

BRYOPHYTES (MOSESSES, LIVERWORTS & HORNWORTS) ON LUNDY IN 2017

by

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I visited Lundy twice in 2017: from 29th April to 1st May with my wife and from 16th to 18th July with my wife and children. Solo recording walks and *ad hoc* recording produced 525 records of 141 bryophyte taxa (1 hornwort, 36 liverworts & 104 mosses). Full data have been sent to the British Bryological Society Recorder for Devon and will be available on the NBN. Fifty of these taxa appear to be new for Lundy, including several notable species.

In contrast to lichens and vascular plants, which are well-recorded on Lundy, the bryophyte flora seems to be remarkably poorly known. The British Bryological Society database, maintained by CEH (Centre for Ecology & Hydrology), included records made by Mark Pool (BBS recorder for Devon) on a visit in 1997, some from 1959 (Cox, 1959), and a few *ad hoc* records from other visitors. Most of the liverwort records in Paton (1975) were not included in the BBS dataset, and these needed to be 'remobilised' by the author. The majority of previous records were poorly localised – for example those made by Mark Pool were at tetrad resolution only – but it was clear that the two most significant recorders (Paton and Pool) who visited the island went no further north than Pondsburry.

The list below includes all bryophyte taxa recorded by the author in 2017. The * symbol indicates those which appear to be new for Lundy, following scrutiny of the BBS database, Paton (1975), Cox (1959) and the NBN Atlas. More recording would be needed to produce a comprehensive list of the island's bryophytes, as there are undoubtedly more species to be found, particularly in the northern half of Lundy. Even the species with the most records, such as *Kindbergia (Eurhynchium) praelonga* and *Hypnum cupressiforme* var. *resupinatum*, have only been recorded in 8 of the 12 1-km squares which make up the island.

RECORDS FROM 2017

Hornworts

Anthoceros punctatus: 4 records in 2017. An uncommon, Mediterranean-Atlantic species that is locally frequent on the edge of coastal flushes. See colour plate 9.

Liverworts

Calyptogeia arguta: 2 records in 2017.

Calyptogeia fissa: 6 records in 2017.

Cephalozia bicuspidata: 7 records in 2017.

Cephalozia connivens: 3 records in 2017.

Cephalozia lunulifolia: 8 records in 2017.

**Cephaloziella* sp.: 6 records in 2017. First record: coastal slope, Battery Steps (SS12884493).

Fertile material would be required for identification, 3 or 4 species of *Cephaloziella* could be present on Lundy.

- **Chiloscyphus pallescens*: 2 records in 2017. First record: coastal flush, Quarry Beach path (SS13884516).
- **Cololejeunea minutissima*: 4 records in 2017. First record: wall, Millcombe NE (SS13874412).
- Conocephalum conicum sensu stricto*: 3 records in 2017.
- Diplophyllum albicans*: 4 records in 2017.
- **Fossombronina* sp.: 4 records in 2017. First record: damp peat over granite, Jenny's Cove (SS13194549). This is probably the Nationally Scarce *F. maritima*, but examination of ripe spores would be needed to confirm the identification.
- Frullania dilatata*: 7 records in 2017.
- Frullania fragilifolia*: 13 records in 2017.
- Frullania tamarisci*: 14 records in 2017.
- **Frullania teneriffae*: 2 records in 2017. First record: north-facing quarry face, Quarries (SS13874535). The first confirmed record for North Devon (v.-c. 4) of this coastal liverwort.
- Jungermannia gracillima*: 1 record in 2017.
- Kurzia sylvatica*: 1 record in 2017. Very scattered in Britain, with few Devon records, but recorded previously from Lundy by Paton (1975).
- Lejeunea cavifolia*: 1 record in 2017.
- **Lepidozia cupressina*: 2 records in 2017. First record: tor, Gannets' Combe (SS13534729) – see colour plate 10. An uncommon Hyperoceanic leafy liverwort, with a few populations on Exmoor and Dartmoor tors.
- Lepidozia reptans*: 7 records in 2017.
- Lophocolea bidentata*: 9 records in 2017.
- **Lophozia excisa*: 1 record in 2017. First record: bank by track, Castle Hill (SS13914385).
- Lophozia ventricosa*: 10 records in 2017.
- Metzgeria furcata*: 7 records in 2017.
- Microlejeunea ulicina*: 3 records in 2017.
- Nardia scalaris*: 1 record in 2017.
- **Pellia endiviifolia*: 2 records in 2017. First record: rocks in stream, St Johns (SS13984399).
- Pellia epiphylla*: 5 records in 2017.
- **Plagiochila asplenioides*: 1 record in 2017. First record: woodland bank, Millcombe south (SS13944404). A woodland liverwort that is generally rare in coastal parts of Britain.
- **Plagiochila (killarniensis) bifaria*: 2 records in 2017. First record: coastal slope, Landing Bay (SS14144392). This Hyperoceanic liverwort is locally frequent on the coasts of Cornwall and Pembrokeshire.
- Saccogyna viticulosa*: 8 records in 2017.
- **Scapania compacta*: 3 records in 2017. First record: rocks, Landing Bay (SS14124398).
- Scapania gracilis*: 9 records in 2017.
- Scapania irrigua*: 2 records in 2017.
- Scapania undulata*: 2 records in 2017.
- **Tritomaria exsectiformis*: 2 records in 2017. First record: coastal slope, Battery Steps (SS12874493). Primarily a woodland liverwort, with a few records from coastal peat; scarce in Devon and Cornwall.

