

Edited by Scott E. Simon
and Frédéric Laugrand

Feathered Entanglements
Human-Bird Relations in
the Anthropocene



Contents

List of Figures and Tables / vii

Preface and Acknowledgments / ix

Introduction: Humans and Birds in the Anthropocene / 3
Frédéric Laugrand and Scott E. Simon

Part I **Birds Are Good to Be With (Birds as Partners)**

- 1 Multiple Joining Methods among Fish, Birds, and Fishers:
A Regional Case Study of Chinese Cormorant Fishing / 29
Shubei Uda
- 2 Bird-Singing Contests Rules and Communication Frames for
Animals and Men: Sonorous Ethnography with the Bulbul
Breeders of Southern Thailand / 52
Etienne Dalemans
- 3 The Rooftop of the City: Pigeon-Keeping Practices and the
Construction of Masculinities in Amman, Jordan / 76
Perrine Lachenal
- 4 From the Ground to the Canopy: An Introduction to the
Tarkine Forest through Its Birds / 97
Aïko Cappe and Colin Schildhauer

5	Entangled Lives: Toward a Phenomenology of Amateur Birding in Modern Japan / 118	<i>Scott E. Simon</i>
Part 2 Birds Are Good to Think With (Birds in Symbolic Systems)		
6	Three Birds, the Emotions, and Cycles of Time in the Central Himalayas / 147	<i>John Leavitt</i>
7	Time, Space, and Typhoons in Ibaloy Birdlore (Philippines Cordillera) / 182	<i>Frédéric Laugrand, Antoine Laugrand, Jazil Tamang, and Gliseria Magapin</i>
8	Birds as Metaphors and More in a Changing Indonesian Community / 208	<i>Gregory Forth</i>
Part 3 Birds Are Good to Craft With (Birds in Material Culture)		
9	From Good to Eat to Good to Make: Ethnographic Archaeology of Bird Representations in Ancient Japan / 233	<i>Atsushi Nobayashi</i>
10	Birds as Figurative Patterns and Artifacts as Efficient Agents: Agency and Ritual Behaviour among the Mentawaians of Bat Rereiket (Siberut, Indonesia) / 253	<i>Lionel Simon and Syarul Sakaliou</i>
11	Environmental Shift and Entangled Landscapes: Use of Birds in Amis Ritual Practices of Taiwan / 277	<i>Yi-tze Lee</i>
	Epilogue: The Emergence of Ethno-Ornithology / 303	<i>Andrew G. Gosler</i>
	List of Contributors / 314	
	Index / 319	

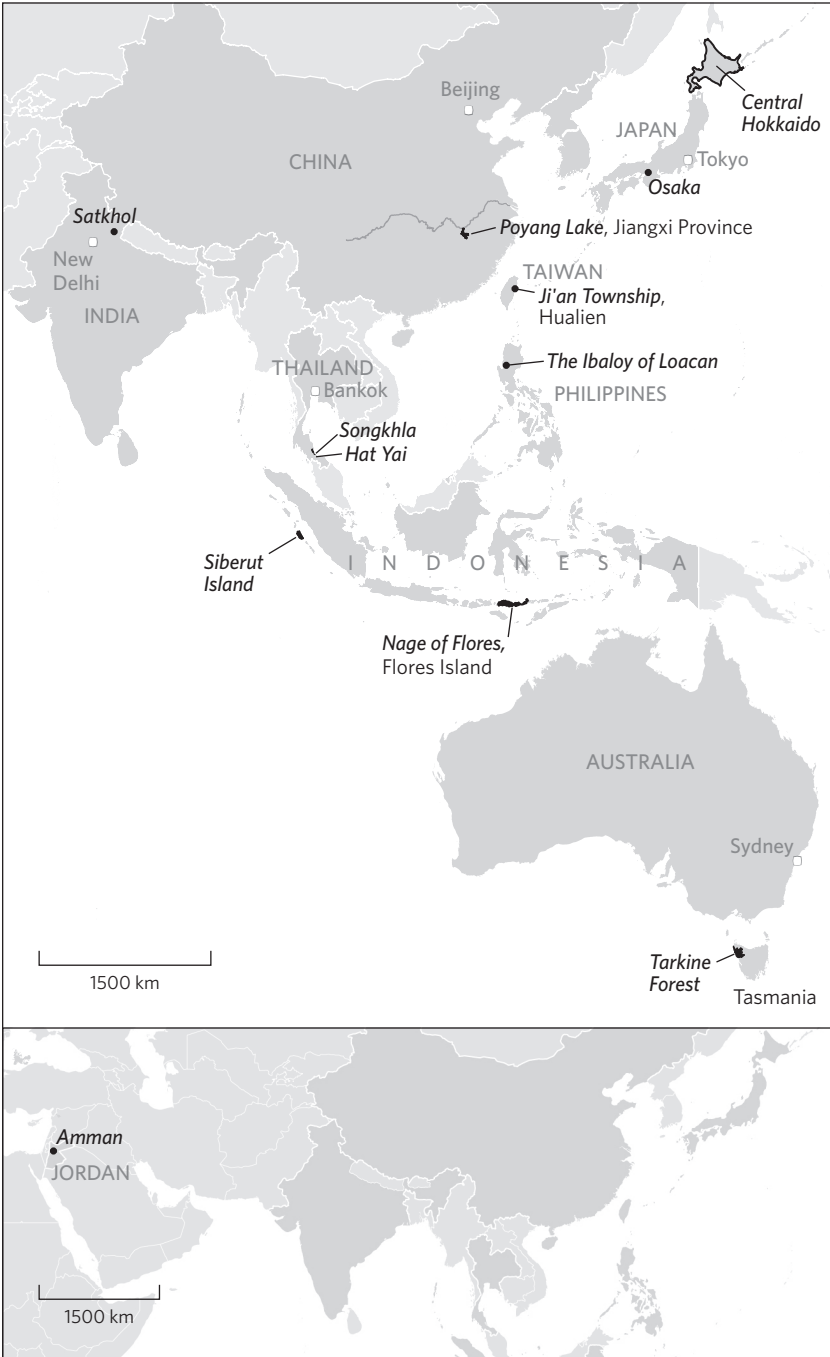


Figure 0.1 Map of regions discussed in the book. | Cartography by Eric Leinberger

Introduction

Humans and Birds in the Anthropocene

Frédéric Laugrand and Scott E. Simon

I would have liked, once in my life, to communicate fully with an animal. This goal is unattainable. It is almost painful for me to know that I will never be able to know the matter and structure from which the universe was composed. That would have meant: being able to speak with a bird. But this is a frontier that we cannot pass. Crossing this border would be a great pleasure for me. If you could find me a good fairy to grant me a wish, this is what I would choose.

– Claude Lévi-Strauss, “Entre Marx et Rousseau”¹

HUMANS HAVE ALWAYS been fascinated by birds, like Claude Lévi-Strauss, who dreamt of being able to communicate with them. They are omnipresent in mythology, particularly in the Americas. Before resigning himself to the impossibility of his dream, Lévi-Strauss wrote this conclusion to *The Naked Man* ([1971] 1981, 690–91):

When, in *La Pensée sauvage* [*The Savage Mind*, 270–72], I interpreted the names we give to birds as indicating that their various species, taken as a whole, appear to us as a sort of metaphorical counterpart of human society, I did not realize that an objective relation of the same type exists between their brains and ours. It would seem that mammals and birds, in evolving from their common source, the reptiles, followed two divergent paths as regards the development of the brain and arrived at complementary solutions.²

Here, the anthropologist evokes the neurological structure of human and avian brains. His prudence contrasts with the audacity of some ornithologists, such as Noah Strycker (2018), who seems to think that he can understand, as the title of his book *Ce que les oiseaux disent des hommes* suggests, “what birds say about humans.” Humans and birds have often collaborated, such as in hunting and aerial surveillance with falcons and eagles, during war, in games with pigeons, breeding fowl and other birds, sharing daily life with parrots and parakeets, and feeding corpses to vultures in traditional Tibetan funerals (Satheesan 1998; MaMing et al. 2016). Humans control these various situations, but the birds are sentient beings who are receptive to them. For their own reasons, birds fly across the entire geography of human societies, in ways paralleled by no other living beings. It is thus fascinating to think about the social and cultural entanglements that occur among the intersections of human and bird migration and movement.

