Lectotypifications in taxa of the genera *Calamagrostis*, *Deyeuxia*, and *Digitaria* (Poaceae)

Lectotipificaciones en taxones de los géneros *Calamagrostis*, *Deyeuxia* y *Digitaria* (Poaceae)

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RESUMEN

Se designan aquí los lectotipos de 21 taxones pertenecientes a los géneros *Calamagrostis* Adans., *Deyeuxia* Clarion ex P. Beauv. y *Digitaria* Haller emend. A. S. Vega & Rúgolo sobre la base de especímenes y fragmentos obtenidos de material original depositado en los herbarios Berlin-Dahlem (B) y La Molina (MOL).

Palabras clave: *Calamagrostis*, *Deyeuxia*, *Digitaria*, lectotipos, Poaceae.

ABSTRACT

Twenty one taxa of the genera *Calamagrostis* Adans., *Deyeuxia* Clarion ex P. Beauv., and *Digitaria* Haller emend. A. S. Vega & Rúgolo are herein lectotypified on the basis of specimens and fragments obtained from original material deposited at Berlin-Dahlem (B) and La Molina (MOL) herbaria.

Keywords: *Calamagrostis*, *Deyeuxia*, *Digitaria*, lectotypes, Poaceae.

INTRODUCTION

On the basis of a previous catalogue of 310 types proceeding from Berlin-Dahlem (B), deposited at Gaspar Xuarez Herbarium (BAA) [Nicora and Rúgolo de Agrasar, 1998] and the whole Catalogue of Poaceae types at BAA (Vega, in press), we selected a list of taxa belonging to genera of our knowledge that remains without lectotypification. Lectotypes are here designated for the following 21 taxa of *Calamagrostis* Adans. (*C. beyrichiana* Nees ex Döll, *C. cajatambensis* Pilg., *C. longigluma* Pilg., *C. mollis* Pilg., *C. nitidula* Pilg., *C. nitidula* Pilg. var. *elata* Pilg., *C. nitidula* Pilg. var. *macrantha* Pilg., *C. pflanzii* Pilg., *C. podophora* Pilg., *C. sandiensis* Pilg., *C. tarijensis* Pilg., *C. tarmensis* Pilg., and *C. trichophylla* Pilg.), *Deyeuxia* Clarion ex P. Beauv. (*D. araeantha* Pilg., *D. bogotensis* Pilg., *D. macrophylla* Pilg., *D. pubescens* Pilg., *D. secunda* Pilg., and *D. stuebelii* Pilg.), and *Digitaria* Haller emend. A. S. Vega & Rúgolo (*D. doellii* Mez and *D. megapotamica* Mez). The label and characters exhibited by these specimens do conform with original diagnostic descriptions.

Most of these specimens are duplicates and fragments facilitated by Robert Pilger to Lorenzo R. Parodi during his visit to Berlin in 1936. Some type specimens (holotypes and syntypes) at B were destroyed during the Second World War, and nowadays are preserved at the Gaspar Xuarez (BAA) herbarium. Some specimens collected by A. Weberbauer were also deposited at La Molina (MOL) and if they were complete plants, we selected them as lectotypes and BAA material as isolectotypes.

MATERIAL AND METHODS

Taxa of all ranks, alphabetically ordered, were included. Accepted names are in bold face and synonyms are in italics. The basonym is included and the complete synonymy is suggested as additional bibliography. Type protologues were checked in original bibliography, and type specimens are included, those from BAA are preceded by a type specimen number, assigned by the herbarium. At the following item it is included the kind of type: holotype, isotype, syntype,

isosyntype, lectotype, or isolectotype. If type specimen is a fragment, it is mentioned the kind of material available: inflorescence, spikelets, leaf blade, etc., as well as it includes a line drawing.