Mosses

- **Aloina aloides*: 1 record in 2017. First record: ruined building, Quarter Wall cottages (SS13804495).
- **Amblystegium serpens*: 2 records in 2017. First record: building, Lower Millcombe (SS14044403).

**Archidium alternifolium*: 2 records in 2017. First record: flush, South West (SS13294398).
Aulacomnium palustre: 1 record in 2017.
Barbula convoluta var. *convoluta*: 1 record in 2017.
Barbula unguiculata: 5 records in 2017.
Brachythecium albicans: 4 records in 2017.
Brachythecium rivulare: 2 records in 2017.
Brachythecium rutabulum: 4 records in 2017.
**Bryoerythrophyllum recurvirostrum*: 1 record in 2017. First record: ruined building, Quarter Wall cottages (SS13804495).
Bryum alpinum: 3 records in 2017.
**Bryum argenteum*: 2 records in 2017. First record: path, Lower Millcombe (SS14044405).
Bryum capillare: 8 records in 2017.
**Bryum dichotomum*: 4 records in 2017. First record: bank by track, St John's east (SS14004398).
Bryum pseudotriquetrum: 1 record in 2017.
**Bryum rubens*: 3 records in 2017. First record: quarry, St Johns (SS13934391).
Bryum sp.: 1 record in 2017. A large *Bryum* near the North Light appears to be one of the *caespiticium/archangelicum/intermedium* group, but needs ripe sporophytes for identification.
**Bryum subapiculatum*: 1 record in 2017. First record: ditch, Quarter Wall (SS13574488).
Calliergonella cuspidata: 6 records in 2017.
Campylopus brevipilus: 1 record in 2017.
Campylopus flexuosus: 3 records in 2017.
Campylopus fragilis: 2 records in 2017.
Campylopus introflexus: 8 records in 2017.
Ceratodon purpureus: 4 records in 2017.
Cratoneuron filicinum: 1 record in 2017.
Cryphaea heteromalla: 1 record in 2017.
Dicranella heteromalla: 9 records in 2017.
Dicranoweisia cirrata: 3 records in 2017.
Dicranum majus: 1 record in 2017.
Dicranum scoparium: 6 records in 2017.
**Dicranum scottianum*: 1 record in 2017. First record: tor, Gannets' Combe (SS13534730) – see colour plate 10. This uncommon Hyperoceanic moss grows alongside *Lepidozia cupressina*, as it does on Exmoor and Dartmoor.
Didymodon insulanus: 5 records in 2017.
Didymodon rigidulus: 1 record in 2017.
Didymodon tophaceus: 3 records in 2017.
Entosthodon obtusus: 1 record in 2017.
Epipterygium tozeri: 3 records in 2017.
Fissidens bryoides var. *bryoides*: 4 records in 2017.
Fissidens bryoides var. *cespitans (curnovii)*: 1 record in 2017.
Fissidens viridulus sensu stricto: 2 records in 2017.
Fontinalis antipyretica: 2 records in 2017.
Grimmia pulvinata: 2 records in 2017.
Grimmia trichophylla agg.: 3 records in 2017.
**Hennediella heimii*: 1 record in 2017. First record: coastal slope, North Light (SS13094809).

Homalothecium sericeum: 8 records in 2017.

Hookeria lucens: 1 record in 2017.

**Hypnum andoi*: 2 records in 2017. First record: Salix in pool, Quarries (SS13864526).

**Hypnum cupressiforme* var. *cupressiforme*: 12 records in 2017. First record: wall, Millcombe NE (SS13854409).

**Hypnum cupressiforme* var. *lacunosum*: 1 record in 2017. First record: ruined building, Quarter Wall cottages (SS13804495).

Hypnum cupressiforme var. *resupinatum*: 18 records in 2017.

Hypnum jutlandicum: 9 records in 2017.

Isothecium myosuroides var. *myosuroides*: 11 records in 2017.

Kindbergia (Eurhynchium) praelonga: 19 records in 2017.

Mnium hornum: 22 records in 2017.

