

Hedwig-Schwägrichen Types Catalogue Update (1): New Typifications and Typification Corrections

Author: Price, Michelle J.

Source: Candollea, 69(2) : 119-133

Published By: The Conservatory and Botanical Garden of the City of Geneva (CJBG)

URL: <https://doi.org/10.15553/c2014v692a3>

The BioOne Digital Library (<https://bioone.org/>) provides worldwide distribution for more than 580 journals and eBooks from BioOne's community of over 150 nonprofit societies, research institutions, and university presses in the biological, ecological, and environmental sciences. The BioOne Digital Library encompasses the flagship aggregation BioOne Complete (<https://bioone.org/subscribe>), the BioOne Complete Archive (<https://bioone.org/archive>), and the BioOne eBooks program offerings ESA eBook Collection (<https://bioone.org/esa-ebooks>) and CSIRO Publishing BioSelect Collection (<https://bioone.org/csiro-ebooks>).

Your use of this PDF, the BioOne Digital Library, and all posted and associated content indicates your acceptance of BioOne's Terms of Use, available at www.bioone.org/terms-of-use.

Usage of BioOne Digital Library content is strictly limited to personal, educational, and non-commercial use. Commercial inquiries or rights and permissions requests should be directed to the individual publisher as copyright holder.

BioOne is an innovative nonprofit that sees sustainable scholarly publishing as an inherently collaborative enterprise connecting authors, nonprofit publishers, academic institutions, research libraries, and research funders in the common goal of maximizing access to critical research.

Hedwig-Schwägrichen types catalogue update (1): new typifications and typification corrections

Michelle J. Price

Abstract

PRICE, M. J. (2014). Hedwig-Schwägrichen types catalogue update (1): new typifications and typification corrections. *Candollea* 69: 119-133. In English, English and French abstracts.

An update of the “Catalogue of the Hedwig-Schwägrichen Herbarium (Part 1)” of 2005 has been compiled herein. It collates the 38 recently published typifications for the Hedwig moss names and includes updated information on 12 typifications that were unintentionally omitted or incorrectly cited in the original catalogue. Information on the place and page of publication of each typification as well as the details of the types themselves is given for each name concerned. Given the complexities of the typification process of the Hedwig material (for example, the historical nature of the material, presence of different entities with different temporal or geographic origins on the type sheet, two or more species attached to the same sheet, the presence of Schwägrichen’s annotations, labels that do not correspond exactly with the protologue or validating description) the correct citation of the G-Hedwig herbarium sheet and of the elements on it being typified are of crucial importance. To facilitate the unequivocal identification of the Hedwig specimens in G a list of the barcodes assigned to each of the Hedwig herbarium sheets figured in the original catalogue is provided.

Key-words

Hedwig collection – Mosses – Herbarium Genavense – Herbarium Hedwig-Schwägrichen

Résumé

PRICE, M. J. (2014). Mise à jour du catalogue des types d’Hedwig-Schwägrichen (1): nouvelle typification et corrections des typifications. *Candollea* 69: 119-133. En anglais, résumés anglais et français.

Une mise à jour du «Catalogue of the Hedwig-Schwägrichen Herbarium (Part 1)» publié en 2005 est compilée ici. Elle regroupe, d’une part, les informations sur les 38 typifications des noms de mousses d’Hedwig récemment publiées. D’autre part, elle inclut une révision de 12 typifications qui avaient été involontairement omises ou citées de manière inadéquate dans le catalogue de 2005. Pour chacun des noms concernés sont donnés les renseignements sur la publication de leur typification (revue et pagination), ainsi que les détails des types eux-mêmes. Au vu de la complexité du processus de typification du matériel d’Hedwig (par exemple, l’ancienneté du matériel, la présence de plusieurs entités de diverses origines temporelles et géographiques ou de deux ou de plusieurs espèces attachées sur une même planche d’herbier, l’existence d’annotations de Schwägrichen comme d’étiquettes ne correspondant pas exactement au protologue ou à la première description valide), la citation correcte des planches de l’herbier d’Hedwig dans G et de ses éléments typifiés a une importance cruciale. Afin de faciliter une identification sans équivoque des spécimens d’Hedwig dans G qui ont été typifiés, une liste des codes barre assignés à chacune des planches figurant dans le catalogue original est donnée.

Address of the author: Conservatoire et Jardin botaniques de la Ville de Genève, case postale 60, 1292 Chambésy, Switzerland.
Email: michelle.price@ville-ge.ch

Submitted on February 18, 2014. Accepted on July 24, 2014.

Edited by P. Bungener

ISSN: 0373-2967 – Online ISSN: 2235-3658 – *Candollea* 69(2): 119-133 (2014)

© CONSERVATOIRE ET JARDIN BOTANIKES DE GENÈVE 2014

Introduction

The importance of the Hedwig-Schwägrichen collection to moss taxonomy has been outlined in previous works (see FLORSCHÜTZ, 1960; GEISSLER, 2000; PRICE, 2005). The Hedwig part of the Hedwig-Schwägrichen herbarium is intrinsically linked with the publication “Species muscorum frondosorum” (HEDWIG, 1801): the designated starting point for the nomenclature of mosses (excluding the *Sphagnaceae*). The goal of the ongoing work on the Hedwig-Schwägrichen collection is to create a set of reference sources that contain more accessible information on the types and typifications of the Hedwig and Schwägrichen moss names. The collation of the published typifications forms a precursor to the creation of a typification registration database by the botanical community.

Since the publication of the “Catalogue of the Hedwig-Schwägrichen herbarium (Part I)” by PRICE (2005) 38 new typifications for the Hedwig moss names have been published and 12 entries to the original catalogue that needed correcting were discovered (see the full list below). With the aim of providing a full record of the Hedwig types, and the typifications of the Hedwig moss names, an update to the original catalogue has been compiled. Publication information on the new typifications, including information on the designation of the material (if given), and the typifications that were unintentionally omitted or incorrectly cited in PRICE (2005) are indicated.

To maintain coherence between the original catalogue of PRICE (2005) and current list the format adopted herein is as follows:

- **BN:** basionym.
- **CN/SY:** current use or synonymy for the basionym.
- **LI:** label information copied from the herbarium sheet indicated.
- **PL:** type citation from the protologue.
- **LT:** information on the place of publication of the type and the type designation. If given, information on the specific type material designated is included. The G barcode for the Hedwig herbarium sheet is given in square brackets.
- **Figure:** reference to the scan of the herbarium sheet in PRICE (2005), with a reference to any subsequent works that contain an image of the herbarium sheet with the type indicated.
- **Notes:** additional information, when present, for each entry.

The barcodes for the Hedwig herbarium sheets are given in Appendix 1 for each specimen treated in PRICE (2005) so that any typified specimens can be unequivocally associated with identifiable herbarium sheets within the Hedwig collection in G.

Newly published typifications and corrections to typifications of the Hedwig moss names

BN: *Anictangium aquaticum* Hedw., Sp. Musc. Frond.: 41. 1801.

CN / SY: *Cinclidotus aquaticus* (Hedw.) Bruch & Schimp., Bryol. Eur. 3: 170. 1842.

PL: *Alpestrium aquarum incola*, Scotiae, Helvetiae, Austriae, Galliae.

LI: [*Anoetangium aquaticum* Hedw. Stirp. III.t. a. von Hedwig b. (four illegible words) 1800 c. von Host 1799 (three illegible words)].

LT: EDERRA (2006: 792), lectotype in G, “specimens marked ‘a’”. [G00040078].

Figure: PRICE (2005: Fig. 6).

BN: *Anictangium cirrosum* Hedw., Sp. Musc. Frond.: 42, t. V, f. 1-2. 1801.

CN / SY: *Macromitrium cirrosum* (Hedw.) Brid., Bryol. Univ. 1: 316. 1826.

PL: Jamaica, Montserrat.

LI: *Anictangium cirrhosum* Spec. Musc. p. 42. t. 5. f. 1-3. *Hypnum cirrhosum* Swartz. Prodr. p. 142. [b. St. Vincent Menzies c. var. *longifolia* Menzies] Jamaica, Montserrat.

LT: WILBRAHAM & PRICE (2013: 122), lectotype in G, “Jamaica, *sin. coll., s.n.*, G (G00040187, Hb. Hedwig-Schwägrichen). First stem on the left of the upper row (specimen 1, Figure 1) on herbarium sheet G00040187 labelled ‘*Anictangium cirrhosum* Spec. Musc. p. 42. t. 5. f. 1-3. *Hypnum cirrhosum* Swartz. Prodr. p. 142. [b. St. Vincent Menzies c. var. *longifolia* Menzies] Jamaica, Montserrat.’ The handwriting of Schwägrichen is indicated using square brackets”. [G00040187].

Figure: PRICE (2005: Fig. 8), WILBRAHAM & PRICE (2013: Fig. 1, with lectotype indicated).

BN: *Anictangium lapponicum* Hedw., Sp. Musc. Frond.: 40. 1801.

CN / SY: *Amphidium lapponicum* (Hedw.) Schimp., Coroll. Bryol. Eur. 39. 1856.

PL: In alpihus Lapponiae. (In Hercynia Ehrh. Schrad.).

LI: *Hedwigia lapponica* Hedw. St. Cr. v.3. p. t. nomine Gymnost. Exempla Cl. Swartz.

LT: See FRAHM & al. (2000: 175), for discussion of the type material. OCHYRA & al. (2008: 174), lectotype in G, “The first specimen from the right on the sheet labelled ‘*Hedwigia lapponica* Hedw. St. Cr. v.3. p. t. nomina Gymnost. Exempla Cl. Swartz.’ – G-Hedwig-Schwägrichen”. [G00040003].

Figure: PRICE (2005: Fig. 9).

BN: *Barbula fallax* Hedw., Sp. Musc. Frond.: 120. 1801.

CN / SY: *Didymodon fallax* (Hedw.) R.H. Zander, Phytologia 41: 28. 1978.

PL: In interstitiis muscorum, ambulacris Germaniae, Galliae, in Africa secundum Bridelium, ad Lancaster Pensilvaniae Hedwig.

LI: *Barbula fallax* Hedw. St. Cr. Vol. 1. p. 62. t. 24. Chemnitii lecta. [G00040367].

LT: ZANDER (1978: 28), lectotype in G, “*Barbula fallase* [sic] Hedw. St. Cr. Vol. 1. P. 62. T. 24. Cheminitis [sic] lecta”. [G00040367].

Figure: PRICE (2005: Fig. 19).

Notes: The typification of ZANDER (1978) was inadvertently omitted in PRICE (2005).

BN: *Bartramia halleriana* Hedw., Sp. Musc. Frond.: 164. 1801.