Observation. Some taxa included in the present paper are validly considered under *Calamagrostis* (Soreng & Greene, 2003; Soreng *et al*., 2003 and onwards) or *Deyeuxia* (Rúgolo de Agrasar, 2006; Zuloaga *et al*., 2008; Zuloaga *et al*., 2012). Delimitation among *Deyeuxia* and *Calamagrostis* is still uncertain until additional studies are carried out, so we follow the taxonomical criteria of Rúgolo de Agrasar (2006) and Zuloaga *et al*. (2008, 2012). The complete synonymy is published in Rúgolo de Agrasar (2006).

TAXONOMIC TREATMENT

1. ***Deyeuxia araeantha*** Pilg., Bot. Jahrb. Syst. 25 (5): 711. 1898. *Calamagrostis araeantha* (Pilg.) Pilg., Bot. Jahrb. Syst. 42: 60. 1908. TYPE: COLOMBIA, Volcán Tolima, Boca del Monte, XI-1868, A. Stübel 203 (syntype, B (destroyed); lectotype, designated here: BAA-4651! fragm. ex B; isolectotype, US-81864). COLOMBIA, A. Stübel 303 (isosyntype, US 1061514!).

Deyeuxia effusa Kunth, Nov. Gen. Sp. 1: 146. 1815 [1816]. *Arundo effusa* (Kunth) Poir, Encicl. Met. Suppl. 4: 706. 1816. *Calamagrostis effusa* (Kunth) Steud., Nomencl. Bot. (ed. 2) 1: 250. 1840. TYPE: ECUADOR, Antisanae radicibus, 1200 hexap., Humboldt & Bonpland s.n. (syntype, P!; isosyntype, US fragm. 3048342!).

Observation: According to the protologue, *D. araeantha* was described on the basis of 3 syntypes: "Columbia: Crecit in monte ignivomo Tolima ad Boca del Monte (coll. columb. n. 203); in monte ignivomo Pasto alt. s. m. 3400 m (coll. columb. n. 389[a]); in monte ignivomo Puracé alt. s. m. 4000 m (coll. columb. n. 303)". The specimen Stübel 203, selected as the lectotype, was destroyed at B and a fragment composed of inflorescence branches with spikelets and a leaf is conserved at BAA.

2. ***Deyeuxia aurea*** Munro ex Wedd., Bull. Soc. Bot. France 22: 176. 1875. *Calamagrostis aurea* (Munro ex Wedd.) Hack. ex Sodiro, Anales Univ. Centr. Ecuador 3 (25): 481. 1889. TYPE: " Equateur (Jameson)". Equateur, Andes de Quito, 1859, Jameson s.n. (holotype, P! isotypes, BAA!, GH!, K!, LE!, NY 380534!, US 844971!).

Calamagrostis longigluma Pilg., Bot. Jahrb. Syst. 42 (1): 71. 1908. TYPE: ECUADOR, El Altar, Hans Meyer 144 (holotype, B (destroyed); lectotype, designated here: BAA-4642! fragm. ex B: inflorescence branches with spikelets; isolectotype, US-3099596!).

3. ***Deyeuxia bogotensis*** Pilg., Bot. Jahrb. Syst. 25 (5): 712. 1898. *Calamagrostis bogotensis* (Pilg.) Pilg., Bot. Jahrb. Syst. 42: 60. 1908. TYPE: COLOMBIA, Bogotá y alrededores, IV/V-1868, A. Stübel 14 a (syntype, B (destroyed); lectotype, designated here: BAA-4365! fragm. ex B).

Observation: According to the protologue, *D. bogotensis* was described on the basis of 2 syntypes: "Columbia: Crecit ad Bogota et locis vicinis (coll. columb. n. 14 a); in Paramo inter Usme et Pasca regionis Cundinamarca (coll. columb. n. 111 a)". The specimen A. Stübel 14 a, selected as the lectotype, was destroyed at B and a fragment composed of inflorescence branches with spikelets and a leaf is conserved at BAA.

