

Lorenzo Bartolini sculpted a marble figure, *Nymph With a Scorpion*. Numerous films have scorpion connections, among them *Diamonds Are Forever*, *Skyfall*, and the *Scorpion King* series. An episode of *The Simpsons* featured supervillain Hank Scorio. Scorpions appear in tattoos on 4000-year-old mummies and on many people today. The Mesopotamian *Epic of Gilgamesh*, more than 3000 years old, contains references to hybridized human-scorpion creatures called Scorpion Men. Surviving Mayan records depict a giant scorpion monster in the *Madrid Codex*. Several biblical passages mention scorpions, sometimes as symbols and other times as the actual animals. John Milton's *Paradise Lost* alludes to the scorpion, and in Lord Byron's poem *The Giaour*, the scorpion kills itself. Shakespeare's *Macbeth* laments to Lady Macbeth, "Oh, full of scorpions is my mind, dear wife." In Rudyard Kipling's short story *The Children of the Zodiac*, the scorpion kills the bull.

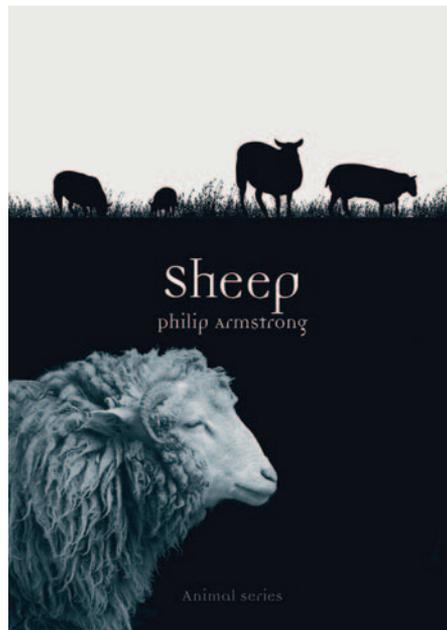
For many millennia, people have looked to the night skies, observing and telling stories of the figures they see in the stars. The astrology and mythology of many cultures include references to scorpions, and it is the eighth sign of the zodiac in Western astrology. Besides myself, people born under this sign include Whoopi Goldberg, Daniel Boone, Marie Curie, Bill Gates, and Hillary Clinton.



Sheep. By Philip Armstrong, 2016. Reaktion Books. (ISBN: 9781780235936). Paperback. \$19.95.

Sheep and goats have been important to humans for 11,000 years, longer than any species except dogs. They provide food, fiber, milk products, and even their skin was used in Europe to produce parchment for documents before paper-making was introduced. Long considered unintelligent—as when people are sometimes described as behaving “like a flock of sheep”—they are actually capable of learning to respond to commands. Sheep are a part of the traditions, literature, art, and mythology of numerous world cultures, some going back thousands of years.

Sheep first appeared near the end of the Pleistocene Era, and four wild and one domestic sheep species survive today. Though referred to as five species, they are all capable of interbreeding and



producing fertile offspring, implying that there is only one. Considerable scientific research has attempted to sort out the speciation, but much conflicting information supports Charles Darwin's conclusion that the question of sheep ancestry remains in “a hopeless state of doubt.”

Almost every page reveals something new and fascinating about these animals. Most people don't realize that bonding in a flock of sheep is aided by scent trails from glands between their hooves or that wool is a natural air conditioner, insulating against cold and protecting against extreme heat. There is fascinating and unexpected information on mating practices (most wild rams are homosexual), the relationship of horn size and leadership in rams (bigger is better), and social structure of the flocks (the fundamental bonds are between ewes and lambs). Also remarkable is that sheep share with primates a brain area that gives them an extraordinary ability to recognize individual faces of sheep and other species.

A considerable amount of sheep history is incorporated into the book. An explanation of the development of wool production highlights inventor John Kaye's “Flying Shuttle” that led to an increase in the productivity of weavers, and the invention of the steam engine and its use in textile mills is examined as a major driver of the rise of industrial cities in England. Also included is the story of the breakthrough scientific experiment that gave us “Dolly,” a ewe cloned from a mammary

gland cell of another ewe, becoming the first cloned mammal.

The dark side of raising sheep is presented in an especially frank and gruesome discussion of how sheep are treated in factory farming situations. Practices of confinement, transportation, and eventual slaughter are horrendous. Especially brutal is the procedure of mulesing—flaying the skin without anesthesia for the purpose of preventing growth of matted wool.

There is much more to be found in this fascinating work. To those who might think that sheep are not much more than Mary's little lamb or Bo-Peep's lost flock, this will be an eye opener. A few examples of places where sheep appear in culture include literature (Thomas Hardy's *Far from the Madding Crowd*), poetry (William Blake's *The Lamb*), painting (Franz Marc's *The Sheep*), sculpture (Henry Moore's *Sheep Piece*), and religion (biblical use of the lamb as a symbol of Christ).

It is a well-known practice for insomniacs to count sheep until they head off into Dreamland. This book, however, does just the opposite. Carefully researched, it presents a provocative and stirring view of sheep as living organisms with many fascinating biological features and cultural connections. It definitely is not a sleep inducer.



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