Preface

After decades of public interest in nature and the environment, the United Nations focused worldwide attention on conservation by declaring 2010 to be the International Year of Biodiversity and 2011 to be the Year of Forests. The general public has absorbed this message and is asking its political leaders to provide the policy changes needed to address issues of conservation. Conservation biology is the field that seeks to study and protect the living world and its biological diversity (or biodiversity in its shortened form). The field emerged during the last 35 years as a major new discipline to address the alarming loss of biological diversity. The threats to biodiversity are all too real, as demonstrated by the recent recognition that fully one-third of amphibian species are in danger of extinction. At the same time, our need to remain hopeful is highlighted, for example, by increasing sea turtle populations at many locations throughout the world following comprehensive conservation efforts. Many examples described in this book show that governments, individuals, and conservation organizations can work together to make the world a better place for all living things.

University students continue to enroll enthusiastically and in large numbers in conservation biology courses. The first (1995), second (2000), third (2004), and fourth (2008) editions of *A Primer of Conservation Biology* sought to fill the need for a "quick" guide for those who wanted a basic familiarity with conservation biology. Like its predecessors, this fifth edition of the *Primer* is designed for use in non-majors courses and short courses in conservation biology and can also be used as a supplemental text for general biology, ecology, wildlife biology, and environmental policy courses. It is also intended to serve as a concise guide for professionals who require a well-documented overview of the subject but do not require in-depth case studies or lengthy scientific discussion. *Essentials of Conservation Biology*, now in its fifth edition, is recommended to readers who want this more comprehensive treatment of the subject.

This fifth edition of the *Primer* reflects the excitement and new developments in the field. It provides coverage of the latest information available on a number of topics, including the expanding system of marine protected areas, funding for conservation projects, and linkages between conservation and global climate change. It also highlights new approaches culled from the literature on topics such as species reintroductions, population viability analysis, protected areas management, and payments for ecosystem services.

In keeping with the international approach of conservation biology, I feel it is important to make the field accessible to as wide an audience as possible. With the assistance of Marie Scavotto and the staff of Sinauer Associates, I have arranged an active translation program, beginning in 1995 with a translation of Essentials into German, followed by a Chinese translation in 1997. It became clear to me that the best way to make the material accessible was to create regional or country-specific translations, identifying local scientists to become coauthors, and to add case studies, ples, and illustrations from their own countries and regions that would be more relevant to the intended audience. To that end, in the past 12 years editions of the Primer have appeared in Brazilian Portuguese, Chinese (two editions), Czech (two editions), Estonian, French with a Madagascar focus, Greek, Indonesian (two editions), Italian, Japanese (two editions), Korean editions), Mongolian, Romanian, Russian, Spanish, and Vietnamese. In English version of the Primer with a South Asian focus has also been published. Editions of Essentials have appeared in Arabic, Hungarian, Romanian, and Spanish with a Latin American focus. New editions of the Primer for France, Pakistan, Turkey, Bangladesh, and Germany, and the Essentials in Chinese are currently in production. It is my hope that these reasslations will help conservation biology develop as a discipline with a global scope. At the same time, examples from these translations find their way back into the English language editions, thereby enriching the presentation.

I hope that readers of this book will want to find out more about the estinction crisis facing species and ecosystems and how they can take action balt it. I encourage readers to take the field's activist spirit to heart—use to find organizations and sources of information on how belp. If readers gain a greater appreciation for the goals, methods, and importance of conservation biology, and if they are moved to make a diffeeting in their everyday lives, this textbook will have served its purpose.

Available to qualified adopting instructors is an Instructor's Resource that includes electronic versions of all the figures, photos, and tables from the textbook.

Acknowledgments

I sincerely appreciate the contribution of everyone who helped make this book accurate and clear. Individual chapters in this edition were reviewed Dana Bauer, Linus Chen, Richard Corlett, Elizabeth Freeman, Lian Pin David Lindenmayer, Meg Lowman, Michael Reed, and Anna Sher. Kaufman of Boston University provided expertise on marine systems.

Numerous people offered specialized input that helped make the examples and figures current and accurate. I would particularly like to recognize the contributions of Miguel Ferrar, Lucas Joppa, Jay Odell, Ben Phelan, Craig Packer, and Kent Redford.

Jessica Susser was the principal research assistant and organizer for the project, with additional help from Nicole Chabaneix, Libby Ellwood, Caitlin McDonough, Michelle McInnis, Caroline Polgar, and Jasper Primack. Danna Niedzwiecki provided invaluable help in the production of the book, with numerous suggestions on how to make the book friendlier to student readers. Thanks to Lou Doucette for her skillful copyediting and to Andy Sinauer, Chris Small, David McIntyre, Ann Chiara, Janice Holabird, and the rest of the Sinauer staff who helped to transform the manuscript into a finished book.

Special thanks are due to my wife Margaret and my children Dan, Will, and Jasper for encouraging me to fulfill an important personal goal by completing this book. I would like to recognize Boston University for providing me with the facilities and environment that made this project possible and the many Boston University students who have taken my conservation biology courses over the years. Their enthusiasm and suggestions have helped me to find new ways to present this material. And lastly, I would like to express my great appreciation to my coauthors in other countries who have worked with me to produce conservation biology textbooks in their own languages, which are critical for spreading the message of conservation biology to a wider audience.

Richard Primack Boston, Massachusetts March, 2012