At this hour of the sixth extinction, many humans feel the tragedy of having failed to communicate with birds, even as our knowledge of them has developed throughout history. Shepard Krech (2005, 718) notes that about 150 avian species have vanished since 1800; as of 2005, another 1,100 were threatened (see also Krech 2009). David Steadman (1997, 51, 77) observes that such a loss must be “recognized as one of the major environmental consequences of the human colonization of Oceania,” where birds are not only eaten but also kept as pets. Today, philosopher Thom van Dooren (2014, 2019) links the destiny of humans with that of birds. Contemporary anthropology is now taking stock of these intersubjective relations with avian fauna and the ties that link humans to them as our fellow living beings.

The History of Ornithology and the Study of Birds

Birds have long fascinated humans. Ancient petroglyphs and cave paintings attest to this interest. Recently, from a study of over a thousand eggshells, anthropologists and archaeologists discovered that the cassowary may have been one of the first birds raised by humans, in Papua New Guinea over eighteen thousand years ago. Hunters may have collected the unhatched eggs of this dangerous but flightless bird and raised the chicks to adulthood (Douglass et al. 2021). Falconry also emerged early among hunting peoples in the Orient, appearing later in the West. Without a doubt, these practices were among the first configurations in which humans and birds

worked together in a kind of entanglement of their relations. As Shuhei Uda discusses in [Chapter 1](#), fishing with cormorants has a long pedigree in China. Pierre Gourou (1972, 125) describes it as well, noting that fishers sometimes share a bit of opium with the birds to ensure their loyalty. In short, the knowledge and interest that humans have for birds are very much a part of ancient traditions. In the West, the Etruscans created a divinatory science that the Romans elaborated by inventing the term “auspice” (from *auspicum*, omen, and from *specere*, to look). The Greeks christened it ornithomancy: the study of bird flight as an omen of the future. Aristotle and Pliny devoted lengthy reflections to birds, trying to identify and categorize them.

Bird symbolism took off in Abrahamic traditions and Romanesque art (Davy 1992). In a text written by Persian poet Farid-Ud-Din ‘Attar (1996), thirty birds under the leadership of the hoopoe, the wisest bird from the Qur’an, search for the Simorgh, who will be their king. Christian imagery often refers to birds, such as the dove and the swallow, or the Caladrius, a legendary snow-white bird said to live in the king’s house and able to take sickness into itself and fly away, thereby healing the person. In the Middle Ages, the most interesting works on birds are illustrated falconry manuals imported from Mesopotamia and other regions of the Orient. European scholars spread this knowledge. A good example is *De arte venandi cum avibus* (*On the Art of Hunting with Birds*) by Emperor Frederick II (1194–1250). At that time, chicken raising also flourished across Europe. In the same manner, the chicken probably came to Europe from Asia around the seventh century, as China and Papua New Guinea practised poultry raising.

With all these developments, knowledge about birds increased. In the sixteenth century, several studies, such as those by Guillaume Rondelet, William Turner, and Conrad Gessner, described multiple species of birds. In his 1555 book *Histoire de la nature des oyseaux* (*The History of the Nature of Birds*), Pierre Belon was one of the first to propose a classification system for all birds. Ulisse Aldrovandi published the first naturalist encyclopedia, of which three volumes were dedicated to birds, divided into land birds, water birds, and songbirds. Centred on the description and classification of these animals, these works multiplied in the seventeenth and eighteenth centuries, with a considerable number of achievements that cannot all be cited here. Scholars soon studied exotic species and the anatomy and morphology of birds. At the time, taxidermy techniques were deficient, preventing the constitution of sustainable collections. In the mid-seventeenth century, the first great ornithologists emerged, mostly in England. Francis Willughby

and John Ray's work *Ornithologiae libri tres* (1676) was the first scientific treatise on birds in Europe. In 1758, Carl Linnaeus refined this knowledge by proposing that birds be classified according to the morphology of their beaks and feet. Again, this knowledge developed mostly in England, with *Historiae avium* by Jacob Theodor Klein (1750) and contributions by Thomas Pennant, John William Lewin, and John Latham. In France, George-Louis Leclerc de Buffon, Louis Jean Pierre Vieillot, and several others proposed various classifications. In 1817, Georges Cuvier identified six orders: birds of prey, passerines, climbers, Gallinaceans, waders, and web-footed birds. Henri Marie Ducrotay de Blainville added three new groups: parrots, pigeons, and ostriches.

The first ornithology associations were founded in the mid-eighteenth century in the Anglo-Saxon world. Humans who were passionate about birds sought to understand their distribution and phylogeny – and soon, the evolution of their species. Paradoxically, many species disappeared during this period because of hunting and the overexploitation of resources. Some scientists, such as Richard Bowdler Sharpe, proposed new classifications, whereas others, thanks to the banding technique developed in 1899, researched migratory birds. In the twentieth century, James Lee Peters created his classification system, which evolved with the addition of DNA technology, especially in terms of phylogeny.

This short overview of ornithology is incomplete, as each country has its own naturalists and bird specialists. As just one example, France boasts Léon Olphe-Galliard, René d'Abadie, Jacques Delemain, Noël Mayaud, Jean Dorst, and Laurent Yeatman. We cannot forget the work of ethologists such as Konrad Lorenz or Amotz Zahavi, who, among others, allowed us to understand bird behaviours. John James Audubon, Robert Bateman, and others created art that revealed a strong intimacy between humans and birds. Philipp Franz Siebold worked with Japanese naturalists and illustrators during the isolationist Tokugawa period and amassed a large number of bird specimens and knowledge of birds that he published in volume 4 of *Fauna Japonica* in 1839 (Siebold et. al. [1839] 1975). The worldwide existence of various ornithological associations made it possible to collect considerable data about birds and gave rise to further entanglements.

In Europe, birds have long featured in folklore and literature. For example, in his monumental book on French folklore, Paul Sébillot ([1904–07] 2018) devoted two chapters to wild and domestic birds. In this book, he provides a substantial number of proverbs, sayings, stories, beliefs, and practices. In

1914, as the Great War broke out, famous French sociologist Robert Hertz ([1928] 1970) collected numerous testimonies, proverbs, and reproductions of bird cries from French peasants who were gathered in the trenches. Again, this wealth of information shows the richness of European traditions regarding birdlore. Nonetheless, a great deal of knowledge has disappeared, even as many regions are reviving some old practices.

An example is Hunt the Wren, an old custom that still lingers across Europe, particularly in Ireland and on the Isle of Man, though many of its features have changed. It is unclear whether the hunt retains its sacrificial dimension, but it has lost much of its meaning. In the old variants of the ritual, the captured wren – then considered the king of birds – was set on a ceremonial pole. On the Isle of Man, the ritual now takes place on December 26 (St. Stephen's Day) and consists of singing and dancing a traditional song around a decorated pole. In the eighteenth century, the bird was hunted and killed after prayers on December 24 or 25, then laid on a bier “with the utmost Solemnity” and buried in the churchyard (Miller 2018, ii). In Normandy, the wren was so important that it was named Bertault's God or the Ox of God. In the south of France, wrens were hunted in December; once a bird was captured, it was suspended inside two wooden hoops and shown to the public in the street, with people declaring, “Herewith the king of the birds” (Baudry 1861, 383). In Carcassonne, the wren was attached to a stick decorated with a garland made of leaves of olive, oak, and mistletoe. An English proverb keeps track of all these beliefs, showing that they also existed in England: “A robin and a wren are God Almighty's cock and hen” (Baudry 1861, 383). Edward A. Armstrong (1955, 1958) studied the historical and symbolic meaning of the wren and later traced the rich magico-religious beliefs concerning birds in a distant past, connecting biology, folklore, and paleontology.

Much of this knowledge has been lost or become the prerogative of passionate amateurs or specialists. Professional ornithologists are far less numerous than the amateurs and birders. Among the countless publications in ornithology, the *Handbook of the Birds of the World* is the newest encyclopedia covering the near totality of the living species of birds.³ The inventory remains incomplete because new species are still being discovered to this day.

In the non-Western tradition, knowledge about birds followed a different path, as non-Western peoples have shown little interest in phylogeny and classification projects. They prefer understanding the interactions of birds with other animals and their environs, concentrating on their nutritive and

healing properties, using their knowledge as needed for hunting or for understanding future events. Birds also feature in myths, rituals, hunting activities, and divinatory systems. As anthropologists have shown, they often indicate rhythms or deliver messages. For example, Lévi-Strauss ([1991] 1995, 88) observes,

All of North American mythology associates Owls with periodic phenomena: the alternance of day and night, on the one hand, the measured duration of human life on the other. There is a close relationship between these phenomena since souls, reincarnated into nocturnal birds of prey, inhabit the world of the dead during the day and come back at night to the world of the living.

