

A NEW SPECIES OF *CAREX* (CYPERACEAE) FROM ARGENTINAGERALD A. WHEELER<sup>1</sup> & ENCARNACION R. GUAGLIANONE<sup>2,3</sup><sup>1</sup> University of Minnesota Herbarium. J. F. Bell Museum of Natural History, St. Paul, Minnesota 55108-1095, United States of America. E-mail: wheel039@tc.umn.edu<sup>2</sup> Instituto de Botánica Darwinion. Casilla de Correo 22, B1642HYD San Isidro, Buenos Aires, Argentina. E-mail: rguaglianone@darwin.edu.ar

ABSTRACT. Wheeler, G. A. & Guaglianone, E. R. 2003. A new species of *Carex* (Cyperaceae) from Argentina. *Hickenia* 3(41): 163-166.

A new species of *Carex* (Cyperaceae) is described and illustrated from Argentina. *Carex subandrogyna* is known from Jujuy and Salta Provinces, where it grows in yungas at about 1000 to 2500 m s.m.

Key words: Taxonomy, Cyperaceae, *Carex*, Section Schiedeanae, Argentina.

RESUMEN: Wheeler, G. A. & Guaglianone, E. R. 2003. Una nueva especie de *Carex* (Cyperaceae) de la Argentina. *Hickenia* 3(41): 163-166.

Una nueva especie de *Carex* (Cyperaceae) de la Argentina, es descrita e ilustrada. *Carex subandrogyna* es conocida de las provincias de Jujuy y Salta, donde crece en las yungas entre 1000 y 2500 m s.m.

Palabras clave: Taxonomía, Cyperaceae, *Carex*, Sección Schiedeanae, Argentina.

## INTRODUCTION

The genus *Carex* L. (Cyperaceae) is represented in South America by 200 or more species (Wheeler, 1996) and slightly less than 90 are presently known from Argentina (Guaglianone, 1996). In this paper, a new species of *Carex* is described and illustrated from northwestern Argentina and is here placed in *Carex* section Schiedeanae Kük.

1998, O. Morrone, N. B. Deginani, A. M. Cialdella & L. M. Giussani 2265 (holotype, SI; isotype, MIN). Fig. 1

*Herbae caespitosae; culmi (8-)23-46 cm alti, superior subscabri; vaginae basales brunneae, glabrae. Folia 5-7; laminae 7-37 cm longae, 2.6-5.6(-7.5) mm latae; vaginae minus quam 6 cm longae, ventraliter albido-hyalinae vel pallide brunneae; ligulae 1.5-2 mm longae. Inflorescentiae 2-5 cm longae; prophyllae insignis, brunneae; bractae evaginatae, inferior 1 vel 2, foliiformis inflorescentian superantes, infimae 3.5-13 cm longae, superior brevior foliiformis vel setaceae. Spicae 2-4, androgynae, ovoideae ad brevis-cylindricae, 5.5-18 mm longae; pars staminatae brevis;*

## NEW SPECIES: DESCRIPTION AND COMMENTS

***Carex subandrogyna*** G. A. Wheeler & Guagl., sp. nov. TYPE: Argentina. Prov. Jujuy. Dpto. Dr. Manuel Belgrano: 8 km de Lozano camino a Tiraxi, 24° 02'S, 65° 22'W, 8-II-