CN / SY: *Bartramia halleriana* Hedw., Sp. Musc. Frond.: 164. 1801.

PL: Habitat in rupibus silvarum montosarum granite constantibus in Saxonia, Hercynia, monte pinifero Franconiae, in alpibus Judenburgensibus Styriae, Carinthia, nec non in Helvetia.

LI: *Bartramia halleriana* Hedw. St. Crypt Vol. II. p.III. t. 40. *Bryum laterale* S.V. * *Planta delineata*.

LT: EDERRA (2006: 791), lectotype in G, “the third specimen on the left on the sheet – (Herbarium Hedwig-Schwägrichen in G)”. [G00040042].

Figure: PRICE (2005: Fig. 27).

BN: *Bartramia pomiformis* Hedw., Sp. Musc. Frond.: 164. 1801.

CN / SY: *Bartramia pomiformis* Hedw., Sp. Musc. Frond.: 164. 1801.

PL: In umbrosis, fissuris rupium per omnem Europam.

LI: *Bartramia pomiformis* Hedw. St. Cr. Vol. II. p. *Bryum pomiforme* S.V. [b. exempla picta a Bock].

LT: EDERRA (2006: 792), lectotype in G, “first specimen to the left in the upper row – (Herbarium Hedwig-Schwägrichen in G)”. [G00040043].

Figure: PRICE (2005: Fig. 28).

BN: *Bryum argenteum* Hedw., Sp. Musc. Frond.: 181. 1801.

CN / SY: *Bryum argenteum* Hedw., Sp. Musc. Frond.: 181. 1801.

PL: Ad muros, tecta, rupes Europae.

LI: *Bryum argenteum* antheris pendulis surculis cylindricis imbricatis laevibus Linn. Spec. pl. 2. p. 1586. n. 27. *Bryum pendulum iulaceum argenteum et sericeum* Dill H. Musc. 392 t. 50 f. 62. [a. Brasil Beyrich ad muros Rio Janeiro. b. lanatum Palisot c. argyrioides Brid. Bryo U 1. 846.].

LT: OCHYRA & al. (2008: 453), lectotype in G, “the central specimen glued to the sheet between the specimens marked ‘b’ and ‘a’ on the sheet bearing the label ‘*Bryum argenteum* antheris pendulis surculis cylindricis imbricatis laevibus Linn. Spec. pl. 2 p. 1586. n. 27. *Bryum pendulum iulaceum argenteum et sericeum* Dill H. Musc. 392 t. 50 f. 62.’ G-Hedwig/Schwägrichen”. [G00040370], syntype in G [G00040059].

Figure: PRICE (2005: f. 31 & 30, respectively).

BN: *Bryum dichotomum* Hedw., Sp. Musc. Frond.: 183, t. XLII, f. 8-12. 1801.

CN / SY: *Bryum dichotomum* Hedw., Sp. Musc. Frond.: 183. 1801.

PL: Nova Seelandia.

LI: *Bryum dichotomum* Spec. Musc. p. 183. t. 42, f. 8-12. aus Neu Seeland.

LT: OCHYRA & al. (2008: 462), lectotype in G, “the third shoot from the left on the sheet labelled ‘*Bryum dichotomum* Spec. Musc. p. 183. t. 42, f. 8-12. aus Neu Seeland’ – G-Hedwig/Schwägrichen”. [G00040365].

Figure: PRICE (2005: Fig. 35).

BN: *Bryum patens* Hedw., Sp. Musc. Frond.: 86. 1801.

CN / SY: *Grimmia ramondii* (DC) Margad. Lindbergia 1: 128. 1972.

PL: Ad rupes in rivulis alpinis Scotiae. Ben Nevis.

LT: GEISSLER & MAIER (1995: 499), specimen not in G. Lectotype in BM [herb. Dickson, BM000966028], isotype in BM [BM001058734].

BN: *Cynodontium capillaceum* Hedw., Sp. Musc. Frond.: 57. 1801.

CN / SY: *Distichium capillaceum* (Hedw.) Bruch & Schimp., Bryol. Eur. 2: 156 (fasc. 29-30. Monogr. 4). 1846.

PL: Saxonia inferior, Niedersachswerfen et Neuhof, in montibus gypsaceis prope Steigerthal, ad ripas fluvii Bode, (in calcareis Franconiae, alpestribus Austriae) Suecia, Islandia in fissuris rupium.

LI: *Swartzia capillacea* Hedw. St. Cr. Vol.II. p. 72. t. 26. [b. ex ins Melville (illegible word)].

LT: OCHYRA & al. (2008: 131), lectotype in G, “The right specimen in the lower row, on the sheet labelled ‘*Swartzia capillacea* Hedw. St. Cr. Vol.II. p. 72. t. 26.’ – G-Hedwig/Schwägrichen”. [G00040111].

Figure: PRICE (2005: Fig. 42).

BN: *Cynontodium inclinatum* Hedw., Sp. Musc. Frond.: 58. 1801.

CN / SY: *Distichium inclinatum* (Hedw.) Bruch & Schimp., Bryol. Eur. 2: 157, 194. 1846.

PL: none.

LI: *Swartzia inclinata* Hedw. St. Cr. Vol.II. p. 74. t. 27.

LT: OCHYRA & al. (2008: 135), lectotype in G, “The middle specimen with the distinctly inclined capsule, on the sheet labelled ‘*Swartzia inclinata* Hedw. St. Cr. Vol.II. p. 74. t. 27.’ G-Hedwig-Schwägrichen” [G00040112].

Figure: PRICE (2005: Fig. 44).

BN: *Dicranum cerviculatum* Hedw., Sp. Musc. Frond.: 149. 1801.

CN / SY: *Dicranella cerviculata* (Hedw.) Schimp., Coroll. Bryol. Eur. 13. 1856.

PL: In Suecia et in turfosis aridis ericetis Hamsteadiani prope Londinum. (nec non in Sudetibus Germaniae lectum a Ludwigo. S.).

LI: *Dicranum cerviculatum* Hedw. St. Cr. III. p. 89. t. 27. A. Suec. D. Swartz.

LT: ELLIS & PRICE (2013a: 277), lectotype in G, “Sweden, Swartz s.n. [‘*Dicranum cerviculatum* Hedw. St. Cr. III. p. 89. t. 27. A. Suec. D. Swartz’] Hb. Hedwig-Schwägrichen (G00040097), the three fertile plants on herbarium sheet G00040097”. [G00040097].

Figure: PRICE (2005: Fig. 49).

BN: *Dicranum crispum* Hedw., Sp. Musc. Frond.: 132. 1801.

CN / SY: *Dicranella crispa* (Hedw.) Schimp., Coroll. Bryol. Eur. 13. 1856.

PL: In Suecia prope Upsalam, Scotiae paludosis et alpinum Sanensium humidis.

LI: *Dicranum crispum* Hedw. St. Cr. Vol. II. p. 91. t. 33. Exemplaria in Suecia ab Ehrhardo lecta.

LT: ELLIS & PRICE (2013a: 278), lectotype in G, “Sweden, Ehrhart s.n. ‘*Dicranum crispum* Hedw. St. Cr. Vol. II. P. 91. T. 33. Exemplaria in Suecia ab Ehrhardo lecta” (Hb. Hedwig-Schwägrichen – G00040017), the eight plants on herbarium sheet G00040017”. [G00040017].

Figure: PRICE (2005: Fig. 51).

BN: *Dicranum curvatum* Hedw., Sp. Musc. Frond.: 132, t. XXXI, f. 7-12. 1801.

CN / SY: *Dicranella subulata* (Hedw.) Schimp., Coroll. Bryol. Eur. 13. 1856.

PL: Locus ad declivitates viarum cavarum montanarum, inter *Didymodon homomallum*.

LI: *Dicranum curvatum* Sp. Musc. 132. t. 31, f. 7-12. ad declivia viarus cavarus Ludwig.

LT: ELLIS & PRICE (2013a: 279), lectotype in G, “[Germany/Poland, Lausitz?] Ludwig s.n. ‘*Dicranum curvatum* Sp. Musc. 132. t. 31, f. 7-12. Ad declivia viarus cavarus Ludwig.’ (Hb. Hedwig-Schwägrichen – G00040103), plants in “b”-“d” on herbarium sheet G00040103”. [G00040103].

Figure: PRICE (2005: Fig. 52).

BN: *Dicranum interruptum* Hedw., Sp. Musc. Frond.: 129, t. XXIX, f. 9-12. 1801.

CN / SY: *Dicranella heteromalla* (Hedw.) Schimp., Coroll. Bryol. Eur. 13. 1856.

PL: In montosis uliginosis silvatici ad arbores, praesertim putrescentes, in Saxonia Chemnitzii, Zeisigwald (in Anglia, Germania prope Halam Saxonum Bridel.).

LI: *Dicranum interruptum* Hedw. Spec. Musc. p. 129. t. 29, f. 8. 9.-12. Specimina patiora Chemnitzii lecta.

LT: ELLIS & PRICE (2013a: 282), lectotype in G, “[Germany/Saxony] Chemnitz, [Hedwig?] s.n. ‘*Dicranum interruptum* Hedw. Spec. Musc. p. 129. t. 29, f. 8. 9.-12. Specimina patiora Chemnitzii lecta.’ (Hb. Hedwig-Schwägrichen – G00040100), all plants on sheet G00040100”. [G00040100].

Figure: PRICE (2005: Fig. 60).

BN: *Dicranum longifolium* Hedw., Sp. Musc. Frond.: 130. 1801.

CN / SY: *Paraleucobryum longifolium* (Hedw.) Loeske, Hedwigia 47: 171. 1908.

PL: In Suecia Upsaliae et in Scotiis alpibus ad rivulorum ripas (in Hercynia et in Sudetibus Ludwig, in Austria Host).

LI: [*Dicranum longifolium* Hedw. St. Cr. III. p. 341. t. 9. Upsalia Ehrh ad J. Hedwig].

LT: FRAHM & ISOVIITA (1988: 95), holotype in G, corrected in PRICE (2012: 302), lectotype in G, “the two extant stems on herbarium sheet G00040217, labelled as above, and as illustrated in Hedwig (1791-1792)” [G00040217].

Figure: PRICE (2005: Fig. 63).

Notes: The original typification by FRAHM & ISOVIITA (1988) was not listed in PRICE (2005).

BN: *Dicranum orthocarpum* Hedw., Sp. Musc. Frond.: 131, t. XXX, f. 1-5. 1801.

CN / SY: *Dicranella heteromalla* (Hedw.) Schimp., Coroll. Bryol. Eur. 13. 1856.

PL: Locus terrestris. Lancaster in Pensilvania.

