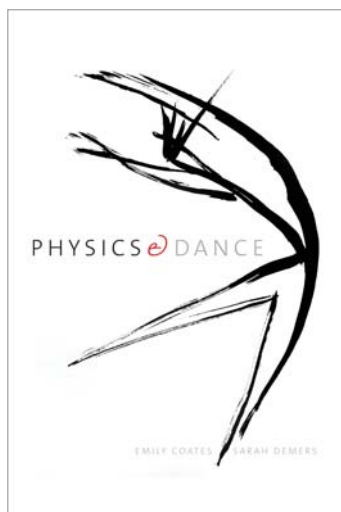


NEW BOOKS & MEDIA



Physics and Dance

Emily Coates and Sarah Demers
Yale U. Press, 2019. \$30.00

Dance studies professor and dancer Emily Coates and particle physicist Sarah Demers, both at Yale University, team up to explore the connections between dance and physics. In their intriguing book *Physics and Dance*, they look at how both disciplines approach phenomena like friction, momentum, space, time, and gravity. Many passages are devoted to modeling dancers' movements mathematically; equations, graphs, and elegant sketches accompany those models. Mathematically inclined dance lovers will welcome a chance to see the plié and tour jeté through new eyes. A chapter of physics problems could provide inspiration to professors looking for new homework challenges.

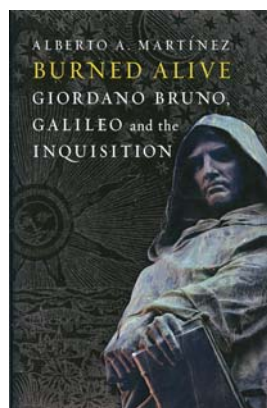
—MB

Almanac 2019

National Geographic, 2018. \$19.99 (paper)

Following up on its popular *Kids Almanac* launched almost a decade ago, National Geographic has published *Almanac 2019*, its first-ever annual for adults. The 400-page paperback is divided into sections such as "Exploration and Adventure," "This Planet and Beyond," and "The Science of Us." Stunning imagery is combined with timelines, maps, infographics, trivia quizzes, and a wealth of information about geography, history, nature, and science. Covering topics from gene editing to the pitfalls of plastic and the birth of the universe, *Almanac 2019* is billed as the ultimate guide to our planet.

—CC



Burned Alive

Giordano Bruno, Galileo and the Inquisition

Alberto A. Martínez
Reaktion Books, 2018. \$40.00

In his provocative new book, Alberto Martínez, a historian of science at the University of Texas at Austin, revisits the grim fate of Italian natural philosopher Giordano Bruno, who was burned at the stake in 1600. Bruno was an innovative thinker with unusual views on the nature of the universe; he believed that life on other worlds might exist, that the motion of planets was not perfectly circular, and that Earth itself had a soul. Many modern historians

have argued that the Catholic Inquisition's decision to sentence Bruno to death was not primarily about his cosmological views but about other heresies against Catholic teachings, such as his denial of transubstantiation. Martínez, however, draws on the Inquisition's records to argue that Bruno's cosmology was in fact the major reason that Inquisitors singled him out as a dangerous and heretical thinker. *Burned Alive* also shows that some of those same Inquisition personnel were involved in Galileo's trial in 1633, which provides further evidence of the Inquisition's interest in stamping out heresies about the cosmos.

—MB

Dispatches from Planet 3

32 (Brief) Tales on the Solar System, the Milky Way, and Beyond

Marcia Bartusiak
Yale U. Press, 2018.
\$26.00



Science writer Marcia Bartusiak's latest book is a collection of stories about the history of astrophysics. Some of the figures she discusses, such as Albert Einstein and Jocelyn Bell Burnell, will be familiar to many readers. Others, like English geologist and astronomer John Michell, are less well-known. The book's 32 chapters are organized into three sections: astronomy within our solar system, galaxy-level observations, and cosmology. Bartusiak's lively voice and the diversity of the stories she tells make this a fast-paced, engaging read.

—MB

The Age of Innocence

Nuclear Physics Between the First and Second World Wars

Roger H. Stuewer
Oxford U. Press, 2018.
\$55.00



University of Minnesota historian Roger Stuewer dives into the rich history of nuclear physics in his latest book, which

focuses on developments in the 1920s and 1930s. Those were fertile decades for physics; they saw the discovery of the neutron, the detection of alpha decay, and the discovery of artificially induced radioactivity. Ernest Rutherford, Frédéric Joliot, Irène Joliot-Curie, Paul Dirac, Ernest Lawrence, and other famous figures make appearances. *The Age of Innocence* also keeps the political backdrop in mind and explores how the growth of fascism in Europe affected the careers of physicists such as Lise Meitner. Piled high with primary-source quotes, footnotes, and photographs, Stuewer's book is a valuable resource for anyone interested in the history of nuclear physics.

—MB **PT**