The Nature of Beasts: Empire and Exhibition at the Tokyo Imperial Zoo. By Ian Jared Miller. (Berkeley, CA: University of California Press. 2013. 352pp. \$65.00).

Ian Jared Miller's ambitious monograph attempts to both historicize the Anthropocene, the current age in which humans are the dominant force that shapes the environment, and refute the idea that modernization hinged upon the separation of people from the environment. He does so by tracing what he calls "ecological modernity," the process where humans reorganized their relationships and interactions with the natural word, through the history of Tokyo's Ueno Zoo (p.20). Miller argues that Japan's modern history unfolded in the context of an increased interpenetration of society and the environment, rather than a binary between the two. Throughout the book Miller utilizes a variety of primary sources, particularly unpublished archival sources from the Ueno Zoo, to examine the various intersections of Japanese society and nature, such as the notion of civilization, imperialism, war mobilization, post-war international diplomacy, war memory, and the formation of mass society, all through the history of the zoo. In doing so, he illuminates the various ways in which humans restructured their interactions with the environment and ushered in the Anthropocene.

Miller divides the book into three chronological sections: pre-war, total-mobilization for World War II, and post-war. Within each category, Miller combines the narrative history of the zoo with various cultural developments within Japanese society to demonstrate the interrelationship between society and nature through time. Most of his book conceptualizes the zoo as a space of ideological education. Miller claims that the zoo inculcated its visitors with concepts of civilization, empire, sacrifices for war, and new ideas of democracy, by transforming animal bodies into symbols of ideology. Miller argues that in displaying the symbolic bodies of animals, the zoo depicted "ideology as nature and camouflage[d] policy as play" (p. 66). Miller also maintains that the zoo used the deaths of its animals in conjunction with its exhibits, to further indoctrinate Japanese citizens into wartime ideology in his compelling chapter about The Great Zoo Massacre, in which the zoo liquidated its animal population.

In the final chapter, Miller shifts his gaze away from the zoo as an educational institution, and instead explores Japan's "Panda Boom" from 1972-2008. He does so in order to illuminate the ways in which humans' wills affected panda bodies and the roles of pandas in a global society. He claims that during the Panda Boom, the bears became political tools in the context of China's program of Panda Diplomacy, commoditized consumer goods as representations of cute nature, and pieces of biotechnology as the demand for a baby panda pushed the zoo to experiment with artificial insemination. He uses the various transformations of panda bodies to represent both the height of the Anthropocene and the end of his narrative on the rise of humans as an ecological force.

Miller's work, while compelling to read and conceptually important, is not without faults. Throughout the book Miller asserts that modernity rested upon increased interdependence between nature and society, yet his analysis focuses on a small-sequestered concept of nature in an urban center, which thus alienates other types of interactions that the Japanese had with nature. Miller, however, should not be criticized too heavily for his narrow scope, because it acts as a theoretical framework for other historians to explore other sites of ecological modernity such as fishing lodges and national parks. Still, while he clearly illuminates the creation of the Anthropocene, his idea of ecological modernity, if it is to be a viable analytical lens, needs to be supported by further research.

Another problem with his monograph is in his discussion of animals as historical actors. Miller is careful not to assert that animals had historical agency, yet he does claim that animals influenced the world around them and should thus be considered actors that had "physical presence and emotional influence" (p. 14). While he attempts to refute R. G. Collingwood's assertion that humans are the only animal worth studying because they are the only creatures capable of chronicling their thoughts, Miller's use of the term actor still suggests agency. Instead, animals should perhaps be thought of historical *factors* in that they are forces that humans molded their actions and thoughts around, rather than consciously influencing human behavior.

Miller's book makes an important contribution to two historiographical areas. The first is to the historiography of animal histories in Japan, like Brett L. Walkers' *The Lost Wolves of Japan* or Aaron H. Skabelund's *Empire of Dogs*, which like Miller, both demonstrate the importance of human-animal interactions in the creation of modern Japan. The second is to environmental history of Japan that focuses more broadly on the role of the environment in Japanese history. The most important contribution that Miller makes is to the literature surrounding the Anthropocene. While the Anthropocene is not a new topic of scholarly investigation, the literature is dominated by the physical sciences. Miller provides a fresh perspective on the Anthropocene by using historical methodology instead of scientific data to try and understand it. His book is thus a pioneering study because it is a methodological template for how to historicize the Anthropocene in any geographic region.

As a whole, *The Nature of Beasts* is important because it provides scholars with a framework to explore other dimensions of ecological modernity, such as resorts in national parks or recreational pursuits that depend on the natural world. It also provides scholars in other humanities disciplines with a model for how to think about the Anthropocene and its effects on human culture. Moreover, his combination of compelling narrative with critical analysis of the unpublished archival material in Ueno Zoo illuminates how Japanese interactions with nature through time helped create the Anthropocene. Miller's book is both readable and accessible to non-Japanese historians and non-specialists should not be deterred from it. *The Nature of Beasts* should be read by anyone interested in modernity in Japan, animal studies, animal history, environmental history, and most importantly the Anthropocene.

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