LI: *Dicranum orthocarpum* Sp. Musc. p. 131. tab 30, f. 1-5. ad Lancaster Pensylvaniae lect.

LT: ELLIS & PRICE (2013a: 283), holotype in G, “[North America, USA], Pennsylvania, Lancaster, [Mühlenberg] s.n. ‘*Dicranum orthocarpum* Sp. Musc. p. 131. t. 30, f. 1-5. ad Lancaster Pennsylvaniae lect.’ (Hb. Hedwig-Schwägrichen – G00040101), all plants on sheet G00040101” [G00040101].

Figure: PRICE (2005: Fig. 65).

BN: *Dicranum purpurascens* Hedw., Sp. Musc. Frond.: 137, t. XXXV, f. 1-7. 1801.

CN / SY: *Ceratodon purpureus* (Hedw.) Brid., Bryol. Univ. 1: 480. 1826.

PL: Lancaster Pensylvaniae in terra humoso-turfosa.

LI: *Dicranum ambiguum* purpurascens Spec. Musc. p. 137. t. 35, f. 1-7. Circa Lancaster Pensylvan [b a Pens, f. nom.].

LT: BURLEY & PRITCHARD (1990: 37-38), holotype in PH.

Figure: PRICE (2005: Fig. 70).

Notes: the original typification by BURLEY & PRITCHARD (1990) was not listed in PRICE (2005). Original Hedwig material is present in G [G00040077], shown in PRICE (2005: Fig. 70).

BN: *Dicranum purpureum* Hedw., Sp. Musc. Frond.: 136, t. XXXVI, f. 1-11. 1801. **CN / SY:** *Ceratodon purpureus* (Hedw.) Brid., Bryol. Univ. 1: 480. 1826.

PL: Locus terrestris, ad ligna putrescentia, per omnem Europam vulgatissima species, inque America septentrionali.

LI: *Bryum tenue stellatum* setis purpureis. Dill. Musc. 386. t. 49, f. 51. *Mnium purpureum* caule dichotomo, axillis pedunculiferis, anthera exerta, foliis carinatis. Linn. Spec. ed. II. 1575.6.

LT: BURLEY & PRITCHARD (1990: 37), lectotype in G [G00040077].

Figure: PRICE (2005: Fig. 71).

Notes: The original typification by BURLEY & PRITCHARD (1990) was inadvertently omitted in PRICE (2005).

BN: *Dicranum pusillum* Hedw., Sp. Musc. Frond.: 139. 1801.

CN / SY: *Dicranella cerviculata* (Hedw.) Schimp., Coroll. Bryol. Eur. 13. 1856.

PL: Prope Berolinum, Vindobonam, in Hercyniae umbrosis et Scotiae pascuis ad terram densis caespitibus.

LI: *Dicranum pusillum* Hedw. St. Cr. Vol. II. p. 78. t. 29.13.

LT: ELLIS & PRICE (2013a: 285), lectotype in G, “[Germany/Berlin?] [Willdenow?] s.n. ‘*Dicranum pusillum* Hedw. St. Cr. Vol. II. p. 78. t. 29.B’ (Hb. Hedwig-Schwägrichen – G00040098), all plants on sheet G00040098” [G00040098].

Figure: PRICE (2005: Fig. 72).

BN: *Dicranum schreberianum* Hedw., Sp. Musc. Frond.: 144, t. XXXIII, f. 6-10. 1801.

CN / SY: *Dicranella schreberiana* (Hedw.) H.A. Crum & L.E. Anderson, Mosses E. N. Amer. 1: 169. 1981.

PL: Locus ad fossas argillosas Lipsiae.

LI: *Dicranum schreberianum* Hedw. Sp. M. p. 144. t. 33. fig. 6-10. *Bryum crispum* Schreb. Spicil.

LT: ELLIS & PRICE (2013a: 285), lectotype in G, “[Germany, Saxony, Leipzig], sin. coll. s.n. ‘*Dicranum schreberianum* Hedw. Sp. M. p. 144. t. 33. fig. 6-10. *Bryum crispum* Schreb. Spicil.’ (Hb. Hedwig-Schwägrichen – G00040018), all plants on sheet G00040018” [G00040018].

Figure: PRICE (2005: Fig. 73).

BN: *Dicranum subulatum* Hedw., Sp. Musc. Frond.: 128, t. XXXIV, f. 1-5. 1801.

CN / SY: *Dicranella subulata* (Hedw.) Schimp., Coroll. Bryol. Eur. 13. 1856.

PL: Sueciae loco humido mense Septembri lectum misit D. Swartz.

LI: *Dicranum subulatum* Sp. M. p. 128. t. 34, f. 1-5. in humidis Swec. Swartz.

LT: ELLIS & PRICE (2013a: 287), lectotype in G, “[Sweden, Swartz s.n. ‘*Dicranum subulatum* Sp. M. p. 128. t. 34, f. 1-5. in humidis Swec. Swartz’ (Hb. Hedwig-Schwägrichen – G00040102), 3 shoots at extreme right of specimen, as indicated in Figure 4” [G00040102].

Figure: PRICE (2005: Fig. 76), ELLIS & PRICE (2013: Fig. 4, with lectotype indicated).

BN: *Funaria hygrometrica* Hedw., Sp. Musc. Frond.: 172. 1801.

CN / SY: *Funaria hygrometrica* Hedw., Sp. Musc. Frond.: 172. 1801.

PL: Locis subhumidis umbrosis aut apertis, in rupibus terra tenui tectis per omnem Germaniam.

LI: *Bryum bulbiforme aureum*, calyptra quadrangulari, capsulis pyriformibus nutantibus Dill. H. Musc. 407. t. 52, f. 75. *Mnium hygrometricum* acaule anthera nutante calyptra reflexa tetragona Linn. Spec. pl. 2. p. 1575. n. 5.

LT: OCHYRA & al. (2008: 118), lectotype in G, “the second specimen from the left in the upper row forming a tuft with many mature capsules on the sheet labelled ‘*Bryum bulbiforme aureum*, calyptra quadrangulari, capsulis pyriformibus nutantibus Dill. H. Musc. 407. t. 52, f. 75. *Mnium hygrometricum* acaule anthera nutante calyptra reflexa tetragona Linn. Spec. pl. 2. p. 1575. n. 5’ – G-Hedwig-Schwägrichen” [G00040143].

Figure: PRICE (2005: Fig. 101).

BN: *Grimmia alpicola* Hedw., Sp. Musc. Frond.: 77, t. XV, f. 1-5. 1801. nom. rej.

CN / SY: *Schistidium alpicola* (Hedw.) Limpr., Die Laubm. Deutschl. 1: 707. 1889.

PL: Suecia. O. Swartz. In saxis, ad rivulos alpinos.

LI: *Grimmia alpicola* Spec Musc. p. 77. t. 15, f. 1-5. accepta ab O. Swartz.

LT: BREMER (1980: 2), “type in G (information communicated by Deguchi)”. See also PRICE & MAIER (2011a: 288). Original material: s. loc., s.d. [Swartz] s.n. (G00040295), all plants on herbarium sheet G00040295.

Figure: Price (2005: Fig. 103).

BN: *Grimmia cribrosa* Hedw., Sp. Musc. Frond.: 76. 1801.

CN / SY: *Coscinodon cribrosus* (Hedw.) Spruce, Ann. Mag. Nat. Hist., ser. 2, 3: 491. 1849.

PL: In petris Goslariae, nec non Hassiae montis Meisner elegantem speciem primi dixerunt Persoon et Schrader.

LI: *Grimmia cribrosa* Hedw. St. Cr. Vol.III.p. 73.t. 31. A [a J Hedw. b. a Goslar c. Gogendbrug am Ochsenkopf c. An der Mühle unter der Salbergstra e Schwarzenbg. (illegible word) e Scotia Arnott 1839].

LT: DEGUCHI (1978: 244), holotype in G [G00040082]; PRICE & MAIER (2011b: 795), lectotype in G, “the element annotated ‘b’” (Fig. 2, element 2) on the original Hedwig herbarium sheet [G00040083] in G. This element corresponds to fig. 3 of t. 31 in Hedwig (1791-1792)” [G00040083].

Figure: PRICE (2005: Fig. 105), PRICE & MAIER (2011b: Fig. 2, with lectotype indicated).

Notes: The specimen identified as the holotype by Deguchi (1978: 244) was not original Hedwig material (see discussion in PRICE & MAIER 2011a).

BN: *Grimmia plagiopodia* Hedw., Sp. Musc. Frond.: 78, t. XV, f. 6-13. 1801.

CN / SY: *Grimmia plagiopodia* Hedw., Sp. Musc. Frond.: 78. 1801.

PL: (In Saxoniae rupibus detexit Cl. Flügge.).

LI: [*Grimmia plagiopus* a Hg l. n. b a Flörkio].

LT: DEGUCHI (1984: 22), holotype in G. OCHYRA & al. (2008: 271), lectotype in G, “The right specimen in the upper row on the sheet labelled ‘*Grimmia plagiopus* a Hg l. n. b a Flörkio’ – G-Hedwig-Schwägrichen” [G00000040348].

Figure: PRICE (2005: Fig. 106).

Notes: The typification of OCHYRA & al. (2008) was missed in MAIER (2010: 282) and PRICE & MAIER (2011a: 295).

BN: *Gymnostomum heimii* Hedw., Sp. Musc. Frond.: 32. 1801.

CN / SY: *Desmatodon heimii* (Hedw.) Mitt., J. Proc. Linn. Soc., Bot. 8: 28. 1864.

PL: Prope Spandau primus invenit Heim, consiliarius aulicus, Berilonensis. Circa Malchin ducatus Mecklenburgici clariss Timm; Upsaliae ad palos vetustos Ol. Swartz, (in Austria D. Host in Sudetibus Ludwig.).

LI: *Gymnostomum Heimii* Hedw. St. Cr. I.80.t. 30. [b en putis fontis in arce Upsal. c. Yarmouth] ab ipso inventore Cons. Aulico Heim acceptus.

LT: OCHYRA & al. (2008: 359), lectotype in G: “The specimen marked ‘a’ on the sheet labelled ‘*Gymnostomum Heimii* Hedw. St. Cr. I.80.t. 30. a ab ipso inventore Cons. Aulico Heim acceptus (manu Hedwig) b. ex. putis fontis in arce Upsal. c. Yarmouth. (manu Schwägrichen)’ – G-Hedwig-Schwägrichen” [G00040352].

Figure: PRICE (2005: Fig. 108.).

BN: *Gymnostomum ovatum* Hedw., Sp. Musc. Frond.: 31. 1801.

CN / SY: *Pterygoneurum ovatum* (Hedw.) Dixon, Rev. Bryol. Lichénol. 6: 96. 1934.