The first anthropologists explored birds in detail and tried to understand local classifications (Bulmer 1967, 1989; Berlin 1990; Healey 1993), hoping to find links between Indigenous taxonomies and those of Western societies (Boster, Berlin, and O'Neill 1986; Van den Broek 1988; Hamil, Sidky, and Subedi 2002). In a rich vein of scholarship, many documented and discussed bird names and categories (such as Hohn 1973; Kane 2015). The work of Nicole Revel (1975) with the Palawan and of Gregory Forth (1996, 2004, 2006b, 2009, 2010) with the Nagé of Indonesia are particularly rigorous and exemplary in this respect. The authors were able, among other things, to show that Indigenous names for birds are often onomatopoeic, mimicking the calls, cries, and songs that birds produce.

The works mentioned above demonstrate the extent of the problem of categorization and symbolic knowledge. A good example of this conundrum is the cassowary, which the Karam of Papua New Guinea do not define as a bird (Bulmer 1967). By contrast, they see bats and fruit bats as birds or as beings connected to them (Laugrand and Laugrand 2023; Laugrand, Laugrand, and Simon 2023). Since the 1970s, anthropologists have widened their interests and studied the place and role of birds in shamanism, divinatory systems, popular imagery, and symbolic universes (Metcalf 1976; Dove 1993, 1996; Cauquelin 2006; Forth 2006a, 2007, 2016, 2017; Le Roux and Sellato 2006; Hutter 2008; Régnier 2008; Low 2011; Simon 2015, 2018; Laugrand, Laugrand, and Tremblay 2019).

Of course, what sets birds apart for the most part is their ability to fly. Rita H. Régnier (2007, 7) reminds us that nearly everywhere on the planet, bird flight “has for a long-time suggested ideas of freedom, independence,

weightlessness, and speed. This results in the role of a messenger attributed to the bird as intermediary between the world below and the world above, which is the residence of the divine.” Most parts of the bird possess meaning, especially the wings. For example, virtually all dragons and many other mythical beings are winged, recalling the link between reptiles and things that fly, first by revealing their common origins and secondly by enabling movement and migration (for an example opposing the python to the swan, see Geinaert-Martin 1992). Bird flight has given rise to various studies, especially in societies that observe birds to make predictions and that associate them with their ancestors or deceased souls. Feathers and feet are also meaningful, as in Papua New Guinea, where much of human dance reproduces or adapts bird behaviours.

The example of the Inuit and the raven is interesting since shamans are inspired by the bird’s behaviour to define that of two officiants who reunite human couples in winter ceremonies, thus renewing society. The beak of the raven inspired many societies on the northwest coast of Canada, especially the Haida and the Kwakwaka’wakw (Mauzé 2011), who use it in their masks for ceremonial transformation. The literature on ravens is also considerable, as the bird is widely distributed in the West and the Arctic (Charrin 1983; Oosten and Laugrand 2006; Fienup-Riordan 2017; Krupnik 2017; Kondo 2021) and largely in all paleo-Asiatic societies (Meletinsky 1973, 1980; Matthieu 1984). Raven is a creator and a trickster. Many Indigenous societies credit it with creating the sexes, introducing light, and bringing technology or tattooing; elsewhere, however, it is an unreliable being, a scavenger who consumes carrion and is associated with death. Ambivalent by nature, it resembles what makes society possible and what must remain outside it (Oosten and Laugrand 2006). In China and Japan, the raven is associated with the sun; and Japan has the Yatagarasu, a giant three-legged crow deity (Erkes 1925). Like other corvids, ravens can use tools, a technological skill that has particularly intrigued Westerners.

In anthropology, we are still learning about birdsongs. The pioneering scholarship of Steven Feld (2012) is now followed by many other ethnomusicologists. As in Christian traditions, where birdsongs correspond to human voices, those voices evoke the presence of the ancestors. Various ethnic groups in Siberia and Central Asia also pay great attention to the melody of bird sounds, considering some birds as messengers and connecting them to human souls. As in the old European tradition about the wren mentioned above, most of these groups believe that birds have a king or a

lord. This figure is often represented by an eagle who also played – with the raven – a key role in local shamanic traditions. Many birds are also eaten. Yet, the practices involving birds vary, as illustrated by the Buryats of south-eastern Siberia. One group of Siberian Buryats, the Khongodors, considered the swan as their totem animal and thus did not hunt it. They performed a ritual of sprinkling flying swans with milk. But some Buryat groups killed the bird for ceremonial purposes (Badmaev 2020, 108–9).

Studies on birds have become even more important with the ontological turn (Feld 2012; Kockelman 2016) and the ecological turn (Smith 2010; Jerolmack 2013; Jernigan 2016; Franco and Minggu 2019). Researchers have expanded their spectrum, analyzing the birds and their human observers (Keck 2015, 2020; Manceron 2015, 2022; Simon, [Chapter 5](#), this volume), bringing out a multitude of relations. Recently, two other currents have emerged. The first is related to the idea of developing a science for everyone and highlighting ethno-ornithologies rather than confining the approach to a singular ornithological knowledge, which permits the recognition of multiple ways of doing science and studying birds, including folklore (Tidemann and Gosler 2010; Gosler 2017; Despret 2019). Sonia Tidemann and Andrew Gosler (2010) crossed an important threshold by publishing the first volume that places not only professional ornithologists and anthropologists on the same level, but also Indigenous elders and others from various backgrounds. The second current is an interest in interspecies or multi-species relations (Rose 2009; Kohn 2013; van Dooren 2014; Chandler 2017; Rudge 2019), emphasizing the inextricable links between humans and birds, especially in regard to their destiny. These works vary by author, but they show an overarching shift: birds are no longer examined solely in terms of their representations and images, but from the perspective of relations and perceptions that consider their sensitivity, “wisdom” (Birkhead 2008, 2012, 2014), “intelligence” (Emery 2017), and “genius” (Ackerman 2016), as they are capable of deceiving, simulating, and manipulating.

This approach has proved enticing for ornithologists and philosophers, though it seems classic for many anthropologists who have long understood it in multiple field sites and in various contexts, thanks to revelations provided by the people with whom they work. For example, the Inuit monitor birdsong to predict the weather and seasonal change, observe ravens and loons to spot game in the distance, or take inspiration from the leadership techniques of geese. Inuit hunters all simultaneously admire, respect, hunt, and consume these animals, with which communication is possible in certain

contexts, notably shamanic ones. By contrast, the Sediq and Truku of Taiwan no longer use the *sisil* (*Alcippe morrisonia*), a songbird that is endemic to their country, to identify the presence of prey. Instead, the bird now symbolizes both the systems of ornithomancy that they once practised and the affirmation of identity in the Taiwanese indigenist movements. The *sisil* is still thought to bring good fortune, and it recalls the importance of the forest for the Indigenous peoples of Taiwan (Simon 2018, 152). Another key Taiwanese bird is the *qadis*, or Mountain Hawk-eagle (*Nisaetus nipalensis*), which is central to the Paiwan people (Huang et al. 2021). Its feathers are used on a headdress symbolizing the status of a tribal chief, a hero, or a high-ranked person. In the Philippines, eagles and hornbills are also seen as important birds (Gonzalez 2011).

More generally, close relations between humans and birds appear most particularly at the level of myth, to the extent that numerous tales use birds to think through big problems that can affect humans, such as impossible marriages, incest, violence, and cannibalism. However, though humans have greatly progressed in their knowledge of birds and bird communication, species barriers, hierarchies, and other important distinctions remain. In overcoming these obstacles, totemic systems have gone the farthest in integrating certain things that fly, such as bats, into the very heart of human kinship systems (see Rose 2009). Animist systems also establish equivalencies between humans and things that fly, but though these considerations are grounded in respect for non-human species, they in no way exclude hunting them. We should recall that, as Lévi-Strauss demonstrates, Western societies themselves conceive of the world of birds as a metaphorical human society or a parallel world. This appears not only in European mythology and folklore but also in the naming of birds, which tends to be metonymic rather than metaphorical. As Lévi-Strauss (1966, 205) explains, “When species of birds are christened ‘Pierrot,’ ‘Margot’ or ‘Jacquot,’ these names are drawn from a portion which is the preserve of human beings and the relation of bird names to human names is thus that of part to whole.” Significantly, the situation is the opposite for dogs, who do not form a distinct society but are part of human society and are usually given metaphorical names (such as Medor or Fido). Thus, Lévi-Strauss (1966, 205) formulates a general rule: “When the relation between (human and animal) species is socially conceived as metaphorical, the relation between the respective systems of naming takes on a metonymic character; and when the relation between species is conceived as metonymic, the system of naming assumes a metaphorical character.”