**Orthodontium lineare*: 1 record in 2017. First record: peat bank, Quarries (SS13854508).

**Orthotrichum anomalum*: 1 record in 2017. First record: wall, Landing Bay (SS14144396).

Orthotrichum diaphanum: 3 records in 2017.

**Oxyrrhynchium (Eurhynchium) hians*: 1 record in 2017. First record: damp rock, Quarry Beach path (SS13914508).

**Oxyrrhynchium (Eurhynchium) pumilum*: 2 records in 2017. First record: stream, Millcombe south (SS13874406).

Philonotis fontana: 1 record in 2017.

**Philonotis rigida*: 1 record in 2017. First record: coastal slope, Quarry Beach (SS13964507). This declining, Nationally Scarce moss is the rarest bryophyte recorded from Lundy so far: there are only 7 other known post-2000 British sites.

Plagiothecium denticulatum var. *denticulatum*: 1 record in 2017.

**Plagiothecium succulentum*: 2 records in 2017. First record: woodland bank, Millcombe NE (SS13904412).

Plagiothecium undulatum: 4 records in 2017.

Platyhypnidium (Rhynchostegium) riparioides: 4 records in 2017.

**Pogonatum nanum*: 1 record in 2017. First record: stream bank, Earthquake (SS13184548). A rapidly declining moss, with scattered colonies around the British coast and a handful inland.

**Pohlia lutescens*: 1 record in 2017. First record: woodland bank, Millcombe south (SS13934404).

Pohlia nutans: 1 record in 2017.

Polytrichastrum (Polytrichum) formosum: 1 record in 2017.

Polytrichum commune var. *commune*: 1 record in 2017.

Polytrichum juniperinum: 4 records in 2017.

**Polytrichum piliferum*: 1 record in 2017. First record: wall top, High Street (SS13684434).

Pseudephemerum nitidum: 1 record in 2017.

**Pseudocrossidium hornschuchianum*: 2 records in 2017. First record: path, St John's (SS13964399).

Pseudotaxiphyllum elegans: 2 records in 2017.

Racomitrium heterostichum sensu stricto: 1 record in 2017.

Rhynchostegiella tenella: 2 records in 2017.

Rhynchostegium confertum: 3 records in 2017.

Rhytidiadelphus squarrosus: 2 records in 2017.

Rhytidiadelphus triquetrus: 1 record in 2017.

**Schistidium crassipilum*: 2 records in 2017. First record: wall top, Battery steps (SS12884491).

Schistidium maritimum: 5 records in 2017.

- **Schistidium rivulare*: 1 record in 2017. First record: rock by pool, Quarter Wall (SS13584494).
The presence of this river moss on rocks by a pool is unusual.
- Scleropodium purum*: 7 records in 2017.
- Scleropodium tourettii*: 5 records in 2017.
- Sphagnum denticulatum*: 5 records in 2017.
- Sphagnum palustre*: 1 record in 2017.
- Sphagnum subnitens*: 3 records in 2017.
- **Syntrichia montana*: 2 records in 2017. First record: roof, village (SS13734411).
- **Syntrichia ruralis*: 1 record in 2017. First record: concrete, St John's (SS13964399).
- Tetraphis pellucida*: 3 records in 2017.
- **Thamnobryum alopecurum*: 1 record in 2017. First record: wall by stream, Lower Millcombe (SS14014402).
- Thuidium tamariscinum*: 1 record in 2017.
- Tortella flavovirens*: 2 records in 2017.
- Tortula muralis*: 5 records in 2017.
- **Tortula truncata*: 1 record in 2017. First record: ditch, Quarter Wall (SS13574488).
- **Tortula viridifolia*: 2 records in 2017. First record: stone-faced bank, St John's (SS13904387).
- Trichostomum brachydontium*: 15 records in 2017.
- **Ulota bruchii*: 1 record in 2017. First record: Salix, St Johns (SS13934395).
- **Ulota intermedia*: 1 record in 2017. First record: woodland, Millcombe NE (SS13924413). A recent split from *Ulota crispata*, with a confused distribution in GB.
- Ulota phyllantha*: 13 records in 2017.
- **Weissia controversa* var. *controversa*: 1 record in 2017. First record: quarry, St John's (SS13934391).
- **Weissia perssonii*: 2 records in 2017. First record: coastal slope, Landing Bay (SS14334375).
- **Zygodon conoideus* var. *conoideus*: 3 records in 2017. First record: Sambucus, Lower Millcombe (SS13994404).
- Zygodon viridissimus* var. *viridissimus*: 6 records in 2017.

References

- Cox, R.M. 1959. Mosses, Liverworts and Lichens. *Annual Report of the Lundy Field Society* 13: 49-53.
- Paton, J.A. 1975. Hepatics on Lundy. *Annual Report of the Lundy Field Society* 26: 18.