PL: In muris argillaceis circa Lipsiam aliisque regionibus frequens.

LI: *Gymnostomum ovatum* Hedw. Crypt. 1, 15, 6.

LT: GUERRA & al. (1995: 166-167), lectotype in G, “In muris argillaceis circa Lipsiam. – En el herbario Hedwig-Schwägrichen en G existe una muestra de *P. ovatum* (sub *Gymnostomum ovatum* Hedw.) con una etiqueta manuscrita por Hedwig en los términos anteriores que podría corresponder con parte del material original que se utilizó para la descripción (Lectótipo: G!)”. [G00040267].

Figure: PRICE (2005: Fig. 111).

Notes: The typification of GUERRA & al. (1995) was inadvertently omitted in PRICE (2005).

BN: *Gymnostomum pennatum* Hedw., Sp. Musc. Frond.: 31. 1801.

CN / SY: *Schistostega pennata* (Hedw.) F.Weber & D.Mohr, Index Mus. Pl. Crypt. 2. 1803.

PL: Ad muros septentrionales civitatis Mariaemontani in Saxonia: (in Sudetibus invenit Ludwig, Erlangae in saxo arenario S. Etiam in Hercynia, Pymont occurit teste Hoffm. flor. G. II. p. 28.) in Anglia primus invenit D. Newberg in cavitatibus aggerum sub sepibus antiquis solo pingui comitatus Devoniae. Vere sporangia matura.

LI: *Gymnostomum pennatum* Hedw. St. Cr. 1. 77. t. 29. [sub *Dicksonia pusilla* ab Erhard ad Schrebr e m. Bruch. Granite e Euchsburg (illegible symbol) d (illegible word)] Mariaemontanii in Saxonia lect. [in Gneisso].

LT: ELLIS & PRICE (2012: 20), lectotype in G, “[Germany], Saxony, Marienburg, Hedwig s.n. ‘*Gymnostomum pennatum* Hedw. St. Cr. 1. 77. t. 29. Mariaemontanii in Saxonia lect. [in Gneisso]’ (G [G00040297] [a])” [G00040297].

Figure: PRICE (2005: Fig. 112), ELLIS & PRICE (2012: Fig. 2, with lectotype indicated).

BN: *Gymnostomum pulvinatum* Hedw., Sp. Musc. Frond.: 36, t. III, f. 1-7. 1801.

CN / SY: *Gymnostomum pulvinatum* Hedw., Sp. Musc. Frond.: 36, t. III, f. 1-7. 1801.

PL: Ad pagum Reinhausen, prope Goettingam, legit misitque Hoffmann et Persoon.

LT: OCHYRA (1989a: 91), lectotype in LE-Mertens. See OCHYRA (1989 a, b) for discussion on this name and associated specimens. The details on the location of the lectotype material were inadvertently omitted in PRICE (2005).

BN: *Leskea caespitosa* Hedw., Sp. Musc. Frond.: 233, t. XLIX, f. 1-5. 1801.

CN / SY: *Acroporium caespitosum* (Hedw.) Buck, Brittonia 23: 310. 1983.

PL: Hispaniola, in ligno putrefacto.

LI: *Leskea caespitosa* Hedw. Sp. Musc. 233 t. 49, f. 1-5. *Hypnum caespitosum* Swartz Prodr. p. 142. [b. ad tr. arb. (illegible word) antiqua pr Mandioia Brasil Beyrich] Hispanolae lecta et accepta ab ipso O. Swartz.

LT: BUCK (1983: 309), lectotype in G. [G00040303].

Figure: PRICE (2005: Fig. 198).

Note: The typification of BUCK (1983) was inadvertently omitted in PRICE (2005).

BN: *Leskea mollis* Hedw., Sp. Musc. Frond.: 234. 1801.

CN / SY: *Weymouthia mollis* (Hedw.) Broth., Nat. Pflanzenfam. I(3): 812. 1906.

PL: Habitat in nova Seelandia.

LI: *Leskea mollis* St. Cr. IV. P. 103. t. 40. Aus Neu Holland, im.

LT: TANGNEY (2010: 147), lectotype in G, “Herb. Hedwig, New Zealand, St. Cr. IV. p. 103. t. 40 (G)”. [G00040342].

Figure: PRICE (2005: Fig. 210).

BN: *Meesia uliginosa* Hedw., Sp. Musc. Frond.: 173. 1801.

CN / SY: *Meesia uliginosa* Hedw., Sp. Musc. Frond.: 173. 1801.

PL: In pratis turfosis paludosis Hassiae, Saxoniae, aliisque Germaniae locis, in rupibus alpestribus calcareis Austriae vulgaris.

LI: *Meesia uliginosa* Hedw. Cryptog. p. 1. t. 1, f. 1-2. *Bryum trichodes* Linn. [b. *angustifolia* alp Helvet. c. *longirostris* Brid. ms d. *stricto* a. Bridel alp Carinth.].

LT: OCHYRA & LEWIS-SMITH (1999: 6), syntypes in G. OCHYRA & al. (2008: 492), lectotype in G, “the specimen glued to the sheet and marked ‘a’ bearing the label ‘*Meesia uliginosa* Hedw. Cryptog. p. 1. t. 1, f. 1-2. *Bryum trichodes* Linn. {manu Hedwig} b. *angustifolia* alp Helvet. c. *longirostris* Brid. Mt. d. *stricta* a. Bridel alp Carinth {manu Schwägrichen} – G-Hedwig-Schwägrichen”. [G00040192].

Figure: PRICE (2005: Fig. 231).

BN: *Mnium chrysocomum* Hedw., Sp. Musc. Frond.: 74. 1801.

CN / SY: *Breutelia chrysocoma* (Hedw.) Lindb., Öfvers. Förh. Kongl. Svenska Vetensk.-Akad. 20: 389. 1863.

PL: Locus in paludosis Scotiae, Cambriae, Angliae.

LI: [Bartramia arcuata a. Turn b. ins Bourbon Taylor].

LT: PRICE & ELLIS (2011: 314), lectotype in G, “[British Isles] sin. coll., s.n. (Hb. Hedwig-Schwägrichen ex Hb. Turner, G [G00040056]), the first specimen on the left of the herbarium sheet (Specimen 1 [‘a’])”. [G00040056].

Figure: PRICE (2005: Fig. 233), PRICE & ELLIS (2011: Fig. 1, with lectotype indicated).

BN: *Mnium crudum* Hedw., Sp. Musc. Frond.: 189. 1801.

CN / SY: *Pohlia cruda* (Hedw.) Lindb., Musci Scand. 18. 1879.

PL: Locis udis, montosis ad saxa in Germania passim.

LI: *Bryum pendulum* hornum molle foliis et lanceolatis et gramineis Dill. H. M. 401. t. 51, f. 70 *Mnium crudum* antheris pendulis calyptra recurvata foliis pellucidis Linn. Spec. pl. 2. p. 1576. n-ii.

LT: OCHYRA & al. (2008: 440), lectotype in G, “the first right specimen on the sheet bearing the label ‘*Bryum pendulum* hornum molle foliis et lanceolatis et gramineis Dill. H. M. 401. t. 51, f. 70 *Mnium crudum* antheris pendulis calyptra recurvata foliis pellucidis Linn. Spec. pl. 2. p. 1576. n-ii’ – G – Hedwig/Schwägrichen” [G00040361].

Figure: PRICE (2005: Fig. 234).

BN: *Mnium pseudotriquetrum* Hedw., Sp. Musc. Frond.: 190. 1801.

CN / SY: *Bryum pseudotriquetrum* (Hedw.) P. Gaertn., B. Mey. & Scherb., Oekon. Fl. Wetterau 3: 102. 1802.

PL: Locis apricis udis paludosis Europae.

LI: Duby -Boissier Herbarium: “*Meesia longiseta* Hostio Austr 94. Br. pstriq. Simile *Timmiae austriacae*, f differt. Foliio supremis ovatis, l ovatolanciolatus margine revolutis, quae integra videntur, (illegible word) conduplicatus, caulinis per id, quod margine valde revolutus lanceolatis (illegible word) deest (illegible word) basis. Habet aliquum similitudineum cum br. pedunci (illegible word, illegible symbol) rigidi distinguent”.

LT: DEMARET & EMPAIN (1985: 276), lectotype in G “échantillon envoyé par Host (Autriche) en 1799 à Schwägrichen ou à Hedwig...”, clarified in OCHYRA & al. (2008: 472), lectotype in G, “Herb. Duby. junct. Herb. Boissier 1886. Br. ptrq. *Meesia longiseta* Hostio ovalotanceolatis maegine revolutis, quae... Sub nomine *Meesiae longisetae* misit Host (austriacus) AD 1799 ad Schwägrichen vel ad Hedwigium. *Bryum pseudotriquetrum* Hedw. Paris Index bryologicus, p. 201 – G – Hedwig/Schwägrichen”. [G00040366].

Figure: PRICE (2005: Fig. 241).

Note: The original typification of DEMARET & EMPAIN (1985) was inadvertently omitted in PRICE (2005).

BN: *Mnium tetragonum* Hedw., Sp. Musc. Frond.: 73. 1801.

CN / SY: *Conostomum tetragonum* (Hedw.) Lindb., Öfvers. Förh. Kongl. Svenska Vetensk.-Akad. 20: 392. 1863.

PL: none.

LI: [*Conostomum boreale* a pita e Suec. Sw. b. e Groenland c. ex Angl. Turner.]

LT: FRAHM & al. (1996: 106), “in albis scoticis, Ben Lomond, Dickson s.n. (holotypus BM [BM000079531])”.

Note: The typification of FRAHM & al. (1996) was inadvertently omitted in PRICE (2005). The Hedwig herbarium sheet present in G [G00040081] and depicted in PRICE (2005: Fig. 246), annotated “*Conostomum boreale*” contains potential type material for Swartz’s *Conostomum boreale* Sw. that was described in 1806.

BN: *Polytrichum alpinum* Hedw., Sp. Musc. Frond.: 92, t. XIX, f. 2, b. 1801.

CN / SY: *Polytrichastrum alpinum* (Hedw.) G.L.Sm., Mem. New York Bot. Gard. 21: 37. 1971.

PL: Habitat in albis Scotiacis, Scandinavicis, Tyrolensibus, Helveticis, in Sudetibus, Bructero Hercyniae etc.

LI: [*Polytrichum alpinum* e. Bruct. b. ambiguum a Rich.].

LT: OCHYRA & al. (2008: 94), lectotype in G, “The central specimen in the upper row with four mature capsules on the sheet labelled ‘*Polytrichum alpinum* e. Bruct.’ – G-Hedwig-Schwägrichen”. [G00040254].

Figure: Price (2005: Fig. 283).