The Bird: A Constant Model for Humans?

Ever since the first works on birds done on the basis of the major texts of Abrahamic religions and Eastern philosophies, historians have described birds as models who can deliver invaluable secrets, such as those regarding detachment, liberty, love, and beauty (Davy 1992). Marie-Madeleine Davy (1992, 9), a well-known historian of flying things, emphasizes several symbolic aspects of birds:

Nothing is more fascinating than the symbol of the bird for the reason of the diversity of domains in which he participates: flight, song, feathers and colours. An intermediary between the low and the high, the earth and the sky, not only does the bird offer a teaching, but he also possesses the rare privilege of constituting a model for humans.

In many civilizations, birds are often presented as heroes, major actors as the protagonists in numerous legends. The opinions of specialists of Asia and Europe about heroic birds converge, with birds appearing at once as heroes and divinities, to repeat the title of the rich collective work – *Oiseaux: Héros et devins* – edited by Régnier (2007). Another edited volume about Southeast Asian birds emphasizes their aesthetic and symbolic aspects, describing them as “divine messengers” (Le Roux and Sellato 2006).

In 2021, at the hour of the Anthropocene and the sixth extinction, the universe of birds has certainly not revealed all its secrets. The idea of the bird as a model and source of inspiration nonetheless remains intact. In a book dedicated to how to think about the living, the ethologist and philosopher Vinciane Despret (2021, 89) writes,

In the case of birds, the investigation resulted in a conclusion in the form of a happy ending: the constitution of a territory permits each person to co-inhabit with the others, parade around, and show his life force. If a bird whistles at the top of its lungs, it is for attracting attention as much as for materializing a boundary. Like words for humans, song permits the bird to weave a web around himself, to create relations, to exchange. Little by little, the original melody changes, fusions with that of the neighbours, and becomes a choir. It has even been found that birds pass the baton and organize “speaking tours.”

Neither aggression nor dominance are the basis of bird social life, a true model for inhabiting territory and playing with borders. The implication is crystal clear: humans, who have never stopped squabbling over territory, should learn a lesson from birds. Raphaël Mathevet and Arnaud Béchet (2020) provide a relevant example with their case study about the Camargue flamingo.

These lessons are not just about territory or governance. Biomimetism shows that humans have been inspired by birds for a long time. A nice example is the clockwork duck invented in the eighteenth century by Jacques de Vaucanson. A complex automaton made of hundreds of tiny parts, it ate and drank, appearing to digest the food and defecate like a real duck. De Vaucanson hoped to reconstitute the gastro-intestinal tract of the bird to determine whether it used a mechanical or a chemical process to digest food. But that is not all. Ducks inspired the Wright brothers and the engineer Alberto Santos-Dumont in their creation of airplanes with small wings in the front. Small wings near the front – or even the whole plane or missile using such a configuration – are still called “canards,” because they look like ducks with their necks stretched out. Aviators copied the curved wings of storks, as was the case of Otto and Gustav Lilienthal, who wrote the German original of *Birdflight as the Basis of Aviation* in 1889 (Lilienthal and Lilienthal 1911). Nowadays, the anti-glare vision of the Black Stork (*Ciconia nigra*), a fishing bird, is of interest to automotive engineers. As for the condor, it stimulated Paul MacCready in the construction of his *Gossamer Condor*, an airplane powered by pedals. Even in modern jets, winglets – tiny wings situated on the tips of the larger wings – reduce turbulence. Humans have also learned from the owl, making trains and planes less noisy by adapting the principle of the jagged feathers that give it silent flight. Many other human technologies came from observing birds, such as the aerodynamic biomechanics of the penguin, the form of the kingfisher used for high-speed trains such as the *shinkansen*, and the woodpecker’s beak for ice axes and jackhammers.

Birds are regularly honoured in many fields. The present text is no exception, as its objective is to explore the complex entanglements between humans and birds. The images, representations, and the place of birds vary considerably not only from group to group and culture to culture, but also according to the birds referenced. Thus, many hunting societies are fascinated by migratory birds. The Cree and the Inuit, for example, wait impatiently

for the arrival of the flocks that herald the spring and good meat but also their own summer dispersion, a more individual life after the restricted social life of Arctic winters. Birds announce the months and the seasons, as Robert Hertz ([1928] 1970) demonstrated by gathering information from the many French peasants who knew their songs and habits. Studying oral literature and the works of many writers, Daniel Fabre (1986) shows that birds have long been associated with expressions of love, but this use has begun to decline with modernity.

We also underline that though humans typically admire the beauty, qualities, and skills of birds, they can also be a source of dread, as illustrated in *The Birds* (1963), a well-known film by Alfred Hitchcock that was based on the eponymous short story by Daphne du Maurier. Set in a beach community in California, the film revolves around increasingly violent incidents in which birds attack humans. The director chose not to reveal why the attacks were occurring, hoping to bring out the primitive fear of being targeted without reason by furtive, rapid, and powerful beings. The shoot required many special effects, but the organizers were quickly overwhelmed by multiple incidents. The birds, including crows, sparrows, bullfinches, buntings, ravens, and gulls, did not always respond as expected by their trainers, even snapping at and harassing certain actors. In the West especially, fear of birds, or ornithophobia, affects many people, who cannot stand the sight of feathers and beaks. More broadly speaking, birds sometimes find themselves at the centre of major disagreements. An example is the Canada Goose, which finds itself in the midst of conflicts between conservation biologists, Indigenous hunters, and sports hunters (Roué 2009). In France, gulls have grown increasingly aggressive in markets, having become accustomed to receiving handouts of food from well-meaning people (Gramaglia 2010). And a flock of starlings can decimate a newly planted field in less than thirty minutes.

In many traditions, the flying bird is closely linked to the crawling reptile that has also stirred up fear since time immemorial. Davy (1992, 19) notes this opposition and that these animals have often been messengers, carriers of a secret language that must be deciphered. According to Genesis 1:20, the bird was created on the same day as the fish, and the reptiles appeared the next day. Davy writes that scientific knowledge has inverted this chronology – snakes and dinosaurs preceded birds, who are their descendants. But Psalm 148:10, Davy (1992, 20) adds, groups them together: “Praise the Lord, reptiles and winged birds.” She points out that for the Greeks, such

as Aristophanes, birds preceded the gods, and snakes originally had wings. Becoming winged, she underlines, is thus “both an acquisition and a return to the original condition, from whence comes the extent of the symbolism of the bird” (Davy 1992, 25).

According to paleontological tradition, the ancestor of the bird appeared some 160 million years ago, with *Archaeopteryx*, whose fossils were unearthed in Germany. Nonetheless, important vagueness remains. Recently, the place of *Archaeopteryx* as the forerunner of all birds has been contested, with the identification in China of *Xiaotingia zhengi*, which predates it (Kaplan 2011). Fossil remains indicate that *Xiaotingia zhengi* had feathers, claws, and teeth. The extant avian fauna go back 60 million years, with the appearance of the first cormorants and waders.

Regardless, this long history of birds and their contact with humans explains in part why they occupy such an important place in our myths. Asia abounds with traditions regarding serpent dragons – “mythic” birds without wings – many of which are featured on historical monuments. In China, India, Cambodia, and Indonesia, for example, these figures remain alive in iconography and stories, with perhaps the most ancient being the Chinese bestiary *Shan Hai Jing* (*Classic of Mountains and Seas*), portions of which were published as early as the fourth century BCE. The Abrahamic traditions are not to be outdone, and birds are present in their bestiaries as well. Thus, the dove is associated with light; its presence on many baptismal fonts evokes the Virgin and metaphysical purity, but also intelligence and chastity (Davy 1992, 71). Other birds, such as the swallow, the tit, or the peacock, convey positive connotations, but some species are unloved, which gives rise to many beliefs that are qualified as superstitious. So it is for the magpie, the raven, the owl, and the stork. Finally, many birds that are called the bird-of-paradise or the *simorgh* in Iran are of great value and evoke divinity or the Holy Spirit (Davy 1992). Literature, poetry, and the arts echo so many of these conceptions that it is not possible to go into detail here.

