

both high levels of endemism and high threat, and deserving of immediate conservation attention.

In conclusion, as an introductory foray to the extinction crisis, and the uneven political dimensions thereof, Mackay's *Atlas* is a visual feast. But as a reference work, its often generic content and sometimes misleading presentation of data means that it sadly falls short.

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SERENGETI III: HUMAN IMPACTS ON ECOSYSTEM DYNAMICS.

Edited by A. R. E. Sinclair, Craig Packer, Simon A. R. Mduma, and John M. Fryxell. Chicago (Illinois): University of Chicago Press. \$45.00 (paper). x + 522 p.; ill.; index. ISBN: 978-0-226-76034-6. 2008.

This third installment in the Serengeti series continues to explore one of the world's most fascinating and well-studied ecosystems, this time with an eye toward the future. Although *Serengeti I* and *II* focused primarily on the ecology and conservation of the Serengeti ecosystem, this new volume blends research on ecological, social, and economic processes driving ecosystem change. An important theme of the book centers on the effects of future environmental and anthropogenic perturbations, such as climate variation, disease outbreaks, or changes in wildlife policy on plant, animal, and human populations. In 16 well-organized chapters, contributors spanning fields from ecology to economics examine complex interactions among biotic, abiotic, and human components of the system. The end result is a textbook that presents a holistic and timely view of ecosystem dynamics in a changing world.

The opening chapters of *Serengeti III* briefly review the major biotic and abiotic features of the Serengeti, highlighting historical patterns of ecosystem change and the forces driving these changes. The history and evolution of human land use in the region is discussed in an interesting chapter that describes the complex interplay among rainfall, land use, and human-wildlife conflict. Later chapters develop models to examine how humans respond to environmental, economic, and political variability, as well as forecast how these changes affect ecosystem dynamics. Core biological processes that contribute to the amazing biodiversity of the Serengeti are also treated in chapters that focus on heterogeneity, grazer coexistence, and biocomplexity. The series of integrative models presented in the book showcase just how much we know about the Serengeti ecosystem, and how much we still have yet to learn.

Many of the chapters raise more questions than answers, but the authors do a good job of highlighting important next steps toward furthering our understanding of this complex system. In the final chapter, A. R. E. Sinclair summarizes the major conclusions of the volume and discusses strategies for conserving this vast natural wonder. This textbook will appeal broadly to ecologists, conservationists, and social scientists. Indeed, for anyone who contemplates the future of natural areas in the face of increasing human populations, *Serengeti III* provides much food for thought.

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LIVING IN A DYNAMIC TROPICAL FOREST LANDSCAPE.

Edited by Nigel E. Stork and Stephen M. Turton. Malden (Massachusetts): Blackwell Publishing. \$95.00. xviii + 632 p. + 12 pl.; ill.; index. ISBN: 978-1-4051-5643-1. 2008.

During the Miocene, rainforests covered up to two-thirds of Australia. Now, the Gondwana fragment is the driest unfrozen continent on Earth, with a mere two million hectares of mainland rainforest that, despite its diminutive area, harbors two-thirds of Australia's butterfly species, one-half of its birds, and one-third of its vertebrates.

This book is focused on Australia's mainland "Wet Tropics" rainforests. Being the only tropical rainforest in the mainland of an industrialized nation, the Wet Tropics are well studied. The region has even been designated as a World Heritage Site; but competing demands of agriculture, conservation, and tourism make sustainable land use a major challenge.

The 49 chapters by 83 contributors are arranged into six parts: history and biodiversity; ecological processes; environmental threats; cultural dimensions; restoration; and science and policy. Each section concludes with an informative "international perspective" penned by prominent scientists mostly from outside of Australia. Explanatory boxes in most chapters provide source text for teaching.

The science chapters are rich in detail and will be cited in many PhD theses. The sections on conservation and policy have far-reaching applications. For example, the chapter by Stephen Goosem on invasive weeds is relevant to the increasingly fragmented Neotropical rainforest. In the chapter Rethinking Road Ecology, Miriam Goosem provides ingenious solutions for making roads less of a nightmare for park fauna. Pannell's chapter on aboriginal cultural landscapes is fascinating.

