

Lab members Andrew Pezda, Andrei Skelly, Lindsay Stankus, Kaylynne Dennis, and Bopi Biddanda (left to right) displaying books that have been reviewed or are under review by the lab.

Beyond the bench: How book reviews build better lab communities

By Bopi Biddanda

WHO READS BOOKS these days? For the most part, multimedia options have limited the use of physical books. Most students and scholars barely keep up with the key developments in their chosen field given the deluge of journal articles that regularly show up in their inboxes. Yet books that are scholarly works covering in-depth aspects of various subjects fill an important niche in everyone's growth, both in the sciences and humanities.

About two decades ago, I stumbled upon the idea of involving my lab members in group reading over the summer and preparing reviews of select recently published books in the field. Over the years, these summer activities have helped expand everyone's topical expertise, trained lab members in science communication, and, importantly, contributed to team-building among lab members.

I choose from a pool of books that I come across, such as those reviewed weekly in journals such as *Science* and *Nature*, those discussed on National Public Radio, or those recommended by colleagues or friends. I then buy a copy of the book for lab members to share, encouraging anyone who is especially inspired by the book's topic to take the lead on reading and writing the first draft of a review. Commonly, a student serves as the first author, and it is their first chance at being the lead on a collaborative writing project outside the classroom. As the book is circulated among the lab members, I encourage them to take notes, mark the margins with pencil, and collect their thoughts in advance of short group discussions that I help to schedule once everyone has completed the book. I typically choose books on broad, accessible topics (such as popular science), and I often collaborate with colleagues on multidisciplinary books covering more specialized subjects, where I can benefit from another's expert perspective.

> Like many shared activities, collective book reviewing strengthens communication, enriches learning, and fosters social cohesion within a group.

Not all reviews end up suitable for publication, but all carefully selected books provide authors with a valuable learning experience. Taking the pulse of an entire book in a few hundred words is challenging. First drafts occasionally

lack focus or are biased in some way. Collaborative input and discussions with co-readers often reset the focus and help develop a complete review worthy of submission to a publication. For students and early career scholars, published reviews showcase their interpretive and writing abilities to a broader audience. Book reviews in magazines and society newsletters reach wider audiences than articles in specialized journals, helping to communicate science and the humanities to the public. Moreover, collective review work connects participants—especially when the exercise actively incorporates input from all readers.

Some of the books my lab has recently reviewed are shown in the preceding photo. We are also expanding the scope of our reviews to include online-only publications (e.g., *Hoodwinked in the Hothouse: Resist False Solutions to Climate Change* and *UN World Water Development Report 2026 Water for All People*).

Like many shared activities, collective book reviewing strengthens communication, enriches learning, and fosters social cohesion within a group. Just choose a recently published book or report that piques your interest, gather your team, and dive in. The experience will not only deepen your lab's shared knowledge and connections, but it may even open exciting new avenues for your teaching or research.

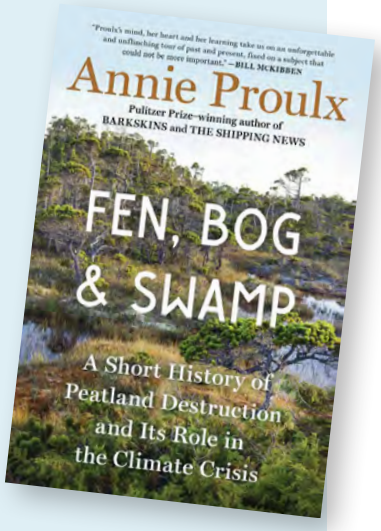
Bopi Biddanda is at the Annis Water Resources Institute, Grand Valley State University.

BOOK REVIEW

Ode to our vanishing wetlands

In *Fen, Bog & Swamp: A Short History of Peatland Destruction and Its Role in the Climate Crisis*, American writer and PEN/Faulkner Award winner Annie Proulx celebrates the significance of wetlands to humanity, biodiversity, and climate change, while describing their disturbing worldwide decline driven by drainage for resource extraction, farming, and development. Though waterlogged wetlands cover only about 5% of Earth's land area, they play an outsized role in filtering large amounts of water and carbon, serving as critical habitats for both terrestrial and aquatic life. As wetlands have been drained and peat harvested, the carbon dioxide and methane stored within them have been released back into the atmosphere. Large-scale degradation of wetlands began in 17th century England with the draining of fens. In the North American Great Lakes basin, more than half of the wetlands have been lost since European colonization.

Proulx's book covers wetlands across the world—from Siberian bogs and Brazil's Pantanal wetlands to the Okefenokee Swamp in the U.S.—while simultaneously comparing the similarities, differences, and intricacies of the various wetland types. In Chapter 1, "Discursive Thoughts on Wetlands," Proulx makes a historical accounting of wetlands over thousands of years, until the post-Columbian global colonization, when wetland loss reached levels great enough to impact global water resources and climate. In Chapter 2, "The English Fens," she describes how fens, an integral part of human societies from prehistoric times (Fen Peoples of old Britain), have been mostly lost in just the last two centuries. In Chapter 3, "Bogs," Proulx describes the bogs of the world, comparing their past and present states. In the final chapter, "Swamp," which also includes mangroves, she emphasizes the importance of knowing historical baselines for dealing with changing realities such as the sinking shorelines of Louisiana and its drowning marshes as sea level rises. Throughout the book, Proulx explores the common theme of how shared histories, human use, and climate change have combined to shape Earth's wetlands over time.



Ultimately, Proulx's book is both a tribute to the world's wetlands and a timely call to action for their protection and conservation. Since its 2022 publication, however, new threats have emerged. For example, projected water consumption by burgeoning AI data centers is alarming, and widespread damage to wetlands is already being reported. Wetlands that take weeks to drain can take millennia to recover. However, wetland restoration is possible, and Proulx documents some notable successes. For example, a recent report has recorded encouraging signs of a worldwide recovery of coastal mangrove swamps over the last four decades, as natural regeneration has gradually overtaken anthropogenic degradation. There is hope. It is time to heed Proulx's plea to let live, conserve, and restore our wetlands.

By Kaylynne Dennis, Lindsay Stankus, Andrew Pezda, Andrei Skelly, and Bopi Biddanda. All authors are at the Annis Water Resources Institute, Grand Valley State University.