4. ***Deyeuxia filifolia*** Wedd., Bull. Soc. Bot. France 22: 178, 179. 1875. *Calamagrostis filifolia* (Wedd.) Pilg., Bot. Jahrb. Syst. 42: 67. 1908, non *C. filifolia* Merr. 1906. TYPE: BOLIVIA, Prov. Larecaja, viciniis Sorata, colle Tocoroconia, circa cima andis, 2700-2800 m, III-1860, G. Mandon 1301 (lectotype, P! designated by Rúgolo de Agrasar, Darwiniana 44 (1): 201. 2006; isolectotypes GH!, K!, NY 380539!, SI!, US 81691!, 2854531!, W!). BOLIVIA, Larecaja, vicinis Sorata, cerro Iminapi, in arenosis, 2600 m, II/III-1858, G. Mandon 1303 (syntypes, K!, P!, W!). BOLIVIA, Prov. Larecaja, Vicinis Sorata, prope Marcamocreani, 3500-3600 m, IV-1861, Mandon 1306 (syntypes, GH!, K!, LAU!, P!, SI!, W!).

Deyeuxia amoena Pilg., Bot. Jahrb. Syst. 27: 28. 1899. *Calamagrostis amoena* (Pilg.) Pilg., Bot. Jahrb. Syst. 42: 60. 1908. TYPE: BOLIVIA, crecit ad Talca, Chuquiaguillo, flor. coll. mens. IV-1890, Bang 805 (holotype not seen; isotypes BAA!, US 821605!, 1099464!).

Calamagrostis trichophylla Pilg., Bot. Jahrb. Syst. 42 (1): 67. 1908. TYPE: PERU, Cuzco, 3500-3600 m, 25-V-1905, A. Weberbauer 4873 (holotype, B (destroyed); lectotype, designated here: BAA-4650! fragm. ex B: inflorescences and leaves; isolectotype, US 732914!).

5. ***Deyeuxia macrophylla*** Pilg., Bot. Jahrb. Syst. 25 (5): 711. 1898. *Calamagrostis macrophylla* (Pilg.) Pilg., Bot. Jahrb. Syst. 42: 60. 1908. TYPE: ECUADOR, Pichincha, VIII-1870, A. Stübel 34 (holotype, B (destroyed); lectotype, designated here: BAA-4652! fragm. ex B: inflorescences branches with spikelets; isolectotypes, US 1645155!, US 81870!).

6. ***Deyeuxia nitidula*** (Pilg.) Rúgolo, Revis. Gatt. Deyeuxia Bolivien 239. 1995. *Calamagrostis nitidula* Pilg., Bot. Jahrb. Syst. 42 (1): 69. 1908. TYPE: PERU, Sandia, entre Poto y Ananea, 4400-4500 m, 7-V-1902, A. Weberbauer 960 (holotype, B (destroyed); lectotype, designated here: MOL!; isolectotypes, BAA-3576! fragm. ex B, US- 81647, G!).

Calamagrostis nitidula Pilg. var. *elata* Pilg., Bot. Jahrb. Syst. 42 (1): 70. 1908. TYPE: BOLIVIA, Suchez, andes grunze der hemanischen Provin. Sandia, 4500 m, 11-V-1902, A.

Weberbauer 1014 (holotype, B (destroyed); lectotype, designated here: BAA-4644! fragm. ex B: inflorescence branches with spikelets; isolectotype, US-3048360! fragm. ex B: spikelets).
Calamagrostis nitidula Pilg. var. *macrantha* Pilg., Bot. Jahrb. Syst. 42 (1): 70. 1908. TYPE: PERU, Sandia, Ananea, 5100 m, 16-V-1902, A. Weberbauer 1041 (holotype, B (destroyed); lectotype, designated here: BAA-4645! fragm. ex B: inflorescence branch with spikelets and leaves & floriferous culm line drawing; isolectotype, US 1715443!).
Observation: The protologue of *C. nitidula* mentioned the following specimen: "Peruvia: in provincia Sandia, inter Poto et Ananea, in solo lapidoso, parum plantis obtecto, caespites magnos formans, 4400-4500 m, florens mense Majo 1902, Weberbauer 960*"*. A fragment composed of an inflorescence branch, culm, and a leaf, as well as a floriferous culm line drawing made by Parodi are conserved in BAA from B. Due to the duplicate deposited at MOL is a complete plant, representing the species concept, it was selected as the lectotype.

