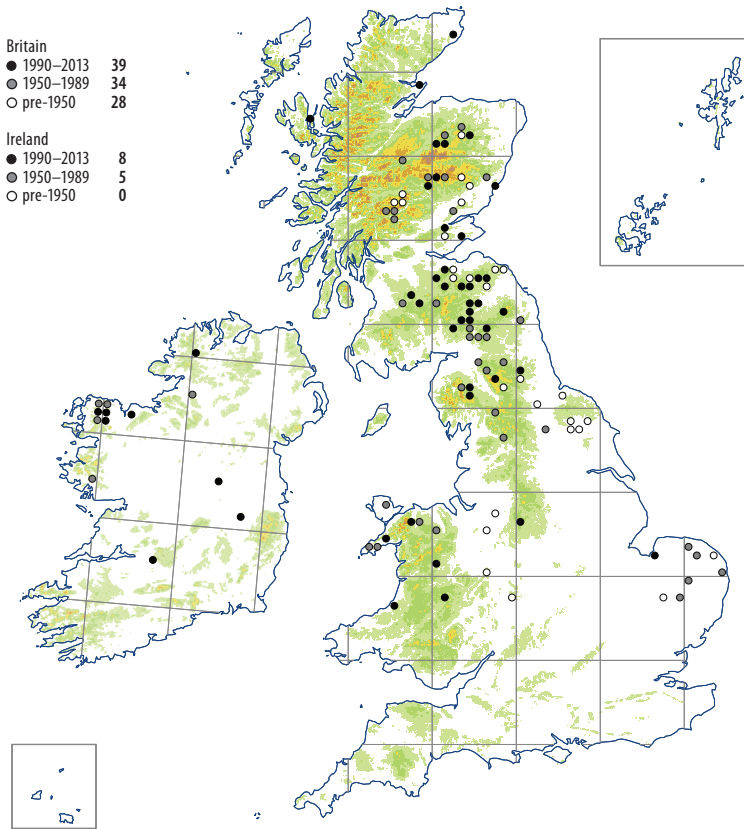


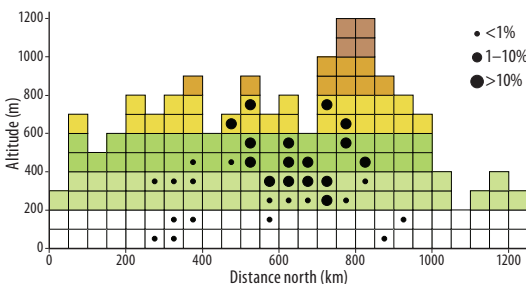
# Tomentypnum nitens



A moss of open calcareous mires and flushes with gently flowing water of around pH 6 or more, sometimes where mildly nutrient-rich. Its lowland sites are often species-rich fens or fen-bog transition mires, with sedges, rushes and a hypnoid moss carpet developed over a peaty or mineral substrate with few tall plants. The associated moss carpet typically includes *Campylium stellatum*, *Scorpidium cossonii* and *S. scorpioides*. At upland sites it occurs in wet fields and flushes, often on gentle slopes flushed by water from steeper ones. It is also known from springheads and many of its Irish sites are in small flushes formed by basic water upwelling in extensive areas of blanket bog. In the Scottish Highlands it is mainly in mesotrophic peaty alpine mires dominated by sedges and 'brown mosses'. Here it may be associated with *Sphagnum contortum*, *S. squarrosus*, *S. teres* or *S. warnstorffii*. It is rare in dune slacks, but is very abundant

in this habitat at Morrich More in Easter Ross. Altitudinal range: 5–760 m.

*Tomentypnum* was locally common in mires from 10,000 to 6,000 years ago, often with *Helodium blandowii* and *Paludella squarrosa*. Natural processes of soil acidification caused its decline in highland areas. Artificial drainage in historical times has reduced it further in S England, and some northern populations have been eliminated by eutrophication and afforestation. It has almost disappeared from East Anglia, though it survived under scrub on Roydon Common, Norfolk, where it was rediscovered in 2013, and it is still present at another isolated English site at Reaps Moor, Staffordshire. It survives at just four of ten known Welsh sites, with rank vegetation growth, scrub encroachment and coniferisation being the causes of the extinctions (Birch & Bosanquet, 2013).



Dioicous; capsules are very rare, mature in summer. Lockhart (1987) describes the discovery of fruiting plants in Ireland.

Circumpolar Boreo-arctic montane. In Europe common in the Arctic and boreal zones, including Svalbard, less common southwards through C and E Europe, reaching C Spain, C Italy and Bulgaria. Turkey, Caucasus. Circumpolar, south to Mongolia, China and, in N America, to New Mexico.

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