Associated simultaneously with the earthly world because of their reptilian origins and with the aerial, luminous world, as uncontested masters of the skies, birds can announce a death or deliver other messages by their presence or their flight. This capacity to link contrasting universes created ancient practices of ornithomancy but may also explain the fascination that birds still exercise over human communities. Such a fascination is rooted in a long past, as was brilliantly shown by Edward A. Armstrong (1958, 114) in his book on the folklore of birds:

Our enquiry into the origin of the English goose feast and the custom of breaking the wishbone has led us to some of the earliest magico-religious ideas known to have been cherished by man. As we proceed, we shall find further evidence that modern folklore is derived from ancient fertility conceptions which were once widespread throughout Europe and Asia, and even further afield.

This may explain why birdlore varies so extensively today and, at the same time, may reveal intriguing similarities.

From Cockfights to Extinction

Allow us to present two authors whose works on birds highlight their involvement with humans: Clifford Geertz, who founded interpretive anthropology, and Thom van Dooren, who originated what is called “environmental humanities.”

In the 1970s, American anthropologist Clifford Geertz (1973) published a pioneering study on the cockfight. He concentrated on Bali, though the practice exists in most Southeast Asian countries, in island nations of the Indian Ocean, and in northern France. Geertz was one of the first anthropologists to show that the cockfight ritual represented more than one might imagine and that it could be understood as a total social fact, to which one could add a reference to Marcel Mauss (1872–1950). On the basis of his work in Bali, Geertz founded a new research program that formed the underpinnings of interpretive anthropology. As he wrote, cockfighting was prohibited in Bali, except for a few special occasions. One day, as he attended an illegal match, the police arrived unexpectedly, the spectators scattered in panic, and he himself took refuge in a courtyard to avoid being arrested. Cockfighting may be banned in Bali, but it still engenders passion in the men who spend years raising and training the birds until the fateful day. The spectacle of the fight is brief compared to the months of preparation, and Geertz suggests that what is at stake has far more to do with the status of the owners than with a simple game in which bets are laid and money changes hands. Owners identify strongly with their birds, who fight for their lives in the ring, and bouts are preceded by an informal session in which owners choose which birds will be matched against each other. Often reserved for men of different families or clans, Balinese cockfights occur in strict intimacy. Esteem, honour, dignity, and respect are all at play (Geertz

1973). The matches divide or unite the groups of people involved in the cock fight, contributing sometimes to the tensions inherent in hierarchical societies and producing strong emotions, where vitality meets death. Thus, a major part of Balinese culture is represented in these cockfights. They are true contexts from which an observer can describe in depth the density of the culture that he discovers and can translate it or objectify it in texts that are the basis of his interpretation. With cockfighting, a whole series of entanglements comes to light.

Half a century later, other entanglements emerged in the work of Thom van Dooren. Positioning himself as a field philosopher, van Dooren connected several disciplines, from cultural studies to philosophy and from human and social sciences to science and technology to environmental studies. It was he who, following the work of Deborah Bird Rose, founded the journal *Environmental Humanities* in 2012, whose purpose was to animate a new field of the same name. Like many others in philosophy and anthropology, van Dooren was deeply concerned by the massive extinction and the degradation of biodiversity that characterizes this new era called the Anthropocene, in which human activity is devastating the environment. Combining biology, anthropology, and philosophy, he became interested in the disappearance of species, particularly of birds, seeking to understand how it affected humans. In *Flight Ways: Life and Loss at the Edge of Extinction*, van Dooren (2014) dedicates several chapters to birds that are on the path to disappearance. Referring to bird and animal species as “more-than-human others,” he emphasizes that entire sections of knowledge, wisdom, practices, histories, worlds, and existences will vanish if a species is eradicated. However, non-modern societies that are also preoccupied with the preservation of birds, though often by other means than just conservation, do not use this language. The Inuit do not advocate stopping the hunt of animals at risk of extinction, convinced that the lack of interest by humans is part of the problem. Two qualities of van Dooren’s work are his suggestion that human exceptionalism should be ended and his examples of the great tragedy now unfolding.

“Anthropocene,” “capitalocene,” and “pathocene” all designate the major impact that humans have had on the planet for the past several centuries, which is marked by total exploitation, both brutal and disproportionate, of what we agree to call “natural resources.” Everywhere on the earth, in the seas, and in the air, the human species is a predator, displaying little respect for other forms of life or for its own co-specifics. And as urbanization spreads

across the globe, the situation is becoming increasingly dire. Andrew Gosler and Caroline Jackson-Houlston (2012) describe the sad effects of this trend, pointing to a widespread disengagement from nature and an ignorance about it. One must admit that – like the Dodo on the island of Mauritius, the Great Auk, the Passenger Pigeon, and many others – birds have paid a heavy price for our folly. Measuring the catastrophe, van Dooren invites us to rethink our lives with the birds that surround us and to imagine solutions to stop their disappearance. He demonstrates great empathy for avian fauna and all the living things that are related to them. His monograph on vultures (van Dooren 2011) shows that these birds are not mere scavengers that devour carrion, but creators of worlds and incredible mothers. In *The Wake of Crows*, van Dooren (2019) continues to explore the question of how humans can live with crows in a world in full transformation due to processes of globalization, colonization, urbanization, and climate change. He answers the question based on observations he made with crows and imagines what could be multi-species ethics, taking for granted that we live in interspecies and interconnected communities.

So, how can we, standing on the shoulders of Lévi-Strauss, Geertz, and van Dooren, understand the tie between humans and birds?

Contents of this Book

In this volume, considering the era of the Anthropocene and working with new ethnographic contexts, we reflect on the links between the lives of humans and birds. We are interested in the Indo-Pacific, a broad geographical area that spans the countries near, adjacent to, and in the Indian and Pacific Oceans. Except for two chapters, most of the book is about human-bird relations along the East Asian–Australasian Flyway, a route followed by migratory birds as they shuttle from Siberia in the north, along the Western Pacific lateral, to Australia and New Zealand. The Indo-Pacific region, which is home to 60 percent of the human population, is marked by great cultural and biological diversity, including in the avian world. We are indebted to earlier works in anthropology, including ethno-biology and comparative studies of taxonomy, as well as to more recent intellectual currents such as the ontological turn and multi-species ethnography. Our goal is to learn from all these approaches as we seek to understand the various intersections between very real human and avian lives. The book is divided into three parts, named to evoke Lévi-Strauss's ([1962] 1991, 89) oft-cited dictum (about

totemism) that “animals are good to think.” We aim for a great diversity in writing style and perspectives on human-bird relations across this geographical space, with the result that the chapters are an eclectic mix of traditional ethnography, poetics, and even art.

In [Part 1](#), “Birds Are Good to Be With,” the authors take an innovative approach, looking at birds in their relations with humans. In [Chapter 1](#), Shuhei Uda uses the concept of multiple joining methods, or mutual joint commitment, to show how humans and cormorants have together created fishing practices that benefit both. He also compares cormorant fishing in China and Japan. Etienne Dalemans, author of [Chapter 2](#), conducted his ethnographic fieldwork in the Thai city of Hat Yai, focusing on singing contests between Red-whiskered Bulbuls. In a sonorous ethnography, he shows how humans and birds enter an acoustic community. In [Chapter 3](#), Perrine Lachenal takes us to the rooftops of Amman, Jordan, to explore how working-class men affirm their masculinity through pigeon keeping, a passion that is shared across the Indo-Pacific. Her sensorial ethnography provides new insights into a very intimate human-bird relationship. Anthropologist Aïko Cappe and artist Colin Schildhauer join forces in [Chapter 4](#) to understand the birds of the Tarkine rainforest in Tasmania. Theirs is a non-traditional ethnography, more about birds than humans, with the result being a poignant, or what some might call a romantic, piece of nature writing. In [Chapter 5](#), Scott E. Simon, inspired by the phenomenology of Maurice Merleau-Ponty and drawing from a year of fieldwork in Osaka, explores birding as a constant dance of fleeting encounters. These five chapters demonstrate that the characteristics of various birds shape the human-bird relationship at least as much as differences between human groups. There is much to be learned through observation of all the partners involved, non-human as well as human.