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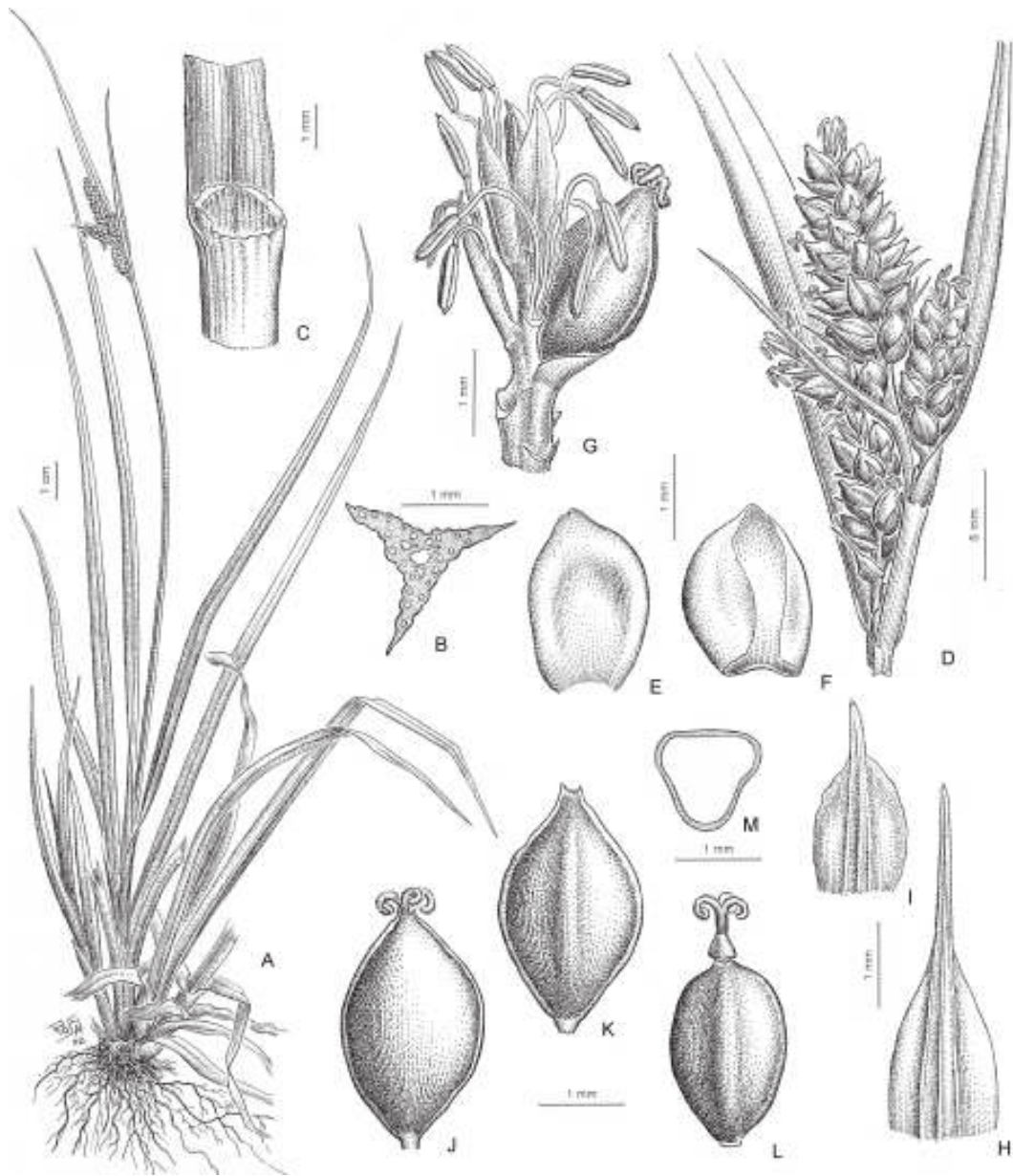


Fig. 1.- *Carex subandrogya*. A: habit. B: transection of culm. C: leaf sheath with ligule. D: inflorescence. E-F: dorsal and ventral view of inflorescence prophyll. G: staminate portion of spike, with a single perigynium below. H: basal pistillate scale. I, pistillate scale near middle of spike. J: dorsal view of perigynium. K: ventral view of perigynium. L, achene with stylebase and stigmas. M: transection of achene. A-M, from *Morrone et al. 2265*.

*pars pistillatae* 3-15 mm longae, 3-6 mm latae, leviter obovatis, in rostrum breve. Achenium 4-30-florae. Perigynia 2.4-2.9 mm longa, 1.2-1.6 mm lata, trigona, corporibus ellipticis vel trigonum, 1.8-2 mm longum, 1.1-1.3 mm latum. Stigmata 3. Antherae 3, ca. 0.6-0.8 mm longae.

Plants caespitose, the rhizomes short; fertile culms (8-)23-46 cm tall, 1-1.4 mm wide, acutely trigonous and somewhat winged beneath the inflorescence, compressed-flattened below, antrorsely scabrous-angled (at least distally), erect or slightly curved, with glabrous, brown to dark brown basal sheaths, fibrillose at the base, old leaves conspicuous. Leaves 5-7, clustered near the base; blades 7-37 cm long, 2.6-5.6(-7.5) mm wide, more or less flattened but channelled near the base, usually papillose or scabrate on the upper surface (at least distally), smooth below though often scaberulent on the midrib, the margins antrorsely scabrous distally; leaf sheaths less than 6 cm long, tightly enveloping culms, glabrous, greenish or pale brown, the inner band glabrous, hyaline or pale brown, the apex slightly concave; ligules 1.5-2 mm long, rounded, the free portion brown. Inflorescences 2-5 cm long, spikes approximate or somewhat separated; inflorescence prophylls conspicuous, 1.3-2 mm long, urceolate, hardly thickened dorsally, brownish; bracts sheathless, the lowest 1 or 2 leaf-like and generally exceeding the inflorescence, long acuminate with the lowest one 3.5-13 cm long and up to 3.2 mm wide, the uppermost bracts shorter and more or less setaceous. Spikes 2-4, androgynous, 5.5-18 mm long, the terminal and lateral ones similar, single at nodes, erect; the staminate portion 2.5-3 mm long, 1.6-2 mm wide, ca. 5-9-flowered; the pistillate portion 3-15 mm long, 3-6 mm wide, 4-30-flowered. Staminate scales 1.2-2 mm long, 0.5-0.8 mm wide, oblong-ovate, acute, stramineous to pale brown, with a pale greenish to stramineous center, 1-veined. Pistillate scales 2-8.5 mm long, 0.8-1.4 mm wide, the body shorter than the perigynium, ovate to ovate-lanceolate, acute to acuminate-awned, with a scabrous-ciliate awn up to 7.2 mm long, stramineous to pale brown, with a pale greenish or stramineous center, 3-veined. Perigynia 2.4-2.9 mm long, 1.2-1.6 mm wide, mostly ascending, trigonous with broadly elliptical or slightly obovate sides, membranaceous, pale brown to brown, glabrous, 2 lateral veins prominent and the rest obscure, tapered to a substipitate base, more or less abruptly contracted into a very short beak;