7. ***Deyeuxia ovata*** J. Presl var. **ovata,** Reliq. Haenk. 1 (4-5): 246. 1830. *Calamagrostis ovata* (J. Presl) Steud. var. *ovata*, Nomencl. Bot. (ed. 2) 1: 251. 1840. TYPE: In montanis Peruviae Huanoccensibus, Haenke s.n. (holotype, PR!).
Calamagrostis pflanzii Pilg., Bot. Jahrb. Syst. 49: 184. 1912. TYPE: BOLIVIA, La Paz, Palca, 5000 m, IV-1908, K. Pflanz 305 (holotype, B (destroyed); lectotype, designated here: BAA-4411! fragm. ex B; isolectotype, US-2947285!).
Calamagrostis pflanzii Pilg. var. *major* Pilg., Bot. Jahrb. Syst. 49: 185. 1912. TYPE: BOLIVIA, Aguila, 17° S 67° W, 5200 m an der Cordillera Real, 1909, E. Knoche 38 (syntype, B (destroyed); isosyntype, BAA-4410!).
Observation: The protologue of *C. pflanzii* mentioned the following specimen: "Bolivien: Palca-La Paz, 5000 m, Apr 1908, K. Pflanz 305". A fragment composed of inflorescence branches with spikelets and leaves as well as a floriferous plant line drawing are conserved in BAA from B.

8. ***Deyeuxia podophora*** (Pilg.) Sodiro, Revista Col. Nac. Vicente Rocafuerte 12: 79. 1930. *Calamagrostis podophora* Pilg., Bot. Jahrb. Syst. 42 (1): 66. 1908. TYPE: PERU, Junín, Berge weslich von Huacapistana, 3500 m, 18-I-1903, A. Weberbauer 2231 (holotype, B (destroyed); lectotype, designated here: BAA-4647! fragm. ex B: inflorescence branches and a leaf & inflorescence line drawing; isolectotype, US 2947284!)

9. ***Deyeuxia pubescens*** Pilg., Bot. Jahrb. Syst. 25 (5): 712. 1898. *Calamagrostis pubescens* (Pilg.) Pilg., Bot. Jahrb. Syst. 42: 60. 1908. TYPE: COLOMBIA, Flora Columbiana, Volcán de Pasto, 3400 m, IX/XII-1869, A. Stübel 389 b (holotype, B (destroyed); lectotype, designated here: BAA-4653! fragm. ex B: inflorescence branch with spikelets and a floriferous culm line drawing).