There is probably no other volume that provides

such a holistic and comprehensive perspective on the science, management, people, and economics of a tropical landscape. The book should appeal to students, teachers, land managers, and the educated general public interested in forests and their long history of interaction with humans.

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THE VANISHING PRESENT: WISCONSIN'S CHANGING LANDS, WATER, AND WILDLIFE.

Edited by Donald M. Waller and Thomas P. Rooney. Chicago (Illinois): University of Chicago Press. \$40.00. xiv + 507 p. + 16 pl.; ill.; index. ISBN: 978-0-226-87171-4. 2008.

I have not read a volume about the ecology of a given state that was so engaging since I read John Curtis's classic *The Vegetation of Wisconsin: An Ordination of Plant Communities* (1959. Madison (WI): University of Wisconsin Press) 40 years ago. Every ecologist, land manager, or policymaker in Wisconsin and adjacent areas will find this book essential; those living in other parts of the world will wish they had something like it. A common theme throughout is the status of Wisconsin's natural resources prior to European settlement (the main wave occurred during the late 1800s), how we got to the current status, and where we may go in the future. This work is well organized and integrated compared with many edited volumes, and has excellent flow for readers. The writing can be understood by the interested general public while retaining enough information to satisfy scientists. The book is illustrated with numerous graphs and tables, as well as a color plate section with maps of change over time.

The Vanishing Present is comprehensive; 32 chapters cover many taxonomic groups, ecological communities, and environmental issues. These include plant communities (forests, savannas, prairies, wet meadows, and emergent and submergent aquatic communities), lichens, birds of forests and grasslands, carnivorous mammals, amphibians, reptiles, and butterflies and moths. Unique features of Wisconsin's landscape are highlighted, including the Wisconsin River floodplain, Great Lakes coastal marshes, and the state's two large archipelagos: Lake Superior's Apostle Islands and Lake Michigan's Grand Traverse Islands. Changes in fish communities and food webs in the Great Lakes and smaller inland lakes are covered. Several chapters are devoted to environmental issues such as urban sprawl, policy on management of public lands, invasive species, deer overabundance

in forests, and best predictions for future effects of climate change. Finally, this book highlights the grand achievements of Wisconsin ecologists over the last several decades by drawing on "local" experts, most of whom are internationally renowned scientists. Few areas of the world have such a rich array of research on so many topics to draw from as does the state of Wisconsin.

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ADAPTIVE GOVERNANCE: THE DYNAMICS OF ATLANTIC FISHERIES MANAGEMENT. *Global Environmental Accord: Strategies for Sustainability and Institutional Innovation.*

By D. G. Webster. Cambridge (Massachusetts): MIT Press. \$67.00 (hardcover); \$27.00 (paper). xix + 391 p.; ill.; index. ISBN: 978-0-262-23270-8 (hc); 978-0-262-73192-8 (pb). 2009.

Although scientists have already long expressed their concerns about overharvesting of the world's fish stocks, political actions to reduce fishing pressure have often been surprisingly slow. This is particularly true for migratory marine fish targeted by several states, which differ in terms of their economical and political interest. In her book *Adaptive Governance: The Dynamics of Atlantic Fisheries Management*, Webster investigates the dynamics of international fisheries management for highly migratory tunas and billfishes. For this purpose, she develops a vulnerability response framework to predict and analyze how individual states react to concerns associated to overfishing, depending on the vulnerability of their domestic fleets on expected economic costs. Yet the framework is generic, thus making simplifications in its description of the process through which the management evolves, it is also able to capture several typical features of this process. Examples illuminating how the management of tunas and billfishes has developed over past decades show the power of the framework in capturing several phases associated with finding commonly agreed ways to regulate these fisheries, but also point to weaknesses in assessing states' responses purely based on economic interests. In this respect, the book provides a useful picture of how economic vulnerability affects the negotiation process and compromises made among counterparts sharing the same resources.

From a wider perspective of biologically based harvesting and conservation, the approach taken in the volume obviously omits several issues influencing fisheries management decisions. However, as the author states, her approach serves as a first step in understanding the dynamics of international fisheries management and it can be ex-