In [Part 2](#), “Birds Are Good to Think With,” the authors examine how birds become integrated into human symbolic systems, engaging with the work of Lévi-Strauss and making new contributions to cognitive anthropology. In [Chapter 6](#), John Leavitt, who has conducted field research in the Indian Himalayas since the early 1980s, discusses Kumaoni ways of living with birds and hearing emotion in bird sounds. Through stories from the field, and Kumaoni songs and literary traditions, birds are good to think with but also good to feel emotion with. [Chapter 7](#), a collaborative ethnography by Frédéric Laugrand, Antoine Laugrand, Jazil Tamang, and Gliseria Magapin, explores bird knowledge among the Ibaloy on the island of Luzon

in the Philippines. Because birds can indicate the passage of seasons and changes in weather, their wisdom is relevant to us, as we learn to live with the changes in climate and weather that are part of the Anthropocene. In [Chapter 8](#), Gregory Forth examines how birds are used as metaphors among the Nage of Flores Island, Indonesia. These chapters show that human-bird entanglements bring birds into human symbolic systems. The birds can thus help us to think in new ways about the world that we share with them and about our own lives.

[Part 3](#), “Birds Are Good to Craft With,” examines bird symbolism in craft and ritual. In [Chapter 9](#), Atsushi Nobayashi delves into archaeology and the bird-shaped artifacts produced during the Jomon and Yayoi periods of Japan. Speculating on their possible uses, he suggests that the Jomon period defined birds largely as good to eat, whereas the Yayoi period also saw them as good to make. In another collaborative ethnography, [Chapter 10](#), Lionel Simon and Syarul Sakaliou of Madobag village explore how the Mentawaians of Indonesia represent birds in decorative artifacts that are placed inside their houses. The objects bring well-being to the household while expressing Mentawai cosmology. In [Chapter 11](#), Yi-tze Lee, who does research with the Nanshi Amis people in the Eastern Rift Valley of Taiwan, shows how birds and feathers are used in rituals, which are subject to radical transformation due to the pressures of modernization. In the epilogue, Andrew G. Gosler discusses the importance of ethno-ornithology in an era in which humans everywhere seem increasingly alienated from birds and the rest of the natural world. Despite these changes, humans and birds are still involved in a relational ecology in the era of the Anthropocene. These chapters show various ways in which humans incorporate birds and bird symbolism into the material culture that, in turn, also shapes how humans perceive the social world.

These studies, ranging geographically from Jordan to Tasmania and across the major civilizations of India, China, Japan, and Austronesia, demonstrate a great diversity in human-bird entanglements. Birds are important in themselves, of course, but they also become incorporated into human societies as working partners, as parts of symbolic systems, and as material culture. Humans and birds can and do learn from one another. They are partners in worlding, in ways often overlooked in Western ontologies that usually imagine nature and culture as entirely separate realms, thus reducing birds to beings who are somehow “out there” in the forest, but who have

little to teach us. Perhaps the human species would not have caused so much ecological damage if it had imagined the world as full of other lives, including birds, who have a right to exist and to enjoy suitable, stable habitats. Attention to entanglements shows us that we need each other. As we collectively face the challenges of climate change and other negative impacts of the Anthropocene, it would behoove us to learn from birds and the wisdom of Indigenous and other peoples around the world.

NOTES

- 1 The French original reads, “J’aurais aimé, une fois dans ma vie, pleinement communiquer avec un animal. C’est un but inaccessible. Il m’est presque douloureux de savoir que je ne pourrai jamais trouver de quoi est composée la matière et la structure de l’univers. Cela eût signifié: être capable de parler avec un oiseau. Mais là est la frontière qu’on ne peut franchir. Traverser cette frontière serait un grand bonheur pour moi. Si vous pouviez me procurer une bonne fée qui exaucerait un de mes vœux, c’est celui-là que je choisirais.” C. Lévi-Strauss, “Entre Marx et Rousseau,” interview with F. Raddatz, *Die Zeit*, September 2, 1983, quoted in M. Lévi-Strauss and Loyer (2021, 123–24). Unless otherwise indicated, all translations in this introduction are by the authors.
- 2 The French original reads, “Quand dans *La Pensée sauvage* (p. 270–272), j’interprétais les noms que nous donnons aux oiseaux comme l’indice que l’ensemble de leurs espèces évoque pour nous une sorte de contrepartie métaphorique de la société humaine, je ne me doutais pas qu’une relation de même type existât objectivement entre leur cerveau et le nôtre. Il semble, en effet, qu’à partir des reptiles où ils ont leur commune origine, l’évolution cérébrale des mammifères et celle des oiseaux aient suivi des lignes divergentes, mais conduisant à des solutions complémentaires.”
- 3 Between 1992 and 2013, seventeen volumes of the handbook, edited under the direction of Josep del Hoyo, Andrew Elliot, Jordi Sargatal, and David Christie, et al., were published in Barcelona (del Hoyo et al. 1992–2013).

WORKS CITED

- Ackerman, Jennifer. 2016. *The Genius of Birds*. New York: Penguin Books.
- Armstrong, Edward A. 1955. *The Wren*. London: Collins.
- . 1958. *The Folklore of Birds: An Enquiry into the Origin and Distribution of Some Magico-Religious Traditions*. London: Collins.
- ’Attar, Farid-Ud-Din. 1996. *Le langage des oiseaux*. Paris: Éditions Albin Michel.
- Badmaev, A.A. 2020. “Traditional Buryat Beliefs about Birds.” *Archaeology, Ethnology and Anthropology of Eurasia* 48, 2: 106–13.
- Baudry, F. 1861. “Les mythes du feu et breuvage céleste chez les nations européennes.” *Revue Germanique* 14: 353–87.
- Berlin, Brent. 1990. “The Chicken and the Egg-Head Revisited: Further Evidence for the Intellectualist Bases of Ethnobiological Classification.” In *Ethnobiology: Implications and Applications*, ed. Darrell A. Posey and William L. Overal, 1: 19–33. Belém, Brazil: Museu Paraense Emilio Goeldi.

- Birkhead, Tim. 2008. *The Wisdom of Birds: An Illustrated History of Ornithology*. London: Bloomsbury.
- . 2012. *Bird Sense: What Is It Like to Be a Bird?* New York: Walker.
- . 2014. *Ten Thousand Birds: Ornithology since Darwin*. Princeton: Princeton University Press.
- Boster, James, Brent Berlin, and John O'Neill. 1986. "The Correspondence of Jivaroan to Scientific Ornithology." *American Anthropologist* 88, 3: 569–83.
- Bulmer, Ralph. 1967. "Why Is the Cassowary Not a Bird? A Problem of Zoological Taxonomy among the Karam of the New Guinea Highlands." *Man* 2, 1: 5–25.
- . 1989. "The Uncleaness of the Birds of Leviticus and Deuteronomy." *Man* 24, 2: 304–21.
- Cauquelin, Josiane. 2006. "Paroles d'oiseaux à Puyuma (Taiwan)." In *Les messagers divins: Aspects esthétiques et symboliques des oiseaux en Asie du Sud-Est*, ed. Pierre Le Roux and Bernard Sellato, 191–209. Paris: Éditions connaissances et savoirs.
- Chandler, Murray, ed. 2017. *The Winged: An Upper Missouri River Ethno-Ornithology*. Tucson: University of Arizona Press.
- Charrin, Anne-Victoire. 1983. *Le petit monde du Grand Corbeau, récit du Grand Nord sibérien*. Paris: Presses Universitaires de France.
- Davy, Marie-Madeleine. 1992. *L'oiseau et sa symbolique*. Paris: Albin Michel.
- Despret, Vinciane. 2019. *Habiter en oiseau*. Paris: Actes Sud.
- . 2021. "À l'écoute des oiseaux." In *Penser le vivant*, ed. Laurence Dahan-Gaida, Christine Maillard, Gisèle Séginger, and Laurence Talairach-Vielmas, 84–96. Paris: Éditions de la Maison des sciences de l'homme.
- Douglass, Kristina, Dylan Gaffney, Teresa J. Feo, Priyangi Bulathsinhala, Andrew L. Mack, Megan Spitzer, and Glenn R. Summerhayes. 2021. "Late Pleistocene/Early Holocene Sites in the Montane Forests of New Guinea Yield Early Record of Cassowary Hunting and Egg Harvesting." *Proceedings of the National Academy of Sciences* 118, 40. <https://doi.org/10.1073/pnas.2100117118>.
- Dove, Michael R. 1993. "Humility, and Adaptation in the Tropical Forest: The Agricultural Augury of the Kantu." *Ethnology* 32, 2: 145–67.
- . 1996. "Process versus Product in Bornean Augury: A Traditional Knowledge System's Solution to the Problem of Knowing." In *Redefining Nature: Ecology, Culture and Domestication*, ed. R.F. Ellen and Katsuyoshi Fukui, 557–96. Oxford: Berg.
- Emery, Nathan. 2017. *L'étonnante intelligence des oiseaux*. Paris: Éditions Quae.
- Erkes, Eduard. 1925. "Chinesisch-Amerikanische Mythenparallelen." *T'oung Pao*, 2nd ser., 24, 1: 32–53. <http://www.jstor.org/stable/4526775>.
- Fabre, Daniel. 1986. "La voie des oiseaux: Sur quelques récits d'apprentissage." *L'Homme* 26, 99: 7–40.
- Feld, Steven. 2012. *Sound and Sentiment: Birds, Weeping, Poetics, and Song in Kaluli Expression*. 3rd ed. Durham: Duke University Press.
- Fienup-Riordan, Ann. 2017. "How Raven Marked the Land When the Earth Was New." *Études Inuit Studies* 41, 1–2: 215–42.
- Forth, Gregory. 1996. "Nage Birds: Issues in Ethnoornithological Classification." *Anthropos* 91: 89–109.
- . 2004. *Nage Birds: Classification and Symbolism among an Eastern Indonesian People*. London: Routledge.
- . 2006a. "Sounds, Spirits, Symbols and Signs: Birds in Nage Cosmology." In *Les messagers divins: aspects esthétiques et symboliques des oiseaux en Asie du Sud-Est*, ed. Pierre Le Roux and Bernard Sellato, 579–614. Paris: Éditions connaissances et savoirs.
- . 2006b. "Words for 'Bird' in Eastern Indonesia." *Journal of Ethnobiology* 26: 177–207.