10. ***Deyeuxia rigescens*** (J. Presl) Türpe, Lilloa 31: 134. 1960. *Agrostis rigescens* J. Presl, Reliq. Haenk. 1: 237. 1830. *Bromidium rigescens* (J. Presl) Nees & Meyen, Nova Acta Phys.-Med. Acad. Caes. Leop.-Carol. Nat. Cur. 19 suppl. 1: 155. 1843. *Bromidium hygrometricum* (Nees) Nees & Meyen var. *rigescens* (J. Presl) Kuntze, Revis. Gen. Pl. 3 (2): 343. (1898). *Calamagrostis rigescens* (J. Presl) Scribn., Annual Rep. Missouri Bot. Gard. 10: 37, pl. 32, fig. 3. (1899). TYPE: "Hab. in Peruvia?, S. Amer", Haenke s.n. (holotype, PR!; isotypes, BAA!, MO!, PRC!, US 76288!, W!).
Calamagrostis cajatambensis Pilg., Bot. Jahrb. Syst. 42 (1): 64. 1908. TYPE: PERU, Ancash, Cajatambo, pr. Ocros, 3500 m, 28-III-1903, A. Weberbauer 2686 (holotype, B (destroyed); lectotype, MOL!; isolectotypes, BAA-4640! fragm. ex B, US 732912!).
Obs.: The protologue of *C. cajatambensis* mentioned the following specimen: "Peruvia: Dep. Ancachs, in provincia Cajatambo, pr. Ocros, in uliginosis herbosis, 3500 m, V-1903, Weberbauer 2686*"*. A fragment composed of a floriferous culm and a leaf is conserved in BAA from B. Due to the duplicate deposited at MOL is a complete plant, representing the species concept, it was selected as the lectotype.

11. ***Deyeuxia rigida*** Kunth, Nov. Gen. Sp. 1: 144. 1815 (1816). *Arundo rigida* (Kunth) Poir., Encicl. Met. Supp. 4: 705. 1816. *Calamagrostis rigida* (Kunth) Trin. ex Steud. Nomencl. Bot. ed. 2, 1: 251. 1840. TYPE: ECUADOR, "In planitie frigida Antisana, regni Quitensis, alt. 2200 hex.", M. Bonpland 2271 (holotype, P!; isotypes, B-W!, P!, US 3048352!, W!).
Calamagrostis sandiensis Pilg., Bot. Jahrb. Syst. 42 (1): 68. 1908. TYPE: PERU, Sandia, Cuyo-Cuyo, 3700-3800 m, 3-V-1902, *Fl. v. Peru,* A. Weberbauer 906 (holotype, B (destroyed); lectotype, designated here: MOL!; isolectotypes, BAA-4648! fragm. ex B: inflorescence branches and leaves, US!).
Observation: The protologue of *C. sandiensis* mentioned the following specimen: "Peruvia: prope Cuyocuyo, provinciae Sandia, in herbaceis fruticibus nonnullis intermixtis, 3700-3800 m, florens mense Majo 1902, Weberbauer 906". A fragment composed of inflorescence branches and leaves is conserved in BAA from B. The specimen deposited at MOL is a complete plant.

12. ***Deyeuxia rupestris*** (Trin.) Rúgolo, Revis. Gatt. Deyeuxia Bolivien 95. 1995. *Calamagrostis rupestris* Trin., Gram. Panic. [Trinius] 28. 1826. TYPE: BRAZIL, "in fissuris rupium Estrella," G. H. von Langsdorff s.n. (holotype, LE-TRIN-1805.01!; isotype, US-3099613!).
Calamagrostis beyrichiana Nees ex Döll, Fl. Bras. 2 (3): 53.

1878. *Deyeuxia beyrichiana* (Nees ex Döll) Sodiro, Revista Colegio Nac. Vicente Rocafuerte 12: 79. 1930. TYPE: Brazil. "Ad ripas rivulorum prope Novo Friburgo," Jan. H. K. Beyrich s.n. (lectotype, designated here, fragm. ex B: BAA-4379!; isolectotype, LE-TRIN!).
Observation: According to the protologue, *C. beyrichiana* was described on the basis of two syntypes: "Habitat ad rivulorum ripus prope Novo Friburgo (Beyrich); in ripa Itajahy (Pabst n. 63) nec non a Cl. Weddell in Brasilia lecta". Both specimens were destroyed in B herbarium. In BAA herbarium is only conserved H. K. Beyrich s.n., composed of an inflorescence branch with spikelets, and an inflorescence line drawing made by Parodi.

