

## Bryophytes collected in Mauritius by Gunnar Erdtman.

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**Abstract:** This small collection contained 8 species of mosses and 3 species of hepatics. *Leucobryum boryanum* is new to Mauritius but previously known from Réunion. A sample from the seldom visited small island of Ile aux Aigrettes, close to Mauritius, is of particular interest.

### Background

In September 1998 a symposium was held in Stockholm to commemorate the centennial anniversary of the births of Gunnar Erdtman and Vivi Täckholm. In this context the author received for determination a small number of bryophytes collected by Erdtman in Mauritius in 1966.

Erdtman was a world authority on palynology and was interested therefore also in bryophyte spores. We made several excursions together in the early sixties around Stockholm searching for mosses and hepatics with mature spores.

Erdtman 1957, pages 99 - 124, contains drawings of bryophyte spores, representing 23 families of *Hepaticae* and 40 families of *Musci*. Erdtman 1965, pages 83 - 156, contains mainly descriptive texts.

In 1966 Erdtman undertook a long journey covering Mauritius, Australia including Tasmania, New Zealand and Egypt. The purpose

was to collect and preserve fresh samples of pollen and spores for electron microscopy. His stay in Mauritius lasted from September 26 to October 3.

### List of species

The characters within brackets indicates first the Erdtman sample number – e.g. E01 – and then herbarium S Bryophyte registration number – e.g. S-B16687. RM378 is an example of my own numbering of samples from herbarium S.

### Mosses

*Aerobryidium subpiligerum* (Hampe) Cardot

Mauritius: Sine loco (E01, S-B16687).

The sample is mixed with *Ectropothecium intertextum*

*Calymperes tenerum* C. Mueller

Mauritius: Ile aux Aigrettes (E02, S-B16688).

Det. Sándor Orbán.

*Campylopus praetermissus* Frahm

Mauritius: Southeast part of the island, on coastal plain near the precipitous edge towards the sea (E06, S-B16691); Sine loco, (E04, S-B16690).

Both samples have capsules and “flowers” and E06 has small propagation branches, but the microscopical details fit better with the present species than with *Campylopus fragilis*. Compare with Frahm (1985: 81-85+152-154), and with Een (1989: 57+58).

*Ectropothecium intertextum* Ren. & Cardot

Mauritius: Sine loco (E01, S-B16687); Leg. Robillard sine loco, 1874, ex. herb. DUBY and Renault (RM378).

Both the above specimens have leaves with only one large hyaline alar cell bordered by a few small quadrate cells. Furthermore the median and apical leaf cells are prorate, at least in the upper end.

This also fits with a specimen in herb. S (RM419) from Réunion, Plaine de Mafate, leg. Rodriguez 1896-08-16, which has been named *Ectropothecium amabile* CMueller - a name which I have been unable to trace to its source.

The Erdtman sample is mixed with *Aerobryidium subpiligerum*.

*Leucobryum boryanum* Besch.

Mauritius: Sine loco, (E12, S-B16697) - Madagascar: Betsileo, leg. Rev. Montant 1894 (S, ex herb. Cardot).

This species is previously known from Réunion, but new to Mauritius.

*Polytrichum subpilosum* PBeauv.

Mauritius: Sine loco (E03, S-B16689).

For determination of this sample I used De Sloover (1986). The species has a wide distribution in Africa and is rather variable. In relative terms this sample contains small specimens. I have not been able to produce a section through the lamellae corresponding to fig. 141, but all other details fit well. De Sloover recorded about 20 collections from Mauritius.

*Sphagnum perichaetiale* Hampe

Mauritius: Central part (E09, S-B16694); Sine loco (E08, S-B16693); Sine loco (E10, S-B16695).

Many authors have made this species a synonym of *Sphagnum erythrocalyx* Hampe, but Crum (1993: 24) pointed out that: “actually *S. perichaetiale* (1847) antedates *S. erythrocalyx* (1848) by one year.”

All samples have been determined by Howard Crum. Duplicates in Michigan.

*Sphagnum violascens* CMueller

Mauritius: Sine loco (E07, S-B16692); Sine loco (E11, S-B16696).

Both samples have been determined by Howard Crum. Duplicates in Michigan.

**Hepatics**

All Hepatics have been determined by Tamás Pócs and he has also written the comments that are quoted below.

*Frullania anderssonii* Aongstr.

Mauritius: Ile aux Aigrettes (E02, S-B16688).

This species was described from Mauritius but occurs, apart from in the Indian Ocean islands, also in Southeastern continental Africa

*Frullania ericoides* (Nees) Mont.

Mauritius: Ile aux Aigrettes (E02, S-B16688).

This is a common pantropical xerotolerant species.

*Porella cucullistipula* (St.) E.W. Jones

Mauritius: Ile aux Aigrettes (E02, S-B16688).

This species is an endemic of the Indian Ocean islands

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### Literature

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