BN: *Polytrichum juniperinum* Hedw., Sp. Musc. Frond.: 89, t. XVIII, f. 6-10. 1801.

CN / SY: *Polytrichum juniperinum* Hedw., Sp. Musc. Frond.: 89. 1801.

PL: Locus montosus, subalpestris, delineata exempla ex Helvetia.

LI: [*Polytrichum juniperinum* b. canescens Rich. (illegible word) c. in muris Lantz.].

LT: OCHYRA & al. (2008: 105), lectotype [icon in] Hedwig (1801: Pl. 18. figs. 6-10), epitype “E. Bauer: Musci Europaei Exsiccati No. 1549b: *Polytrichum juniperinum* Willd., c.fr. Et. Masc. Voralberg: Bregenz, linker oberer Rand des Schliefer-tobers auf trockenen Waldboden, 550 m s.m. 6. Mai 1916 legit Joseph Blumrich – KRAM”.

BN: *Polytrichum piliferum* Hedw., Sp. Musc. Frond.: 90. 1801.

CN / SY: *Polytrichum piliferum* Hedw., Sp. Musc. Frond.: 90. 1801.

PL: Locis editoribus siccioribus, in ericetis, muris argillaceis. Lipsiae ad Bieniz, Sct. Theclae, in muris pagorum, Schoenfeld. etc.

LI: [*Polytrichum piliferum* d. a Richard b. Schleich. c. Duval c alp Brid. c. Mandon R. subrigidi fol].

LT: OCHYRA & al. (2008: 101), lectotype [icon in] Dillenius (1741, Pl. 54, Fig. 3), epitype “E. Bauer: Musci Europaei Exsiccati No. 1199: Polytrichum piliferum Schreb., fr. Frankreich: Le Harve, Wald von Montgeon, April 1905 legit I. The-riot – KRAM”.

BN: *Tetraphis pellucida* Hedw., Sp. Musc. Frond.: 45, t. VII, f. 1, 1 a-f. 1801.

CN / SY: *Tetraphis pellucida* Hedw., Sp. Musc. Frond.: 45. 1801.

PL: Locis umbrosis udis, truncos deiectos putrescentes, praecipue montosarum regionum.

LI: Mnium pellucidum caule simplici foliis ovatis Linn. Spec. plant. 2. p. 1574. n.1. Mnium serpilli foliis tenuibus pellucidis Dill. Hist. Musc 232. t. 31, f. 2. Tetraphis pellucida Spec. Musc. p. t, f.

LT: PRICE (2010: 16), lectotype in G, “s.loc., s.d., s.coll. (G! [G00040314])”, “The second stem from the left in the group of specimens located at the top left (upper row) of the herbarium sheet [G00040314]”. [G00040314], syntype in G [G0004315].

Figure: PRICE (2005: Fig. 320), PRICE (2010: Fig. 2), with lectotype indicated.

BN: *Tortula tortuosa* Hedw., Sp. Musc. Frond.: 124. 1801.

CN / SY: *Tortella tortuosa* (Hedw.) Limpr., Die Laubm. Deutschl. 1: 604. 1888.

PL: In montibus Pedemontii, Helvetiae, Galliae, Scotiae, Sueciae, Thuringiae, Hercyniae, in silvis arenosis Palatinatus, in rupibus calcareis Franconiae, Austriae, nec non in Virginia.

LI: [Barbula tortuosa a. J. Hedwig. b. alpes Carinth Horns. c. Ol. Swartz. c. George’s Sound Menzies. d. Cap b. Sp. Menz. e. Dicranum flexifol. Hook a Menz. Cap. b-Sp, f. Cap. b. Sp. Mz.].

LT: ELLIS & PRICE (2013b: 219), lectotype in G, “*Hedwig s.n.* G [G00040331], top row of specimens on sheet (plants 1-5). [G00040331].

Figure: PRICE (2005: Fig. 326), ELLIS & PRICE (2013b: Fig. 1, with lectotype indicated).

BN: *Trichostomum fasciculare* Hedw., Sp. Musc. Frond.: 110. 1801.

CN / SY: *Racomitrium fasciculare* (Hedw.) Brid., Muscol. Recent. Suppl. 4: 80. 1819 [1818].

PL: Habitat ad saxa in Bructero, Achtermannshoehe aliisque Hercyniae montibus.

LI: Duby-Boissier herbarium: “Trichost. fasciculare e rupibus Bruct Schw” In another hand ‘Ex. Herb. Schwaegrichen’.

LT: BEDNAREK-OCHYRA & OCHYRA (2005: 1070), lectotype “[icon in] Dillenius (1741) f. 28 on pl. 47”; epitype, the second specimen from the left on the sheet labelled “28. Rhacomitrium fasciculare 1892. N. 28. Bryum hypnoides, hirsutie virescens, fasciculare, alpinum Hist. Musc. p. 370. N. 28” (OXF-Dillenius).

BN: *Trichostomum lanuginosum* Hedw., Sp. Musc. Frond.: 109. 1801.

CN / SY: *Racomitrium lanuginosum* (Hedw.) Brid., Muscol. Recent. Suppl. 4: 79. 1819 [1818].

PL: Montana, arida, arenosa, lapidosa loca; (maxime in frustis granitis montium subalpinorum, Bructeri, Sudetum.).

LI: *Trichostomum lanuginosum* Hedw. St. Cr. Vol. III. p. 3. t. 2.

LT: FRISVOLL (1986: 83), lectotype in G, clarified in OCHYRA & al. (2008: 289), lectotype in G, “the left specimen on the sheet labelled ‘Trichostomum lanuginosum Hedw. St. Cr. Vol. III. p. 3. t. 2.’ corresponding to fig. 2 on table 2 in Hedwig (1792) – G-Hedwig/Schwäglichen”. [G00040358].

Figure: Fig. 333.

Note: see PRICE & MAIER (2011a) under this taxon for information on the original typification.

BN: *Webera nutans* Hedw., Sp. Musc. Frond.: 168. 1801.

CN / SY: *Pohlia nutans* (Hedw.) Lindb., Musci Scand. 18. 1879.

PL: Locis siccioribus, sterilibus, arenosis, apertis et umbrosis gregatim, nec non in uliginosis turfosis sparsim in omni Germania frequens; solo pingui rarior.

LI: *Webera nutans* Hedw. St. Cr. 1. 9. t. 4. [b a Richardson (two illegible words). Pleurique caulis simplices quidam (illegible word) alterne rammo versus apices contin.] Specimina Lipsiae im Universitaetsholz inter Sphagn. palustre lecta.

LT: OCHYRA & al. (2008: 444), lectotype [icon] Dillenius (1741: Pl. 50, Fig. 61, of *Bryum trichodes laete virens, capitulis cernis oblongis*), epitype “Böhmen: isergebirge, Raspenau, an einen Ealdwege beim Eisenbahndurchlasse, 360 m s.m., 18. Juli 1911 legit Jos. Blumrich’ (E. Bauer, *Musci europaei exsiccati* No. 909) – KRAM, isoepitypes: BM, FH, G, NY, PC and apparently in many other herbaria to which these exsiccati were distributed (fide SAYRE, 1971)”.

BN: *Webera pyriformis* Hedw., Sp. Musc. Frond.: 169. 1801.

CN / SY: *Leptobryum pyriforme* (Hedw.) Wilson, Bryol. Brit. 219. 1855.

PL: Locis lapidosis, sabulosis, subhumidis, in Germania.

LI: *Webera pyriformis* Hedw. St. Cr.1. p. 5. t. 3. Bryum Dill. H. M. 60. *Mnium pyriforme* Linn. Chemnitzii partim, partim Lipsiae lecta.

LT: OCHYRA & al. (2008: 419), lectotype in G, “the upper left specimen on the sheet bearing the label, ‘*Webera pyriformis* Hedw. St. Cr.1. p. 5. t. 3. Bryum Dill. H. M. 60. *Mnium pyriforme* Linn. Chemnitzii partim, partim Lipsiae lecta.’ – G-Hedwig/Schwägrichen” [G00040363].

Figure: PRICE (2005: Fig. 339).

BN: *Weissia crispula* Hedw., Sp. Musc. Frond.: 68, t. XII, f. 1-6. 1801.

CN / SY: *Dicranoweisia crispula* (Hedw.) Milde, Bryol. Siles. 49. 1869.

PL: Fagimonti (Buchberg) in Bohemia legit Ludwig.

LI: *Weissia crispula* Sp. Musc. p. 58. t. 12, f. 1. 2.-6. Fagimonti (Buchberg) in Bohemia Ludw.

LT: OCHYRA & al. (2008: 210), lectotype in G, “the second specimen from the left on a sheet labelled ‘*Weissia crispula* Sp. Musc. p. 58. t. 12, f. 1. 2.-6. Fagimonti (Buchberg) in Bohemia Ludw.’ – G-Hedwig-Schwägrichen”. [G00040106].

Figure: PRICE (2005: Fig. 345).

BN: *Weissia heteromalla* Hedw., Sp. Musc. Frond.: 71. 1801.

CN / SY: *Ditrichum heteromallum* (Hedw.) E. Britton, N. Amer. Fl. 15: 64. 1913.

PL: In montanis Saxoniae silvis, ad vias cavas, udas et earum orbitas pofundiores [sic]. (In Hercynia, Sudetibus, Austria.).

LT: OCHYRA & LEWIS-SMITH (1998: 35), no material suitable for typification present in G. OCHYRA & al. (2008: 139), lectotype [icon] Hedwig (1787: t. VIII), epitype, “a. Kopsch: Bryotheca Saxonica. No. 13. *Ditrichum homomallum* (Hedw.) Hpe. Erzgebirge: an Waldrändern bei Oberwiesenthal. 2.II.1919. leg. Alfr. Kopsch – KRAM”.

BN: *Weissia recurvirostris* Hedw., Sp. Musc. Frond.: 71. 1801.

CN / SY: *Bryoerythrophyllum recurvirostrum* (Hedw.) P. C. Chen, Hedwigia 80: 5. 1941.

PL: Locis lapidosis sabulosis.

LI: Duby-Boissier herbarium: “*Grimmia recurvirostra* Gottingae Herb. Schwaegrichen”.

LT: OCHYRA & al. (2008: 329), lectotype [icon in] Hedwig (1785-1787: t. 7), epitype “[Deutschland] Kgr. Saschen: Am Elbufer bei Königstein, etwa 120 m.s.m., 26 Sept. 1905 legit W. Kreiger’ (E. Bauer, Musci europaei exsiccate Mo. 273) – KRAM; isoepitypes: BM, FH, G, NY, PC”.