beak 0.3 mm long or less, brownish, margins smooth, the apex usually erose. Achenes trigonous with ovate-oblong sides, 1.8-2 mm long, 1.1-1.3 mm wide, pale brown, with a short, cone-shaped stylebase. Stigmas 3, short, reflexed and frequently once coiled, reddish. Anthers 3, ca. 0.6-0.8 mm long.

#### *Paratypes*

ARGENTINA. **Jujuy.** *Dpto. Dr. Manuel Belgrano:* Lagunas de Yala, 2500 m s. m., 16-II-1987, *Nicora et al. 8743* (SI). **Salta.** *Dpto. Capital:* filo de cerros entre Castellanos y San Lorenzo, 6-10 km al Este de la Quebrada de San Lorenzo, 2000-2400 m s. m., bosque y pastizal serrano húmedo de matas altas. En sotobosque umbrío húmedo, 2-II-1991, *Novara et al. 10134* (SI).

This species is known from Jujuy and Salta Provinces, where it seemingly grows in moist, shaded places in woodlands, from about 1000 to 2500 m s.m. The type collection comes from the “yungas” of northwestern Argentina, where it was growing in the environs of a deep wooded ravine juxtaposed to steep, rocky cliffs bordering a stream, an area dominated by ferns, such as *Dennstaedtia globulifera* (Poir.) Hieron., *Dryopteris parallelogramma* (Kuntze) Alston, *Elaphoglossum piloselloides* (C. Presl) T. Moore, and *Pteris deflexa* Link. Other vascular plants in the vicinity were *Anthericum humboldtii* Hemsl., *Ipomoea volcanensis* O’Donell, *Paspalum distichum* L., and some members of the Orchidaceae, such as *Cranichis* sp. and *Malaxis* sp. (Morrone, O., pers. comm.). Plants with mature perigynia and ripe achenes have been collected in February. The epithet *subandrogyna* which, in this case, means “slightly androgynous,” refers to the short, rather inconspicuous staminate portion of each spike of the inflorescence.

The new species is here placed in *Carex*, subgenus *Indocarex* Baillon, sect. *Schiedeanae* Kük., which is characterized by having: (1) all spikes, including the terminal spike, uniformly androgynous, (2) conspicuous inflorescence prophylls, and (3) sheathless bracts. This section occurs in Mexico (Hermann, 1974) and

southern Texas (U.S.A.) but is unknown from Central America (Chater, 1994); a single species of sect. Schiedeanae is also reported from southern Europe and northern Africa (Kükenthal, 1909; Chater, 1980). To our knowledge, *C. subandrogyna* is the first member of this section reported from South America. It differs from the Mexican members of sect. Schiedeanae by having glabrous perigynia, a shorter perigynium beak, and slightly wider leaves.

#### ACKNOWLEDGMENTS

We want to thank O. Morrone for habitat information from the type locality and F. Rojas for the fine illustration.

#### LITERATURE CITED

- Chater, A. O. 1980. *Carex*, in T. G. Tutin, V. D. Heywood, N. A. Burges, D. M. Moore, D. H. Valentine, S. M. Walter & D. A. Webb (eds.), *Fl. europaea* 5: 290-323.
- . 1994. *Carex*, in G. Davidse, M. Souza & A. O. Chater (eds.), *Fl. Mesoamericana* 6: 464-473. Universidad Nacional Autónoma de México, México, D. F.; Missouri Bot. Gard., St. Louis & The Natural History Museum, London.
- Guaglianone, E. R. 1996. *Carex*, in F. O. Zuloaga & O. Morrone (eds.), Catálogo de las Plantas Vasculares de la República Argentina. I. *Monogr. Syst. Bot. Missouri Bot. Gard.* 60: 133-146.
- Hermann, F. J. 1974. Manual of the Genus *Carex* in Mexico and Central America. *U.S.D.A. Handb.* No. 467.
- Kükenthal, G. 1909. Cyperaceae: Caricoideae, in A. Engler (ed.), *Pflanzenr.* 4, 20 (38):1-824.
- Wheeler, G. A. 1996. Three new species of *Carex* (Cyperaceae) from Argentina and a range extension for *C. ecuadorica*. *Hickenia* 2:189-200.

*Original recibido el 15 de octubre de 2002; aceptado el 21 de noviembre de 2002.*