

HOPE MATTERS: WHY CHANGING THE WAY WE THINK IS CRITICAL TO SOLVING THE ENVIRONMENTAL CRISIS

KELSEY, E. 2020. Greystone Books, Vancouver, Canada. 229 pp. ISBN 978-1-77164-777-9, CA\$22.95.

Reading *Hope Matters* this summer felt serendipitous. The year has been marked by historic heatwaves, enormous wildfires, and devastating droughts overtop of an ongoing global pandemic—it's abundantly clear that we are starting to experience the impacts of the environmental crisis. In August, the International Panel on Climate Change released their sixth assessment (IPCC 2021), which the chief of the United Nations called 'code red for humanity.' As a scientist with a clear understanding of forecasting models and as a mother of a young son (with another on the way), this year has made it hard not to despair about the future. In her book, *Hope Matters: Why Changing the Way We Think Is Critical to Solving the Environmental Crisis*, Elin Kelsey explains how the environmental crisis is also a crisis of hope, and provides a recipe for an antidote.

Kelsey outlines the extent to which, thanks to social media and fear-based reporting, each year we are being fed a diet of increasingly gloomy news about the environment. All this doom and gloom causes feelings of despair and hopelessness. There is significant evidence that despair leads to apathy, disengagement, and paralysis. Rather than shocking people into action, despair reduces our ability to find creative solutions. In fact, Kelsey outlines several surprising ways in which our fear and anxiety about the future of the planet plays out: from increased consumption to distrust. We face a similar problem of emphasizing gloom in conservation science, where much of our research remains focused on identifying threats and the mechanisms causing changes, rather than designing and implementing urgently needed solutions (Williams *et al.* 2020). As such, a fraction of ecological evidence is useful for conservation policy or practice (Knight *et al.* 2008), and there is little evidence for the effectiveness of many routinely implemented conservation interventions (Sutherland 2020). Knowing what solutions work matters. And as Kelsey outlines in her book, spreading information about these successful solutions also matters.

To be honest, I was skeptical about the book because of the use of the word 'hope,' whose definition generally includes something along the lines of 'a feeling of expectation for certain things to happen'. As someone who is regularly outspoken about the need for environmental action and solutions, I was unsure of how and why hope matters. It seems I'm not the only one, as Kelsey spends much of a chapter explaining that hope is not about delusions of a magical cure to our environmental problems, it's about taking action. According to hope theory, hope is goal-directed and process-based, requiring us to make a change, assess the outcomes, readjust, and bounce back after failure. Importantly, anger and hope are not opposites. Both are good motivators. After all, anger at social and environmental injustice has led to social movements and activism at a global scale. Although anger is important, the concept of hope includes excitement, inspiration, compassion, kindness, willpower, compassion, and joy; making it an essential ingredient in tackling environmental issues.

There were many aspects of *Hope Matters* that resonated with me as a new faculty member in environmental sciences. The need to move from understanding threats to designing and testing solutions has already and will continue to shape my research and

teaching program. Academia is often still defined by a competitive culture and antiquated stereotypes, including a "publish or perish" mantra, unrealistic workload expectations, bullying, and intimidation. Thus, I found the chapter on the importance of empathy, kindness, and compassion inspiring. As I can attest to, having worked with many kind and generous collaborators, empathy leads to engagement and productivity. Compassion is contagious and it turns out that people with higher empathy are more likely to engage with environmental issues. What a great message to teach the next generation of environmental scientists. In one of my favourite chapters, Kelsey lists a variety of inspiring stories demonstrating passionate people's determination to make the world a better place. I was excited to see the link with social justice and decolonization. Among the examples of hopeful environmental solutions were Indigenous-led initiatives, such as granting nature rights of personhood and the increasing number of Indigenous Protected Areas. I look forward to creating a culture of action and equity fueled by compassion in the academy.

As marine ornithologists, it can be almost impossible not to feel gloomy about the state of the environment. Seabirds are wide-ranging species that face colossal threats, from climate change to industrial over-fishing (Sydeman *et al.* 2021). I remember the heavy feeling at the end of the day at a Pacific Seabird Group meeting: a morning of plastic pollution followed by an afternoon of bycatch. It's no wonder the final banquets were the most fun and outrageous parties—we needed to shed the malaise of ingesting such distressing information about the animals we love. And yet, hope pervades seabird conservation. Attempts to remove invasive mammals, among the top threats to seabird populations, have occurred on over 1200 islands around the world (Holmes *et al.* 2019) leading to widespread increases in seabird populations (de L. Brooke *et al.* 2018). Mitigation measures to tackle seabird bycatch are increasingly being rolled out, including a remarkable success story in Namibia where demersal longline fisheries reduced seabird mortality by 98% after a law was passed mandating bird scaring lines on fishing vessels (Da Rocha *et al.* 2021). Community members of Honolulu have started a fan group dedicated to recording observations of urban nesting white terns (*Gygis alba*).

Although *Hope Matters* did not curb my eco-anxiety completely, perhaps an impossible task for a conservation scientist, it provided a powerful reminder: it's time to roll up our sleeves and use all of our efforts to combat the existential threat of environmental crisis using compassion and kindness.