Acknowledgments

This work was supported by the Conservatoire et Jardin botaniques de la Ville de Genève (CJBG). The staff of the CJBG library are acknowledged for their help in facilitating access to the literature necessary for this work. Patrick Perret, Head Librarian, provided help with nomenclatural issues. I would also like to thank Camille Agier for translating the French résumé, Eva Maier for her help in interpreting the labels in the Hedwig-Schwägrichen collection and for her comments on an earlier version of this manuscript. I acknowledge the fruitful collaboration with Mr. Len Ellis (Natural History Museum, London) on typifications of certain groups of Hedwig mosses and thank him for corrections to an earlier version of this article. I thank also Drs. María J. Cano and Paulo E. A. S. Câmara for their work on the *Pottiaceae* and *Sematophyllaceae* types, respectively, in the Hedwig-Schwägrichen collection in G.

References

- BEDNAREK-OCHYRA, H. & R. OCHYRA (2005). Typification of *Codriophus fascicularis* (Grimmiaceae). *Taxon* 54: 1065-1074.
- BUCK, W. R. (1983). Nomenclatural and taxonomic notes on West Indian *Sematophyllaceae*. *Brittonia* 35: 309-311.
- BURLEY, J. S. & N. M. PRITCHARD (1990). Revision of the genus *Ceratodon* (Bryophyta). *Harvard Pap. Bot.* 2: 17-76.
- BREMER, B. (1980b). A taxonomic revision of *Schistidium* (Grimmiaceae, Bryophyta) 1. *Lindbergia* 6: 1-16.
- DEGUCHI, H. (1984). Studies on some Patagonian species of Grimmiaceae (Musci, Bryophyta). In: INOUE, H. (ed.), *Studies of cryptogams in Southern Chile*: 17-72. Kensei-sha, Tokyo.
- DEMARET, F. & A. EMPAIN (1985). *Bryum pseudotriquetrum* (Hedw.) Gaert., Meyer & Scherb. et sa variété binum (Schreb.) Lilj. *Bull. Jard. Bot. Natl. Belg.* 55: 275-290.
- EDERRA, A. (2006). Lectotypification of the names of three moss species described by Hedwig. *Taxon* 55: 791-793.
- ELLIS, L. T. & M. J. PRICE (2012). Typification of *Schistostegia pennata* (Hedw.) F. Weber & D. Mohr (Schistostegaceae). *J. Bryol.* 34: 17-21.
- ELLIS, L. T. & M. J. PRICE (2013a). Review of the type specimens for Hedwig’s species of *Dicranella* (Dicranaceae). *J. Bryol.* 35: 275-289.
- ELLIS, L. T. & M. J. PRICE (2013b). A lectotype for *Tortella tortuosa* (Hedw.) Limpr. (Pottiaceae). *J. Bryol.* 35: 216-219.
- FLORSCHÜTZ, P. A. (1960). Introduction to Hedwig’s ‘Species Muscorum’. In: FLORSCHÜTZ, P. A. (ed.), *Facsimile edition to J. Hedwig’s Species Muscorum Frondosorum*: v-xxii. Weinheim.

- FRAHM, J.-P., H. BÖRNER, N. STREIBER, B. WALLAU & S. WEITKUS (1996). Revision der Gattung Conostomum (Musci, Bartramiaceae). *Trop. Bryol.* 12: 97-114.
- FRAHM, J.-P. & P. ISOVIITA (1988). Type revision of European mosses 2. Atractylocarpus, Campylopus and Paraleucobryum. *Lindbergia* 14: 89-96.
- FRAHM, J.-P., T. KLÖCKER, R. SCHMIDT & C. SCHÖTER (2000). Revision der Gattung Amphidium (Musci, Dicranaceae). *Trop. Bryol.* 18: 173-184.
- FRISVOLL, A. A. (1986). Lectotypification of Racomitrium lanuginosum (Hedw.) Brid. *Lindbergia* 12: 83-86.
- GEISSLER, P. (2000). The Hedwig herbarium and its importance for the nomenclature of mosses. *Nova Hedwigia* 70: 15-23.
- GEISSLER, P. & E. MAIER (1995). Lectotypifications of Central European Grimmiaceae species (Musci, Grimmiaceae). *Candollea* 50: 495-514.
- GUERRA, J., M. J. CANO & R. M. ROS (1995). El género Pterygoneurum Jur. (Pottiaceae, Musci) en la Península Ibérica. *Cryptog. Bryol. Lichénol.* 16: 165-175.
- HEDWIG, J. (1801). *Species muscorum frondosorum descriptae et tabulis aeneis lxxvii coloratis illustratae*. Lipsiae [Leipzig].
- MAIER, E. (2010). The genus Grimmiaceae Hedw. (Grimmiaceae, Bryophyta): a morphological-anatomical study. *Boissiera* 63.
- OCHYRA, R. (1989a). Lectotypification of Schistidium pulvinatum (Hedw.) Brid. (Musci: Grimmiaceae) and its consequences. *Nova Hedwigia* 48: 85-106.
- OCHYRA, R. (1989b). Proposal to conserve Schistidium (Musci, Grimmiaceae) with a new type. *Taxon* 38: 665-669.
- OCHYRA, R. & R. I. LEWIS-SMITH (1999). Meesia uliginosa Hedw. (Musci, Meesiaceae), in Antarctica. *Cryptog. Bryol.* 20: 5-10.
- OCHYRA, R., R. I. LEWIS SMITH & H. BEDNAREK-OCHYRA (2008). *The illustrated moss flora of Antarctica*. Cambridge University Press.
- PRICE, M. J. (2005). Catalogue of the Hedwig-Schwägrichen herbarium (G): I. List of type material and a review of typifications for the Hedwig moss names. *Boissiera* 61.
- PRICE, M. J. (2010). Lectotypification of the name Tetraxis pellucida Hedw. (Bryophyta). *Candollea* 65: 15-19.
- PRICE, M. J. (2012). Correction of the typification of Dicranum longifolium Hedw. (= Paraleucobryum longifolium (Hedw.) Loeske), Dicranaceae. *J. Bryol.* 34: 300-302.
- PRICE, M. J. & L. T. ELLIS (2011). A lectotype for Breutelia chrysocoma (Hedw.) Lindb., (Bryophyta; Bartramiaceae). *J. Bryol.* 33: 308-315.
- PRICE, M. J. & E. MAIER (2011a). Catalogue of the bryophyte types in G: the Grimmiaceae. *Candollea* 66: 285-309.
- PRICE, M. J. & E. MAIER (2011b). Lectotypification of the moss name Grimmiaceae Hedw. [= Coscinodon cribrus (Hedw.) Spruce] (Grimmiaceae). *Bryologist* 114: 790-795.
- SAYRE, G. (1971). Cryptogamae exsiccatae—an annotated bibliography of published exsiccatae of Algae, Lichenes, Hepaticae, and Musci. Bryophyta. *Mem. New York Bot. Gard.* 19: 175-276.
- TANGNEY, R. S. (2010). Lectotypification of Leskea mollis Hedw. *J. Bryol.* 32: 147-149.
- WILBRAHAM, J. & M. J. PRICE (2013). A lectotype for Macromitrium cirrosus (Hedw.) Brid. (Orthotrichaceae). *J. Bryol.* 35: 119-122.
- ZANDER, R. H. (1978). New combinations in Didymodon (Musci) and a key to the taxa of North America north of Mexico. *Phytologia* 41: 11-32.

Appendix 1. – The G barcodes for the Hedwig type specimens in G that are presented in the “Catalogue of the Hedwig-Schwägrichen Herbarium (Part 1)” (PRICE, 2005). The records are listed alphabetically by basionym with the corresponding G barcode and figure number from PRICE (2005).