13. ***Deyeuxia secunda*** Pilg., Bot. Jahrb. Syst. 25 (5): 712. 1898. *Calamagrostis secunda* (Pilg.) Pilg., Bot. Jahrb. Syst. 42: 60. 1908. TYPE: ECUADOR, Flora Aequatoriensis, Cerro Sangay, 4000 m, en las cenizas, IV-1872, A. Stübel 257 (holotype, B (destroyed); lectotype, designated here: BAA-4654! fragm. ex B: inflorescences branches with spikelets and a leaf; isolectotype, US-81874!).

14. ***Deyeuxia setiflora*** Wedd., Bull. Soc. Bot. France 22: 176, 180. 1875. *Calamagrostis setiflora* (Wedd.) Pilg., Bot. Jahrb. Syst. 42: 61. 1908. TYPE: Bolivie septentrionale, Dep. La Paz, Ravin de Chuquiaquillo, La Lancha, 5000 m, 1851, Weddell (holotype, P!; isotype, US 3048353!).
Calamagrostis mollis Pilg., Bot. Jahrb. Syst. 42 (1): 61. 1908. TYPE: ECUADOR, Chimborazo, Hans Meyer 148 (syntype, B (destroyed); lectotype, designated here: BAA-4643! fragm. ex B: spikelets, US 3049482!).
Observation: According to the protologue, *C. mollis* was described on the basis of 4 syntypes: "Ecuador: in monte Chimborazo ad septentrionali-occidentem versus, in regione Paramo dicta, 4500 m, florens mense Junio 1903, Hans Meyer 148!; eodem loco, 4000 m, n. 149, 4200 m, n. 144 b, 4500 m, n. 141". These specimens were destroyed at B herbarium. In BAA is only conserved Hans Meyer 148, composed of spikelets.

15. ***Deyeuxia stuebelii*** Pilg., Bot. Jahrb. Syst. 25 (5): 713. 1898. TYPE: ECUADOR, Páramos del Cerro Antisana, Cerro de la Media Luna, 4400 m, A. Stübel 231b (holotype, B (destroyed); lectotype, designated here: BAA-4345! fragm. ex B: inflorescence branch with spikelets and a leaf & floriferous plant line drawing).
Calamagrostis jamesonii Steud., Syn. Pl. Glumac. 1: 191. 1854. *Deyeuxia jamesonii* (Steud.) Munro ex Wedd., Bull. Soc. Bot. France 22: 176. 1875. TYPE: ECUADOR, Ad nives montis Pichincha, Jameson s.n. (holotype, P!).

16. ***Deyeuxia tarmensis*** **(**Pilg.) Sodiro, Revista Col. Nac. Vicente Rocafuerte 12: 81. 1930. *Calamagrostis tarmensis* Pilg., Bot. Jahrb. Syst. 42 (1): 70. 1908. TYPE: PERU, Junín, prov. Tarma, prope Palca, 2700-3100 m, 12-II-1902, A. Weberbauer 2460 (holotype, B (destroyed); lectotype, designated here: MOL!; isolectotypes, BAA-4649! fragm. ex B: inflorescence branches and leaves, S!, US!).
Observation: The protologue of *C. tarmensis* mentioned the following specimen: "Peruvia: Dep. Junin, in provincia Tarma, in montibus prope Palca ad orientem, in campis siccis fruticibus intermixtis, 2700-3100 m s.m. (Weberbauer n. 2460-florens mense Februario 1902)". The specimen deposited at MOL is a complete plant.

