



Animal Social Networks edited by Jens Krause, Richard James, Daniel W. Franks, and Darren P. Croft

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cally interesting complexities of evolution and what, by all accounts of this book, should be a ripe area of research regarding mtDNA within the evolutionary context. Readers should also be aware of the (il)logical steps Mejsnar makes by avoiding conflicting (and robust) evolutionary studies and interjecting a religious bias into his analysis.

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BEHAVIOR

ANIMAL SOCIAL NETWORKS.

Edited by Jens Krause, Richard James, Daniel W. Franks, and Darren P. Croft. Oxford and New York: Oxford University Press. \$125.00 (hardcover); \$64.95 (paper). xvii + 260 p.; ill.; index. ISBN: 978-0-19-967904-1 (hc); 978-0-19-967905-8 (pb). 2015.

Over the past decade, the study of animal social networks has gained incredible momentum among behavioral ecologists. A synthetic review of this rapidly emerging and quickly evolving discipline is therefore needed to outline the utility and potential pitfalls of social network analysis. The volume, *Animal Social Networks*, is therefore a timely textbook that carefully elucidates the value of the novel approaches currently available to scholars of animal behavior.

The volume starts with a well-written introduction to and primer on social network theory. This useful guide makes this interdisciplinary field accessible to both students and advanced scholars by clearly defining key terms and avoiding technical jargon.

The book is organized into two main sections. The first of these sections is devoted to conceptual innovations and statistical developments, integrating patterns and processes across taxonomic groups. Each of these exciting nine chapters tackles one or more unresolved problems in biology, drawing from illustrative examples to reveal insights about the social lives of animals. The authors are triumphant in explaining how the structural characteristics of networks affect key behavioral decisions such as mate choice, cooperation, and forging decisions. Network scholars have clearly gone beyond simply focusing on the visual appeal of network diagrams (graphs). Behavioral ecologists are now gaining new insights into the evolutionary puzzle of cooperation and into processes shaping mate choice, personality, dominance, group travel, communication, disease

transmission, and animal welfare through the lens of social networks. The richness of these chapters therefore reflects the growing maturity of this field over the past decade.

The second major section provides readers with useful depth within a taxonomic perspective, devoting a single chapter to each of the following groups of animals: primates, cetaceans, fishes, insects, birds, ungulates, and reptiles. Although the text would have further benefited from comprehensive coverage of additional taxa such as rodents, carnivores, hyraxes, and elephants, all of these taxa are covered to some extent elsewhere in the volume. The main value of this section is that it outlines methodological opportunities and pitfalls pertaining to specific taxa. The summary tables are also rich and will prove useful in stimulating new studies.

The concluding remarks synthesize the current state of the field, but fell a bit short in explicitly setting up a bold new agenda for the next decade. For example, which new innovations will only be possible through the use of animal social networks and how specifically should scholars push these boundaries to propel the field forward? Perhaps only time will tell. Clearly, the authors elucidate countless ways that the field has progressed beyond simply focusing on the visual representation of data gathered on social animals. I therefore strongly agree with the authors that "the future of animal social network analysis is surely a bright one" (p. 214). This exciting new volume will surely facilitate this future, helping to illuminate the bright and richly deserved role of networks in revealing insights about fundamental biological processes.

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ANIMAL MOVEMENT ACROSS SCALES.

Edited by Lars-Anders Hansson and Susanne Åkesson. Oxford and New York: Oxford University Press. \$140.00 (hardcover); \$69.99 (paper). xiii + 279 p. + 6 pl.; ill.; index. ISBN: 978-0-19-967718-4 (hc); 978-0-19-967719-1 (pb). 2014.

This book is a collection of 14 multiauthored essays by members of the CAnMove research group at Lund University, Sweden. It grew out of a workshop involving members of the group where chapter subjects and appropriate authors were discussed. There followed a 12-month writing process that resulted in chapter drafts sent out for international review with comments then incorporated in the final version. The result is the second multiauthored volume on movement and migration from Oxford University Press in recent years. The first (E. J. Milner-Gulland et al. 2011. *Animal*