<i>Andreaea alpina</i>	G00040015	Fig. 4	<i>Dicranum falcatum</i>	G00040173	Fig. 54
<i>Andreaea rupestris</i>	G00040016	Fig. 5	<i>Dicranum flagellare</i>	G00040208	Fig. 55
<i>Anictangium aquaticum</i>	G00040078	Fig. 6	<i>Dicranum flexuosum</i>	G00040073	Fig. 56
<i>Anictangium ciliatum</i>	G00040149	Fig. 7	<i>Dicranum glaucum</i>	G00040184	Fig. 57
<i>Anictangium cirrosum</i>	G00040187	Fig. 8	<i>Dicranum heteromallum</i>	G00040099	Fig. 58
<i>Anictangium lapponicum</i>	G00040003	Fig. 9	<i>Dicranum intermedium</i>	G00040076	Fig. 59
<i>Anictangium setosum</i>	G00040093	Fig. 10	<i>Dicranum interruptum</i>	G00040100	Fig. 60
<i>Arrhenopterum heterostichum</i>	G00040031	Fig. 11	<i>Dicranum introflexum</i>	G00040356	Fig. 61
<i>Barbula acuminata</i>	G00040033	Fig. 12	<i>Dicranum latifolium</i>	G00040357	Fig. 62
<i>Barbula agraria</i>	G00040034	Fig. 13	<i>Dicranum longifolium</i>	G00040217	Fig. 63
<i>Barbula apiculata</i>	G00040040	Fig. 14	<i>Dicranum montanum</i>	G00040209	Fig. 64
<i>Barbula convoluta</i>	G00040035	Fig. 15	<i>Dicranum orthocarpum</i>	G00040101	Fig. 65
<i>Barbula convoluta</i>	G00040036	Fig. 16	<i>Dicranum ovale</i>	G00040349	Fig. 66
<i>Barbula convoluta</i>	G00040037	Fig. 17	<i>Dicranum pellucidum</i>	G00040095	Fig. 67
<i>Barbula curta</i>	G00040117	Fig. 18	<i>Dicranum pellucidum</i>	G00040096	Fig. 68
<i>Barbula fallax</i>	G00040367	Fig. 19	<i>Dicranum pellucidum</i>	G00040368	Fig. 69
<i>Barbula humilis</i>	G00040332	Fig. 20	<i>Dicranum purpurascens</i>	G00040077	Fig. 70
<i>Barbula lanceolata</i>	G00040041	Fig. 21	<i>Dicranum purpureum</i>	G00040075	Fig. 71
<i>Barbula rigida</i>	G00040008	Fig. 22	<i>Dicranum pusillum</i>	G00040098	Fig. 72
<i>Barbula rigida</i>	G00040009	Fig. 23	<i>Dicranum schreberianum</i>	G00040018	Fig. 73
<i>Barbula ruralis</i>	G00040334	Fig. 24	<i>Dicranum scoparium</i>	G00040107	Fig. 74
<i>Barbula stricta</i>	G00040038	Fig. 25	<i>Dicranum spurium</i>	G00040108	Fig. 75
<i>Barbula unguiculata</i>	G00040039	Fig. 26	<i>Dicranum subulatum</i>	G00040102	Fig. 76
<i>Bartramia halleriana</i>	G00040042	Fig. 27	<i>Dicranum varium</i>	G00040364	Fig. 77
<i>Bartramia pomiformis</i>	G00040043	Fig. 28	<i>Dicranum xanthodon</i>	G00040341	Fig. 78
<i>Bryum androgynum</i>	G00040030	Fig. 29	<i>Didymodon homomallum</i>	G00040113	Fig. 79
<i>Bryum argenteum</i>	G00040059	Fig. 30	<i>Didymodon pusillum</i>	G00040115	Fig. 80
<i>Bryum argenteum</i>	G00040370	Fig. 31	<i>Didymodon rigidulum</i>	G00040006	Fig. 81
<i>Bryum caespiticium</i>	G00040060	Fig. 32	<i>Encalypta ciliata</i>	G00040120	Fig. 82
<i>Bryum capillare</i>	G00040061	Fig. 33	<i>Encalypta lanceolata</i>	G00040258	Fig. 83
<i>Bryum delicatulum</i>	G00040253	Fig. 34	<i>Fissidens adianthoides</i>	G00040130	Fig. 84
<i>Bryum dichotomum</i>	G00040365	Fig. 35	<i>Fissidens asplenioides</i>	G00040131	Fig. 85
<i>Bryum macrocarpum</i>	G00040179	Fig. 36	<i>Fissidens bryoides</i>	G00040133	Fig. 86
<i>Bryum pulchellum</i>	G00040260	Fig. 37	<i>Fissidens osmundioides</i>	G00040134	Fig. 87
<i>Bryum squarrosum</i>	G00040216	Fig. 38	<i>Fissidens palmatus</i>	G00040135	Fig. 88
<i>Bryum zierii</i>	G00040234	Fig. 39	<i>Fissidens polycarpus</i>	G00040091	Fig. 89
<i>Buxbaumia aphylla</i>	G00040065	Fig. 40	<i>Fissidens polypodioides</i>	G00040136	Fig. 90
<i>Buxbaumia foliosa</i>	G00040110	Fig. 41	<i>Fissidens pulvinatus</i>	G00040350	Fig. 91
<i>Cynontodium capillaceum</i>	G00040111	Fig. 42	<i>Fissidens pulvinatus var. africanus</i>	G00040351	Fig. 92
<i>Cynontodium cernuum</i>	G00040064	Fig. 43	<i>Fissidens sciuroides</i>	G00040186	Fig. 93
<i>Cynontodium inclinatum</i>	G00040112	Fig. 44	<i>Fissidens semicompletus</i>	G00040137	Fig. 94
<i>Cynontodium trifarium</i>	G00040293	Fig. 45	<i>Fissidens strumifer</i>	G00040092	Fig. 95
<i>Dicranum aciculare</i>	G00040271	Fig. 46	<i>Fissidens subbasilaris</i>	G00040139	Fig. 96
<i>Dicranum ambiguum</i>	G00040337	Fig. 47	<i>Fissidens taxifolius</i>	G00040138	Fig. 97
<i>Dicranum celsii</i>	G00040346	Fig. 48	<i>Fontinalis antipyretica</i>	G00040140	Fig. 98
<i>Dicranum cerviculatum</i>	G00040097	Fig. 49	<i>Fontinalis falcata</i>	G00040094	Fig. 99
<i>Dicranum condensatum</i>	G00040109	Fig. 50	<i>Fontinalis squamosa</i>	G00040141	Fig. 100
<i>Dicranum crispum</i>	G00040017	Fig. 51	<i>Funaria hygrometrica</i>	G00040143	Fig. 101
<i>Dicranum curvatum</i>	G00040103	Fig. 52	<i>Funaria hygrometrica</i>	G00040144	Fig. 102
<i>Dicranum cygneum</i>	G00040072	Fig. 53	<i>Grimmia alpicola</i>	G00040295	Fig. 103

Appendix 1. – Cont.

<i>Grimmia apocarpa</i>	G00040296	Fig. 104	<i>Hypnum myosuroides</i>	G00040172	Fig. 154
<i>Grimmia cribrosa</i>	G00040083	Fig. 105	<i>Hypnum nigrescens</i>	G00040195	Fig. 155
<i>Grimmia plagiopodia</i>	G00040348	Fig. 106	<i>Hypnum nitens</i>	G00040330	Fig. 156
<i>Grimmia recurvata</i>	G00040302	Fig. 107	<i>Hypnum patulum</i>	G00040194	Fig. 157
<i>Gymnostomum heimii</i>	G00040352	Fig. 108	<i>Hypnum piliferum</i>	G00040080	Fig. 158
<i>Gymnostomum japonicum</i>	G00040227	Fig. 109	<i>Hypnum plumosum</i>	G00048267	Fig. 159
<i>Gymnostomum obtusum</i>	G00040146	Fig. 110	<i>Hypnum polymorphum</i>	G00040070	Fig. 160
<i>Gymnostomum ovatum</i>	G00040267	Fig. 111	<i>Hypnum polytrichoides</i>	G00040176	Fig. 161
<i>Gymnostomum pennatum</i>	G00040297	Fig. 112	<i>Hypnum populeum</i>	G00040053	Fig. 162
<i>Gymnostomum prorepens</i>	G00040002	Fig. 113	<i>Hypnum praecox</i>	G00040128	Fig. 163
<i>Gymnostomum recurvirostrum</i>	G00040165	Fig. 114	<i>Hypnum praelongum</i>	G00040214	Fig. 164
<i>Gymnostomum tenue</i>	G00040146	Fig. 115	<i>Hypnum pulchellum</i>	G00040127	Fig. 165
<i>Gymnostomum truncatum</i>	G00048282	Fig. 116	<i>Hypnum pungens</i>	G00040007	Fig. 166
<i>Hypnum abbreviatum</i>	G00040286	Fig. 117	<i>Hypnum purum</i>	G00040263	Fig. 167
<i>Hypnum abietinum</i>	G00040005	Fig. 118	<i>Hypnum recognitum</i>	G00040325	Fig. 168
<i>Hypnum adnatum</i>	G00040159	Fig. 119	<i>Hypnum reptans</i>	G00040196	Fig. 169
<i>Hypnum aduncum</i>	G00040118	Fig. 120	<i>Hypnum riparioides</i>	G00040242	Fig. 170
<i>Hypnum albicans</i>	G00040051	Fig. 121	<i>Hypnum riparium</i>	G00040177	Fig. 171
<i>Hypnum alopecurum</i>	G00040321	Fig. 122	<i>Hypnum rugosum</i>	G00040291	Fig. 172
<i>Hypnum amoenum</i>	G00040279	Fig. 123	<i>Hypnum rutabulum</i>	G00040052	Fig. 173
<i>Hypnum amoenum</i>	G00040280	Fig. 124	<i>Hypnum scorpioides</i>	G00040299	Fig. 174
<i>Hypnum clavellatum</i>	G00040369	Fig. 125	<i>Hypnum serpens</i>	G00040011	Fig. 175
<i>Hypnum commutatum</i>	G00040085	Fig. 126	<i>Hypnum serrulatum</i>	G00040287	Fig. 176
<i>Hypnum congestum</i>	G00040215	Fig. 127	<i>Hypnum spiniforme</i>	G00040270	Fig. 177
<i>Hypnum cordifolium</i>	G00040066	Fig. 128	<i>Hypnum spinulosum</i>	G00040012	Fig. 178
<i>Hypnum crista-castrensis</i>	G00040268	Fig. 129	<i>Hypnum splendens</i>	G00040163	Fig. 179
<i>Hypnum cupressiforme</i>	G00040166	Fig. 130	<i>Hypnum squarrosus</i>	G00040289	Fig. 180
<i>Hypnum curvifolium</i>	G00040167	Fig. 131	<i>Hypnum stellatum</i>	G00040071	Fig. 181
<i>Hypnum cuspidatum</i>	G00040068	Fig. 132	<i>Hypnum striatum</i>	G00040132	Fig. 182
<i>Hypnum delicatulum</i>	G00040322	Fig. 133	<i>Hypnum subsimplex</i>	G00040304	Fig. 183
<i>Hypnum densum</i>	G00040260	Fig. 134	<i>Hypnum tamariscinum</i>	G00040326	Fig. 184
<i>Hypnum denticulatum</i>	G00040240	Fig. 135	<i>Hypnum tenax</i>	G00040013	Fig. 185
<i>Hypnum diaphanum</i>	G00040175	Fig. 136	<i>Hypnum tetragonum</i>	G00040210	Fig. 186
<i>Hypnum fasciculatum</i>	G00040257	Fig. 137	<i>Hypnum tomentosum</i>	G00040277	Fig. 187
<i>Hypnum filicinum</i>	G00040086	Fig. 138	<i>Hypnum torquatum</i>	G00040298	Fig. 188
<i>Hypnum fluitans</i>	G00040119	Fig. 139	<i>Hypnum trichophyllum</i>	G00040180	Fig. 189
<i>Hypnum fluviatile</i>	G00040347	Fig. 140	<i>Hypnum triquetrum</i>	G00040290	Fig. 190
<i>Hypnum halleri</i>	G00040069	Fig. 141	<i>Hypnum umbratum</i>	G00040164	Fig. 191
<i>Hypnum hians</i>	G00040213	Fig. 142	<i>Hypnum uncinatum</i>	G00040294	Fig. 192
<i>Hypnum illecebrum</i>	G00040057	Fig. 143	<i>Hypnum undulatum</i>	G00040241	Fig. 193
<i>Hypnum imponens</i>	G00040168	Fig. 144	<i>Hypnum velutinum</i>	G00040054	Fig. 194
<i>Hypnum intricatum</i>	G00040055	Fig. 145	<i>Leskea acuminata</i>	G00040047	Fig. 195
<i>Hypnum loreum</i>	G00040288	Fig. 146	<i>Leskea albicans</i>	G00040090	Fig. 196
<i>Hypnum lucens</i>	G00040160	Fig. 147	<i>Leskea attenuata</i>	G00040019	Fig. 197
<i>Hypnum luridum</i>	G00040162	Fig. 148	<i>Leskea caespitosa</i>	G00040303	Fig. 198
<i>Hypnum lutescens</i>	G00040157	Fig. 149	<i>Leskea capillaris</i>	G00040151	Fig. 199
<i>Hypnum microphyllum</i>	G00040147	Fig. 150	<i>Leskea complanata</i>	G00040200	Fig. 200
<i>Hypnum minutulum</i>	G00040324	Fig. 151	<i>Leskea compressa</i>	G00040122	Fig. 201
<i>Hypnum molluscum</i>	G00040089	Fig. 152	<i>Leskea cristata</i>	G00116003	Fig. 202
<i>Hypnum murale</i>	G00040285	Fig. 153	<i>Leskea depressa</i>	G00043010	Fig. 353

Appendix 1. – Cont.

