

NARCISSUS.

By Michael Jefferson-Brown. Timber Press, Portland (Oregon). \$34.95. vii + 224 p. + 16 pl.; ill.; general index and index of species and cultivars. ISBN: 0-88192-195-5. 1991.

While daffodils and narcissi are among the best-known garden plants—with over 20,000 registered names, several large societies devoted solely to their study, and more planted each year than any other perennial ornamental—we are largely ignorant about the very features of the plant that provide enjoyment for the gardener and daffodil enthusiast alike. The functional basis of the spectacular range of floral variation, so profitably used by breeders to improve these attractive spring bulbs, is not well understood, primarily because little work has been conducted on the floral biology and pollination systems of *Narcissus* species in their native environments. Moreover, despite over a century of active breeding, the true phylogenetic relationships of taxa are unclear, and information on the genetic architecture of floral characters is largely unknown. Most of what we do know about the genus *Narcissus* results from the pioneering studies by the Portuguese botanist Abilio Fernandes and dedicated growers such as Jefferson-Brown, the author of this comprehensive guide to wild and hybrid narcissi.

Any botanist or amateur gardener interested in finding out more about daffodils will be richly rewarded by dipping into this volume. The text is written in an unpretentious and engaging style, and is full of practical advice on how to grow and improve the many varieties of daffodil that are currently available. The twenty chapters are roughly divided into those concerned with the botany, classification and cultivation history of the genus (five chapters); those devoted to the major divisions of cultivated narcissi recognized by the Royal Horticultural Society (10 chapters); and the remainder on cultivation, including chapters on exhibiting, propagation, hybridization, and pest and disease problems. A series of sixteen excellent color plates provide rich testimony to the large range of floral variation now available among the horticultural varieties. Simple stylized line drawings of several of the wild species are also used, but are less effective in conveying the beauty of these largely diminutive forms. Systematists will undoubtedly be intrigued by Jefferson-Brown's conception of the evolutionary relationships of taxa within the genus as illustrated in the form of a series of balloon diagrams with overlapping circles representing sections and species (pp. 17, 23, 33, 37, and 41). Unfortunately, the evidence for these inferences about evolutionary history is never discussed in detail. It will be interesting to see whether future systematic research supports the author's ideas on relationships, which appear to be largely based on

his many years of practical experience working with this attractive group of plants.

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PHYTOSOCIOLOGIE ET PAYSAGE. *Colloques Phytosociologiques, Volume 17.*

Edited by J.-M. Gehu. J. Cramer (Gebrüder Borntraeger Verlagsbuchhandlung), Berlin; distributed by Lubrecht & Cramer, Forestburgh (New York). \$162.50. xvi + 519 p. + 7 foldouts; ill.; no index. ISBN: 3-443-70006-3. [In French.] 1991.

DISEASES AND DISORDERS OF ORNAMENTAL PALMS. *Based on the 1988 annual meeting of the American Phytopathological Society.*

Edited by A. R. Chase and T. K. Broschat. APS Press, St. Paul (Minnesota). \$27.00 (paper). vii + 56 p.; ill.; no index. ISBN: 0-89054-119-1. 1991.

This concise, profusely color-illustrated handbook will be welcomed by many plant biologists, both basic and applied. Palms are increasingly being used and appreciated as ornamentals, and they play a significant role in landscaping and decoration. The format of the book is such that each entry provides symptomatology, the causal organism, occurrence, species affected, diagnostic techniques, and prevention and treatment. The illustrations are generally good (some are poor), but all could be larger. Scales of magnification would be helpful, especially on micrographs. Presumably for reasons of space, there are no references to the literature. Key references could have made the work more complete.

COMMON WEEDS OF CENTRAL SUDAN.

By M. Braun, H. Burgstaller, A. M. Hamdoun, and H. Waller. Published for Deutsche Gesellschaft für Technische Zusammenarbeit by Verlag Josef Margraf, Weikersheim. DM 68,— (paper). vi + 329 p.; ill.; index. ISBN: 3-8236-1201-8. 1991.

WILSON POPENOE: AGRICULTURAL EXPLORER, EDUCATOR, AND FRIEND OF LATIN AMERICA.

By Frederic Rosengarten, Jr. *National Tropical Botanical Garden, Lawai, Kauai (Hawaii)*. \$25.95. vii + 182 p.; ill.; index. ISBN: 0-935868-53-4. 1991.

The name Wilson Popenoe has long been synonymous with tropical crops and related education. He was one of a small number of outstanding plant explorers and leaders of agricultural development, including Swingle, Fairchild, Barrett, Shamel, Wester, and Meyer, who, in the latter part of the 19th Century and half of the 20th, made a vast difference in the world's menu and in the economy