

BOOK REVIEW

Catálogo de las plantas vasculares del cono sur (Argentina, southern Brazil, Chile, Paraguay y Uruguay) (2008). Zuloaga F, O Morrone & M Belgrano (eds), C Marticorena & E Marchesi (assoc. eds), Monographs in Systematic Botany from the Missouri Botanical Garden 107, 3 volumes. 3486 pp. ISBN 978-1-930723-70-2

This book presents a catalog of the vascular plants of the Southern Cone, which includes Argentina, southern Brazil, Chile, Paraguay, and Uruguay. It is a surprising book, not only for its size, but also for the quantity and quality of its information. The Catalog comprises three impeccably bound, high-quality volumes written in Spanish and English, which makes it broadly accessible to practically all who are interested in the area. The first volume includes the Pteridophyta, Gymnospermae and the Monocotyledonae, and the second and third the Dicotyledonae from Acanthaceae to Fabaceae (*Abreara-Schizolobium*), and from the Fabaceae (*Senna-Zygia*) to Zygophyllaceae, respectively.

Although this book is directed primarily to taxonomic botanists, its information and good organization make it accessible to others interested in the subject.

The Catalog is filled with all the information about the vascular plants that occupy the Southern Cone of South America. The first volume includes an extensive introduction that explains the general aspects of the Catalog along with information on the included taxa (accepted species, synonyms, doubtful names and citations). A precise description of the project's area is provided, providing geographic details of each country. With respect to phytogeographic regions, the Catalog recognized the eleven regions defined by Josse et al. (2003), but the influence of Cabrera and Willink's (1980) classic work on South American phytogeography is evident throughout.

With respect to the results, the book presents a total of 17,693 accepted species, from 308 families and 2,586 genera, and also includes 42,000 nomenclatural and taxonomic synonyms, all arranged alphabetically. Among the accepted species, 7,691 are endemic to the Southern Cone.

The concept of endemism only refers to species or taxonomic categories known from the area of study, and shows the relationships

among the numbers of species shared by the different countries.

The compiled information is detailed in nine tables that present species numbers, richness at different taxonomic levels, biodiversity indices by area (countries), numbers of taxa shared among countries, endemic genera, and number and percentage of endemic species per country, in addition to the percentage of introduced species per country.

An important section of the work deals with conservation both of species and the protected areas within each of the phytogeographic regions; it highlights all of the protected areas in each country and the area that they cover, which in the entire Southern Cone only reaches 5 %.

This Catalog is the product of the participation of 219 authors and/or editors from 21 countries, and from more than 100 institutions, mostly from South America, but also from North America, Europe and Australia.

The structure of the Catalog is arranged by family, with the coordinators or authors of each treatment (family), the numbers of genera and species. Then, the genera and its author(s) are listed in bold, followed by the total number of species, and the number of endemic and introduced species. Next, the species of each genus are listed alphabetically, with the accepted species (and authors) in bold, followed by a list of synonyms, bibliographic references, habit, altitudinal range, distribution within the project area with acronyms for the different political divisions within each country, and representative herbarium specimens for each taxon. Also included, in italics, are their synonyms and accepted names to which they correspond, next to the bibliographic references. Doubtful or misinterpreted names are also included within parentheses.

Like all catalogs, this one is a tool that presents the state of the art at the present time.

We know very little about some of groups. The Alliaceae and Dioscoriaceae, for example, with 163 and 86 species, and 145 and 54 endemics, respectively, were prepared by the editors. The fact that no modern works exist for many groups opens our eyes to the fact that much work remains to be done and many groups need to be revised for the flora of the Southern Cone.

On the other hand, the undeniable inflexibility of the printed text, in contrast to the dynamics of the field of taxonomic botany, is counterbalanced by an existing web site which includes most of the information contained in the book. The maintenance of the

plasticity and continuous updating of this web site is a task in which we can all collaborate.

This immense work, so much anticipated and so necessary, satisfies the needs of innumerable researchers in diverse fields of botany, and will undoubtedly reach other disciplines of biology.

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