- 2007. “Pigeon and Friarbird Revisited: A Further Analysis of an Eastern Indonesian Mythicoornithological Contrast.” *Anthropos* 102: 495–513.
- 2009. “Symbolic Birds and Ironic Bats: Varieties of Classification in Nage Folk Ornithology.” *Ethnology* 48, 2: 139–59.
- 2010. “What’s in a Bird’s Name: Relationships among Ethno-Ornithological Terms in Nage and Other Malayo-Polynesian Languages.” In *Ethno-Ornithology: Birds, Indigenous Peoples, Culture, and Society*, ed. Sonia Tidemann and Andrew Gosler, 223–37. London: Earthscan.
- 2016. *Why the Porcupine Is Not a Bird: Explorations in the Folk Zoology of an Eastern Indonesian People*. Toronto: University of Toronto Press.
- 2017. “What a Little Bird Tells Us about Symbolic Thought: The Russet-Capped Stubtail (Tesia everetti) in Nage Augury, Myth, and Metaphor.” *Journal of Ethnobiology* 37: 682–99.
- Franco, Merlin F., and Misa Juliana Minggu. 2019. “When the Seeds Sprout, the Hornbills Hatch: Understanding the Traditional Ecological Knowledge of the Ibans of Brunei Darussalam on Hornbills.” *Journal of Ethnobiology and Ethnomedicine* 15, 46. <https://doi.org/10.1186/s13002-019-0325-0>.
- Geertz, Clifford. 1973. *The Interpretation of Cultures*. New York: Basic Books.
- Geinaert-Martin, Danielle. 1992. *The Woven Land of Laboya: Socio-Cosmic Ideas and Values in West Sumba, Eastern Indonesia*. Leiden: CNWS.
- Gonzalez, J.C.T. 2011. “Enumerating the Ethno-Ornithological Importance of Philippine Hornbills.” *Raffles Bulletin of Zoology* 24: 149–61.
- Gosler, Andrew G. 2017. “The Human Factor: Ecological Salience in Ornithology and Ethno-Ornithology.” *Journal of Ethnobiology* 37: 637–62.
- Gosler, A.G., and C.M. Jackson-Houlston. 2012. “A Nightingale by Any Other Name? Relations Between Scientific and Vernacular Bird Naming.” British Ornithologists’ Union Proceedings – Ecosystem Services: Do We Need Birds? <https://bou.org.uk/wp-content/uploads/2020/06/2012-ecosystem-services-goslerjackson-houlston.pdf>.
- Gourou, Pierre. 1972. *La Terre et l’homme en Extrême-Orient*. Paris: Flammarion.
- Gramaglia, Christelle. 2010. “Les goélands leucophée sont-ils trop nombreux? L’émergence d’un problème public.” *Études Rurales* 185: 133–48.
- Hamil, James, H. Sidky, and Janardan Subedi. 2002. “Structure and Function in a Tibeto-Burman Folk Taxonomy.” *Anthropological Linguistics* 44, 1: 65–84.
- Healey, Christopher. 1993. “Folk Taxonomy and Mythology of Birds of Paradise in the New Guinea Highlands.” *Ethnology* 32, 1: 19–34.
- Hertz, Robert. (1928) 1970. *Sociologie religieuse et folklore*. Paris: Presses universitaires de France. http://classiques.uqac.ca/classiques/hertz_robert/socio_religieuse_folklore/hertz_socio_rel_folklore.pdf.
- Hohn, E.O. 1973. “Mammal and Bird Names in the Indian Languages of the Lake Athabasca Area.” *Arctic* 26: 163–71.
- Hoyo, Josep del., Andrew Elliott, Sargatal Jordi, José Cabot, N.J. Collar, David A. Christie, Richard Allen, Hilary Burn, and Norman Arlott, eds. 1992–2013. *Handbook of the Birds of the World*. Barcelona: Lynx Edicions.
- Huang, Yung-Kun, Agathe Lemaitre, Hsin-Ju Wu, and Yuan-Hsun Sun. 2021. “A Sacred Bird at the Crossroads of Destiny: Ethno-Ornithology of the Mountain Hawk-Eagle (Qadis) for the Paiwan People in Taiwan.” *Journal of Ethnobiology* 41, 4: 535–52.
- Hutter, M. 2008. *Oiseaux, héros et devins*. Paris: Éditions L’Harmattan.
- Jernigan, Kevin. 2016. “Beings of a Feather: Learning about the Lives of Birds with Amazonian Peoples.” *Ethnobiology Letters* 7, 2: 41–47.

- Jerolmack, Colin. 2013. *The Global Pigeon*. Chicago: University of Chicago Press.
- Kane, Stephanie C. 2015. "Names and Folklore from the Embera (Choco) in Darien, Panama." *Ethnobiology Letters* 6, 1: 32–62.
- Kaplan, Matt. 2011. "Archaeopteryx No Longer First Bird." *Nature*. <https://doi.org/10.1038/news.2011.443>.
- Keck, Frédéric. 2015. "Sentinels for the Environment: Birdwatchers in Taiwan and Hong Kong." *China Perspectives* 2, 102: 43–52.
- . 2020. *Avian Reservoirs: Virus Hunters and Birdwatchers in Chinese Sentinels Posts*. Durham: Duke University Press.
- Klein, Jacob Theodor. 1750. *Historiae avium prodromus, cum praefatione de ordine animalum in genere*. Lubecae: Schmidt.
- Kockelman, Paul. 2016. *The Chicken and the Quetzal: Incommensurate Ontologies and Portable Values in Guatemala's Cloud Forest*. Durham: Duke University Press.
- Kohn, Eduardo. 2013. *How Forests Think: Toward an Anthropology beyond the Human*. Berkeley: University of California Press.
- Kondo, Shiaki. 2021. "Dog and Human from Raven's Perspective: An Interpretation of Raven Myths of Alaskan Athabascans." *Polar Science* 28: 1–8. <https://doi.org/10.1016/j.polar.2020.100633>.
- Krech, Shepard. 2005. "Telling Stories about Extinct Birds." *Environmental History* 10, 4: 718–20.
- . 2009. *Spirits of the Air: Birds and American Indians in the South*. Athens: University of Georgia Press.
- Krupnik, Igor. 2017. "Siberian Yupik Names for Birds: What Can Bird Names Tell Us about Language and Knowledge Transitions?" *Études Inuit Studies* 41, 1–2: 179–214.
- Laugrand, Frédéric, and Antoine Laugrand. 2023. *Les voies de l'ombre: comment les chauves-souris sèment le trouble*. Paris: Museum national d'histoire naturelle, collection nature et sociétés.
- Laugrand, Frédéric, Antoine Laugrand, and Lionel Simon. 2023. "Sources of Ambivalence, Contagion, or Sympathy: Bats and What They Tell Anthropology." *Current Anthropology* 64, 3: 321–51.
- Laugrand, Frédéric, Antoine Laugrand, and Guy Tremblay. 2019. "Lorsque les oiseaux donnent le rythme: Chants et présages chez les Blaans de Mindanao (Philippines)." *Anthropologie et Sociétés* 42, 2–3: 171–98.
- Le Roux, Pierre, and Bernard Sellato, eds. 2006. *Les messagers divins: Aspects esthétiques des oiseaux en Asie du Sud-Est* (Divine messengers: Bird symbolism and aesthetics in South-east Asia). Paris: Éditions connaissances et savoirs.
- Lévi-Strauss, Claude. (1962) 1991. *Totemism*. Translated by Rodney Needham. London: Merlin Press.
- . (1962) 1996. *The Savage Mind*. Translated by anonymous. London: Weidenfeld and Nicolson.
- . (1971) 1981. *The Naked Man*. Translated by Jonathan Cape. New York: Harper and Row.
- . (1991) 1995. *The Story of Lynx*. Translated by Catherine Tihanyi. Chicago: University of Chicago Press.
- Lévi-Strauss, Monique, and Emmanuelle Loyer, eds. 2021. *L'Abécédaire de Claude Lévi-Strauss*. Paris: Éditions de l'Observatoire.
- Lilienthal, Otto, and Gustav Lilienthal. 1911. *Birdflight as the Basis of Aviation: A Contribution towards a System of Aviation Compiled from the Results of Numerous Experiments Made by O. and G. Lilienthal*. London: Longmans, Green.
- Low, Chris. 2011. "Birds and Khoesan: Linking Spirits and Healing with Day-to-Day Life." *Africa: Journal of the International African Institute* 81, 2: 295–313.