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THE GULL NEXT DOOR: PORTRAIT OF A MISUNDERSTOOD BIRD

TAYLOR, M. 2020. Princeton University Press, Princeton, USA. 192 pp. Hardcover: ISBN 978-0-691-20896-1, US\$24.95

If there is any bird that divides opinions on coastlines around the world, it must surely be the gull. On the surface, gulls are hard to like. They're loud and they're in your face – sometimes literally. They browse through trash and chow down food as though it's their last meal. They scuffle over your dropped piece of pizza and evacuate their bowels on your car. The media loves to put out sensationalist “seagull” stories, reporting on gulls taking people's dentures and attacking bald men, which no doubt fuels the polarisation of attitudes. They get accused of conspiring to steal lunches and of abducting pets twice their size. What's more, gulls are now breeding in increasing numbers on residential buildings (Rock 2005), so people are often faced with high levels of noise and excrement on a daily basis. However, for some people, gulls represent the sound of the seaside, and feeding them makes a good pastime, but a poll of British citizens showed that gull sympathisers are firmly in the minority (Dahlgreen 2015). It is understandable why Marianne Taylor felt the need to write a book entitled *The Gull Next Door: Portrait of a Misunderstood Bird*.

The Gull Next Door is a story about how one person came to notice and appreciate gulls, as well as an encyclopaedic-like overview of the most abundant gull species found in Britain. There is something in the book for every ecologist and nature enthusiast: it touches on cognition, sensory systems and foraging ecology, and has a whole chapter that focuses on identification. Taylor writes with good humour to keep the reader entertained throughout, and explains a great amount of information clearly and concisely. Taylor says she's not a larophile, but in many ways she is. It is clear that she has a deep love for gulls, and for nature much more broadly. But she doesn't stop at simply admiring the birds that frequent her backyard. She is extremely knowledgeable and clearly knows a thing or two about identifying tricky gull species, evidently having scratched the twitching itch a few times in her life. Additionally, the book is beautifully illustrated with the author's own drawings, and these encapsulate how much attention she pays to her subjects. They are testament to the time she has spent studying, understanding, and appreciating them.

This book, however, is not some sickly love poem to gulls, designed to trick you into thinking they are actually balls of fluffy cuteness (although the newly-hatched chicks certainly do a good job of ticking this box). Taylor is honest and matter-of-fact. These are predators, scavengers, and kleptoparasites, and they will eat whatever takes their fancy as long as it fits in their (rather big) throats. They can be cannibals, something that is hard to understand through the lens of human values. The book is a reminder that anthropomorphism works both ways: not only do people ascribe positive human traits to gulls and other animals, but also negative ones.

The main focus of the book, with their own dedicated chapter, and the focus of my research is the European Herring Gull *Larus argentatus*. This is the gull species that is probably most commonly encountered in towns in the UK. I was excited to see my research on gaze aversion mentioned, where I tested my hypothesis that gulls are less likely to try to take your food if they are being watched (Goumas *et al.* 2019). I was relieved that it was received well, but I was a little disappointed that it was attributed to scientists at the University of Essex rather than Exeter! This mistake is easy to forgive, however, as I didn't detect any further errors and the book is immensely enjoyable to read. Taylor also spends a lot of time discussing gull interactions with humans, a subject close to my heart and one that is increasingly important as humans continue to dominate more and more of the Earth's habitable land. Taylor talks about the herring gull's decreasing population size in the UK, which has resulted in it being placed on the country's Red list of Birds of Conservation Concern (Eaton *et al.* 2015), and how shifting baseline syndrome can muddy the waters. Many believe the herring gull's decline is simply a drop to former levels, but at some point these former levels were at a time when persecution was rife.

The book has some good take-home messages. I was pleased to see the message of “don't feed the gulls” conveyed, despite Taylor's confession of finding it difficult to do otherwise. I can relate strongly to this. Humans often have a powerful desire to care for animals and form bonds with them, and the easiest way we can connect with them is by feeding them. This seems to make us feel

good, but – beyond the immediate food reward – it is unlikely to benefit the animal. A gull that sees a human as a potential source of food is likely to approach them, be seen as a nuisance, and, ultimately, is at a higher risk of being harmed by people who do not share the author's view that gulls shouldn't be killed simply for nabbing a chip. Furthermore, Taylor reminds the reader that gulls are protected by law; contrary to many people's beliefs, gulls aren't on some list of "pest species", and it is illegal to kill a gull in the UK without a licence.

As ever, I do wonder if the people who would gain the most out of this book – those that are content with identifying species to "seagull" level, or those who would be happiest if gulls were extinct – would be likely or willing to read it. I would say that one certainly has to have a love of nature to really enjoy appreciate this book, and perhaps there are people out there who have overlooked gulls but would appreciate learning more about them. I hope that anyone who does read it will come away with a renewed interest in the natural world, and in protecting it. Many ornithologists will already know much of what Taylor writes, but others may have bypassed gulls and wish to gain

some knowledge about them without having to dive into more formal literature. Either way, it is a charming book and one I would recommend to most people.

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