17. ***Deyeuxia tarmensis var. macrochaeta*** (Hack.) Rúgolo, Darwiniana 44 (1): 251. 2006. *Calamagrostis rosea* (Griseb.) Hack. var. *macrochaeta* Hack. ex R. E. Fries, Ark. Bot. 8 (8): 40. 1908. *Calamagrostis tarmensis* var. *macrochaeta* (Hack.) Soreng, Contr. U.S. Natl. Herb. 48: 222. 2003. TYPE: BOLIVIA, Junaca, prope Tarija, loco graminoso in reg. subalpina, 2500 m, Fries 1301 (holotype, W!; isotype, US 3099612!).
Calamagrostis tarijensis Pilg., Bot. Jahrb. Syst. 42 (1): 71. 1908. *Deyeuxia tarmensis* var. *tarijensis* (Pilg.) Villav., Revis. Gatt. Deyeuxia Bolivien Dissert.: 224. 1995. TYPE: BOLIVIA, Pinos bei Tarija, 2600 m, 10-III-1904, K. Fiebrig 3120 (lectotype, designated here: B!; isolectotypes, BAA-4419! fragm. ex B; BAA-4419! ex SI; fragm. LIL!; fragm. NY 380364!; P!; SI!). BOLIVIA, Pinos, pendiente rápida húmeda, 2800 m, III-1904, K. Fiebrig 3119 (syntypes, B not seen, BAA-4420! ex B, GH!, K!, SI!, US 1099497!, US 1061513!).
Observation: The protologue of *C. tarijensis* mentioned the following syntypes: "Bolivia australis: Pinos prope Tarija, in declivibus humidis, 2600 m s.m. (Fiebrig n. 3120 et 3119-florens mense Martio 1904)". The specimen Fiebrig 3120 (B) is selected as the lectotype.

18. ***Digitaria doellii*** Mez, Bot. Jahrb. Syst. 56 (125): 8. 1921. TYPE: BRAZIL. Rio de Janeiro, am Eisenbahndamm bei Maná, XI-1896, E. Ule 4157 (lectotype, designated here: B!). Herb. Mez 2189, A. C. V. Schott 4849 (syntype, B; isosyntype, BAA-547! fragm. ex B). BRAZIL, Ad Pilar, A. C. V. Schott 4849 (isosyntype, BAA-547! fragm. ex US from W).
Observation: According to the protologue, *D. doellii* was described on the basis of 2 syntypes: "Brasilien, Río de Janeiro, Ule 4157, Schott 4849". The specimen Ule 4157 is a complete plant conserved at B is here selected as the lectotype. Specimens of Schott 4849 are fragments proceeding from B and W herbaria and are composed of inflorescences branches with spikelets and inflorescence and floriferous culm line drawings, respectively.

19. ***Panicum elephantipes*** Nees ex Trin., Gram. Panic. 206. 1826. TYPE: BRAZIL, Guapore, 1829, G. H. von Langsdorff s.n. (holotype, LINN!; isotype, BAA-1825!).

Digitaria megapotamica Mez, Bot. Jahrb. Syst. 56 (125): 7. 1921. TYPE: PARAGUAY, Pres de l´Assomption, IV-1877, B. Balansa 21 (syntype, B not seen; isosyntype, BAA-919! fragm. ex B: inflorescence branch provided with spikelets, BAA-919! fragm. ex BAF: inflorescence branch provided with spikelets). ARGENTINA, Corrientes, 26-VIII-1892, G. Niederlein 392 K (lectotype, designated here: B!; isolectotype, BAA-919! fragm. ex B: inflorescence branch provided with spikelets).

Observation: According to the protologue, *D. megapotamica* was described on the basis of several syntypes: "Paraguay. Balansa 21, 21a, Tweedie; Argentina. Bettfreund 92, 1040, Niederlein 392k". The specimen G. Niederlein 392 K is a complete plant conserved at B.

CONCLUSIONS

Previous systematic studies on the genera *Calamagrostis*, *Deyeuxia* and *Digitaria* (Rúgolo de Agrasar, 2006; Vega & Rúgolo de Agrasar, 2003), have allowed us to clarify the identity and delimitation among taxa. Hereby, it was necessary to carry out the lectotipification of 21 taxa by means of the analysis of protologue and original material. For each taxon, we included the detail of the selected lectotype material, as well as the isolectotypes and the herbaria where they are preserved. This work constitutes a contribution to the taxonomy of the cited genera.

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