- MaMing, Roller, Li Lee, Xiaomin Yang, and Paul Buzzard. 2016. "Vultures and Sky Burials on the Qinghai-Tibet Plateau." *Vulture News* 71 (November): 22–35. <http://dx.doi.org/10.4314/vulnew.v71i1.2>.
- Manceron, V. 2015. "What Is It Like to Be a Bird? Imagination zoologique et proximité à distance chez les amateurs d'oiseaux en Angleterre." In *Bêtes à pensées: Visions des mondes animaux*, ed. Michèle Cros, Julien Bondaz, and Frédéric Laugrand, 117–40. Paris: Éditions des Archives contemporaines.
- . 2022. *Les veilleurs du vivant. Avec les naturalistes amateurs*. Paris: La Découverte.
- Mathevet, Raphaël, and Arnaud Béchet. 2020. *Politiques du flamand rose*. Marseille: Wildproject.
- Matthieu, Rémi. 1984. "Le corbeau dans la mythologie de l'ancienne Chine." *Revue d'histoire des religions* 201, 3: 281–309.
- Mauzé, Marie. 2011. "Corbeau et le destin des hommes." *Liznières*: 55–61.
- Meletinsky, E.M. 1973. "Typological Analysis of the Palaeo-Asiatic Raven Myths." *Acta Ethnographica Academiae Scientiarum Hungaricae* 22, 1–2: 107–55.
- . 1980. "L'épique du corbeau chez les Paléoasiates." *Diogenes* 110: 120–35.
- Metcalf, Peter. 1976. "Birds and Deities in Borneo." *Bijdragen tot de Taal-, Land- en Volkenkunde* 18: 96–123.
- Miller, Stephen. 2018. *Hunt the Wren: The Early Descriptions, 1731–1845*. Onchan: Chiollagh Books for Culture Vannin.
- Oosten, Jarich, and Frédéric Laugrand. 2006. "The Bringer of Light: The Raven in Inuit Tradition." *Polar Record* 42, 222: 187–204.
- Régnier, Rita H., ed. 2008. *Oiseaux: Héros et devins*. Paris: L'Harmattan.
- Revel, Nicole. 1975. "Le vocabulaire des oiseaux en Palawan: quelques réflexions sur le problème des taxonomies indigènes." In *L'homme et l'animal: Premier colloque d'ethnozoologie*, ed. Raymond Pujol, 317–33. Paris: Institut international d'ethnoscience.
- Rose, Deborah Bird. 2009. *Vers des humanités écologiques*. Marseille: Wildproject.
- Roué, Marie. 2009. "Une oie qui traverse les frontières: La bernache du Canada." *Ethnologie française* 1, 39: 23–34.
- Rudge, Alice. 2019. "The Sounds of People and Birds: Music, Memory and Longing among the Batek of Peninsular Malaysia." *Hunter Gatherer Research* 4, 1: 3–23.
- Satheesan, S.M. 1998. "The Role of Vultures in the Disposal of Human Corpses in India and Tibet." *Vulture News* 39: 32–33.
- Sébillot, Paul. (1904–07) 2018. *Le Folklore de France: La faune*. Cressé, France: PRNG éditions.
- Siebold, Philipp Franz von, C.J. Temminck, H. Schlegel, and W. de Haan. (1839) 1975. *Fauna Japonica: Aves*. Tokyo: Kodansha.
- Simon, Scott. 2015. "Émissaires des ancêtres: Les oiseaux dans la vie et la cosmologie des Sadyaq de Taiwan." *Anthropologie et Sociétés* 39, 1–2: 179–99.
- . 2018. "Penser avec des oiseaux: L'ornithomancie et l'autochtonie à Taiwan." *Anthropologie et Sociétés* 42, 2–3: 151–69.
- Smith, Derek A. 2010. "The Harvest of Rain-Forest Birds by Indigenous Communities in Panama." *Geographical Review* 100, 2: 187–203.
- Steadman, David W. 1997. "Extinctions of Polynesian Birds: Reciprocal Impacts of Birds and People." In *Historical Ecology in the Pacific Islands: Prehistoric Environmental and Landscape Change*, ed. Patrick V. Kirch and Terry L. Hunt, 51–79. New Haven: Yale University Press.
- Strycker, Noah. 2018. *Ce que les oiseaux disent des hommes*. Paris: Flammarion.
- Tidemann, Sonia, and Andrew Gosler. 2010. *Ethno-Ornithology: Birds, Indigenous Peoples, Culture and Society*. London: Earthscan.

- Van den Broek, Gerard J. 1988. "A Structural Analysis of Dutch Bird Nomenclature." *Anthropologica* 30, 1: 61–73.
- Van Dooren, Thom. 2011. *Vulture*. London: Reaktion Books.
- . 2014. *Flight Ways: Life and Loss at the Edge of Extinction*. New York: Columbia University Press.
- . 2019. *The Wake of Crows: Living and Dying in Shared Worlds*. New York: Columbia University Press.
- Willughby, Francis, and John Ray. 1676. *Ornithologia libri tres*. London: Joannis Martyn.

© UBC Press 2024

All rights reserved. No part of this publication may be reproduced, stored in a retrieval system, or transmitted, in any form or by any means, without prior written permission of the publisher.

UBC Press is a Benetech Global Certified Accessible™ publisher. The epub version of this book meets stringent accessibility standards, ensuring it is available to people with diverse needs.

Library and Archives Canada Cataloguing in Publication

Title: Feathered entanglements : human-bird relations in the anthropocene / edited by Scott E. Simon and Frédéric Laugrand.

Names: Simon, Scott, editor | Laugrand, Frédéric, editor

Description: Includes bibliographical references and index.

Identifiers: Canadiana (print) 20240422813 | Canadiana (ebook) 2024042283X | ISBN 9780774870009 (hardcover) | ISBN 9780774870023 (PDF) | ISBN 9780774870030 (EPUB)

Subjects: LCSH: Birds – Effect of human beings on – Indo-Pacific Region. | LCSH: Birds – Indo-Pacific Region. | LCSH: Human-animal relationships – Indo-Pacific Region.

Classification: LCC QL676.57.I67 F43 2024 | DDC 598.0959—dc23



Canada Council
for the Arts

Conseil des arts
du Canada

Canada



BRITISH COLUMBIA
ARTS COUNCIL



BRITISH
COLUMBIA

UBC Press gratefully acknowledges the financial support for our publishing program of the Government of Canada and the British Columbia Arts Council.

UBC Press is situated on the traditional, ancestral, and unceded territory of the xʷməθkʷəy̓əm (Musqueam) people. This land has always been a place of learning for the xʷməθkʷəy̓əm, who have passed on their culture, history, and traditions for millennia, from one generation to the next.

UBC Press
The University of British Columbia
www.ubcpress.ca