<i>Leskea fasciculosa</i>	G00040129	Fig. 203	<i>Neckera curtispindula</i>	G00040025	Fig. 252
<i>Leskea filiculaeformis</i>	G00040170	Fig. 204	<i>Neckera disticha</i>	G00040204	Fig. 253
<i>Leskea flexilis</i>	G00040229	Fig. 205	<i>Neckera filicina</i>	G00040233	Fig. 254
<i>Leskea glabella</i>	G00040154	Fig. 206	<i>Neckera filiformis</i>	G00040087	Fig. 255
<i>Leskea imbricatula</i>	G00040048	Fig. 207	<i>Neckera heteromalla</i>	G00040088	Fig. 256
<i>Leskea incurvata</i>	G00040262	Fig. 208	<i>Neckera hypnoides</i>	G00040228	Fig. 257
<i>Leskea involvens</i>	G00040323	Fig. 209	<i>Neckera macropoda</i>	G00040123	Fig. 258
<i>Leskea mollis</i>	G00040342	Fig. 210	<i>Neckera pennata</i>	G00040202	Fig. 259
<i>Leskea obscura</i>	G00040181	Fig. 211	<i>Neckera planifolia</i>	G00040336	Fig. 260
<i>Leskea pallescens</i>	G00040168	Fig. 212	<i>Neckera pumila</i>	G00040203	Fig. 261
<i>Leskea paludosa</i>	G00040183	Fig. 213	<i>Neckera seductrix</i>	G00040124	Fig. 262
<i>Leskea polyantha</i>	G00040269	Fig. 214	<i>Neckera undulata</i>	G00040205	Fig. 263
<i>Leskea polycarpa</i>	G00040182	Fig. 215	<i>Neckera viticulosa</i>	G00040024	Fig. 264
<i>Leskea pulchella</i>	G00040171	Fig. 216	<i>Neckera viticulosa var. minor</i>	G00040021	Fig. 265
<i>Leskea rostrata</i>	G00040023	Fig. 217	<i>Octoblepharum albidum</i>	G00040206	Fig. 266
<i>Leskea rupicola</i>	G00040049	Fig. 218	<i>Orthotrichum anomalum</i>	G00040211	Fig. 267
<i>Leskea sericea</i>	G00040158	Fig. 219	<i>Orthotrichum crispum</i>	G00040001	Fig. 268
<i>Leskea setosa</i>	G00040050	Fig. 220	<i>Orthotrichum striatum</i>	G00040212	Fig. 269
<i>Leskea subtilis</i>	G00040010	Fig. 221	<i>Phascum alternifolium</i>	G00040026	Fig. 270
<i>Leskea tamariscina</i>	G00040380	Fig. 222	<i>Phascum cohaerens</i>	G00040125	Fig. 271
<i>Leskea tamariscina</i>	G00046276	Fig. 354	<i>Phascum crispum</i>	G00040027	Fig. 272
<i>Leskea trichomanoides</i>	G00040155	Fig. 223	<i>Phascum curvicolium</i>	G00040218	Fig. 273
<i>Leskea undata</i>	G00040161	Fig. 224	<i>Phascum cuspidatum</i>	G00040219	Fig. 274
<i>Leskea varia</i>	G00040014	Fig. 225	<i>Phascum muticum</i>	G00040353	Fig. 275
<i>Meesia dealbata</i>	G00040344	Fig. 226	<i>Phascum nitidum</i>	G00040261	Fig. 276
<i>Meesia dealbata</i>	G00040345	Fig. 227	<i>Phascum patens</i>	G00040226	Fig. 277
<i>Meesia longiseta</i>	G00040188	Fig. 228	<i>Phascum piliferum</i>	G00040220	Fig. 278
<i>Meesia longiseta</i>	G00040189	Fig. 229	<i>Phascum serratum</i>	G00040126	Fig. 279
<i>Meesia longiseta</i>	G00040190	Fig. 230	<i>Phascum subulatum</i>	G00040243	Fig. 280
<i>Meesia uliginosa</i>	G00040192	Fig. 231	<i>Pohlia elongata</i>	G00040251	Fig. 281
<i>Meesia uliginosa</i>	G00040193	Fig. 232	<i>Polytrichum aloides</i>	G00040244	Fig. 282
<i>Mnium chrysocomum</i>	G00040056	Fig. 233	<i>Polytrichum alpinum</i>	G00040254	Fig. 283
<i>Mnium crudum</i>	G00040361	Fig. 234	<i>Polytrichum commune</i>	G00040355	Fig. 284
<i>Mnium cuspidatum</i>	G00040235	Fig. 235	<i>Polytrichum convolutum</i>	G00040245	Fig. 285
<i>Mnium fontanum</i>	G00040221	Fig. 236	<i>Polytrichum dendroides</i>	G00040371	Fig. 286
<i>Mnium fontanum</i>	G00040222	Fig. 237	<i>Polytrichum dendroides</i>	G00040372	Fig. 287
<i>Mnium hornum</i>	G00040197	Fig. 238	<i>Polytrichum formosum</i>	G00040374	Fig. 288
<i>Mnium marchicum</i>	G00040223	Fig. 239	<i>Polytrichum formosum</i>	G00040375	Fig. 289
<i>Mnium palustre</i>	G00040032	Fig. 240	<i>Polytrichum hercynicum</i>	G00040207	Fig. 290
<i>Mnium pseudotriquetrum</i>	G00040366	Fig. 241	<i>Polytrichum juniperinum</i>	G00040256	Fig. 291
<i>Mnium punctatum</i>	G00040281	Fig. 242	<i>Polytrichum magellanicum</i>	G00040283	Fig. 292
<i>Mnium roseum</i>	G00040283	Fig. 243	<i>Polytrichum magellanicum</i>	G00040382	Fig. 293
<i>Mnium sphaericarpon</i>	G00040224	Fig. 244	<i>Polytrichum nanum</i>	G00040247	Fig. 294
<i>Mnium stellare</i>	G00040199	Fig. 245	<i>Polytrichum norwegicum</i>	G00048290	Fig. 295
<i>Mnium tetragonum</i>	G00040081	Fig. 246	<i>Polytrichum pensilvanicum</i>	G00040248	Fig. 296
<i>Mnium turbinatum</i>	G00040063	Fig. 247	<i>Polytrichum piliferum</i>	G00040255	Fig. 297
<i>Mnium undulatum</i>	G00040237	Fig. 248	<i>Polytrichum undulatum</i>	G00040028	Fig. 298
<i>Neckera cladorrhizans</i>	G00040121	Fig. 249	<i>Polytrichum undulatum var. minus</i>	G00040029	Fig. 299
<i>Neckera composita</i>	G00040231	Fig. 250	<i>Polytrichum urnigerum</i>	G00040373	Fig. 300
<i>Neckera crispata</i>	G00040201	Fig. 251	<i>Pterigynandrum filiforme</i>	G00040264	Fig. 301

Appendix 1. – Cont.

<i>Pterigynandrum fulgens</i>	G00040225	Fig. 302	<i>Trichostomum cylindricum</i>	G00040339	Fig. 328
<i>Pterigynandrum gracile</i>	G00040265	Fig. 303	<i>Trichostomum fasciculare</i>	G00040273	Fig. 329
<i>Pterigynandrum intricatum</i>	G00040343	Fig. 304	<i>Trichostomum fontinaloides</i>	G00040079	Fig. 330
<i>Pterigynandrum julaceum</i>	G00040185	Fig. 305	<i>Trichostomum glaucescens</i>	G00040292	Fig. 331
<i>Pterigynandrum subcapillatum</i>	G00040156	Fig. 306	<i>Trichostomum heterostichum</i>	G00040274	Fig. 332
<i>Pterigynandrum trichomitrium</i>	G00040142	Fig. 307	<i>Trichostomum lanuginosum</i>	G00040358	Fig. 333
<i>Splachnum ampullaceum</i>	G00040305	Fig. 308	<i>Trichostomum microcarpon</i>	G00040276	Fig. 334
<i>Splachnum angustatum</i>	G00040316	Fig. 309	<i>Trichostomum pallidum</i>	G00040114	Fig. 335
<i>Splachnum brewerianum</i>	G00040319	Fig. 310	<i>Trichostomum tenue</i>	G00040116	Fig. 336
<i>Splachnum luteum</i>	G00040306	Fig. 311	<i>Webera longicolla</i>	G00040252	Fig. 337
<i>Splachnum mnioides</i>	G00040318	Fig. 312	<i>Webera nutans</i>	G00040360	Fig. 338
<i>Splachnum ovatum</i>	G00040310	Fig. 313	<i>Webera pyriformis</i>	G00040363	Fig. 339
<i>Splachnum rubrum</i>	G00040307	Fig. 314	<i>Weissia acuta</i>	G00040044	Fig. 340
<i>Splachnum serratum</i>	G00040313	Fig. 315	<i>Weissia calcarea</i>	G00040300	Fig. 341
<i>Splachnum sphaericum</i>	G00040308	Fig. 316	<i>Weissia calycina</i>	G00040006	Fig. 342
<i>Splachnum sphaericum</i>	G00040309	Fig. 317	<i>Weissia cirrata</i>	G00040104	Fig. 343
<i>Splachnum urceolatum</i>	G00040320	Fig. 318	<i>Weissia cirrata</i>	G00040105	Fig. 344
<i>Splachnum vasculosum</i>	G00040311	Fig. 319	<i>Weissia crispula</i>	G00040106	Fig. 345
<i>Tetraphis pellucida</i>	G00040314	Fig. 320	<i>Weissia fugax</i>	G00040278	Fig. 346
<i>Tetraphis pellucida</i>	G00040315	Fig. 321	<i>Weissia micro-odonta</i>	G00040340	Fig. 347
<i>Timmia austriaca</i>	G00040327	Fig. 322	<i>Weissia nigrita</i>	G00040074	Fig. 348
<i>Timmia megapolitana</i>	G00040329	Fig. 323	<i>Weissia pusilla</i>	G00040301	Fig. 349
<i>Tortula muralis</i>	G00040333	Fig. 324	<i>Weissia recurvirostris</i>	G00040058	Fig. 350
<i>Tortula subulata</i>	G00040335	Fig. 325	<i>Weissia rupestris</i>	G00040045	Fig. 351
<i>Tortula tortuosa</i>	G00040331	Fig. 326	<i>Weissia starkeana</i>	G00040259	Fig. 352
<i>Trichostomum canescens</i>	G00040272	Fig. 327			