Coordination in Human and Primate Groups

Bearbeitet von Margarete Boos, Michaela Kolbe, Peter M. Kappeler, Thomas Ellwart

> 1. Auflage 2011. Buch. xiii, 288 S. Hardcover ISBN 978 3 642 15354 9 Format (B x L): 15,5 x 23,5 cm Gewicht: 675 g

<u>Weitere Fachgebiete > Chemie, Biowissenschaften, Agrarwissenschaften ></u> <u>Biowissenschaften allgemein > Neurobiologie, Verhaltensbiologie</u>

schnell und portofrei erhältlich bei



Die Online-Fachbuchhandlung beck-shop.de ist spezialisiert auf Fachbücher, insbesondere Recht, Steuern und Wirtschaft. Im Sortiment finden Sie alle Medien (Bücher, Zeitschriften, CDs, eBooks, etc.) aller Verlage. Ergänzt wird das Programm durch Services wie Neuerscheinungsdienst oder Zusammenstellungen von Büchern zu Sonderpreisen. Der Shop führt mehr als 8 Millionen Produkte.

Preface

All members of our species are faced with cooperative decision making and group coordination on a daily basis. By definition, group coordination involves the coordination and reconciliation of potentially conflicting interests of individuals within a group to produce a joint solution. It is therefore cumbersome, timeconsuming, and politically problematic. As psychologists, we are learning from cooperative projects with our primatologist colleagues (such as this book) that this weighing of the costs and benefits of group coordination defines the very causal roots of primate group living. Primatological studies reveal that cooperation and coordination are also involved in daily decisions of non-human primate groups, providing an important comparative perspective that is leading to a better understanding of general patterns and mechanisms of group coordination as well as aspects that are unique to humans.

We therefore invite everyone faced with decision making and the challenges that group coordination poses – from family to lecture hall – to explore the essays in this book. Even sole proprietors of entrepreneurial start-ups who regularly make decisions on their own could learn a thing or two from this book about the survival benefits of making those decisions in a cooperative setting instead. Together, these chapters provide a refreshingly comparative perspective on group coordination within both human and non-human primate groups and reveal a stunning diversity of behavioural mechanisms with surprising outcomes. Our goal is to contrast concepts and methods of coordination, which, of course, reveal many differences but also show some interesting similarities. For example, where humans would expect the most dominant, physically powerful male of a non-human primate group to make all decisions, we find that in many cases the needs of the younger and physically vulnerable group members influence pivotal decisions affecting the entire group as well. The survival imperatives underlying successful primate group coordination at the group level make the metaphorical applications to human group coordination boundless and eye-opening. One constant among humans and non-human primate groups appears axiomatic: No one member - no matter how intelligent or talented or multi-faceted - can approach successful group interactions from all perspectives and dispose of all data required for the coordination of the entire group.

The book is organized much like any approach to group coordination would be. Contributions to Part I deal with theoretical approaches, defining the task of group coordination. Chapters in Part II explore scientific concepts and methods of group coordination, offering state-of-the-art data on the subject from different psychological perspectives. Part III presents four aspects on coordination in non-human primate groups that are of great interest for understanding human coordination. The authors provide insights into mechanisms of primate group movement, introduce a variety of communicative signals in different modalities, impress psychologists with rudimentary forms of shared intentionality in great apes groups, and discuss the effects of heterogeneity in primate group composition. At first glance, the reader might think that coordination in non-human primate groups is lacking the essential and most salient aspects of human coordination such as verbal communication and written plans. However, these contributions reveal that there are indeed some important similarities that make this comparison valuable for research and theory.

As is always the case with studies on group coordination, each section approaches its particular focus with the assumption that no research project is ever complete and therefore outlines questions and ideas ripe for future research. Because this is one of the most dynamic areas of inter-disciplinary research, we do not claim that this volume provides an exhaustive summary. However, most readers open to an interdisciplinary approach will in all likelihood encounter perspectives that they have never contemplated before.

Faced with compiling a book on as ambitious a subject as coordination and decision making by human and non-human primates, clearly the best way, and frankly the only way, to present the science on this topic was to do so as a group. This collaborative endeavour allowed us to experience some of the rather practical group coordination challenges firsthand (e.g. choosing contributors, working with and reconciling different ideas of how to edit a book together, coordinating the timing and input of the contributions themselves, etc.). But without a doubt, the richness of its final form benefits from these challenges – a testimony to group coordination itself.

This book is a direct outcome of interdisciplinary cooperation made possible by the Courant Research Centre "Evolution of Social Behavior" at the University of Göttingen in Germany. This centre was founded in 2008 with DFG (German Research Foundation) funding, and its constituent members study the social behaviour of human and non-human primates from an evolutionary perspective. The book's contributors were largely chosen among the participants of a workshop on implicit and explicit coordination in Göttingen in 2006 that proved pivotal to the establishment of this Courant Research Centre. We would therefore like to express our gratitude to the DFG and the University of Göttingen (which funded the workshop) for ultimately making the publication of this book possible. We would also like to thank the contributing authors, who carved time out of their already over-burdened schedule to compose works that reflect the diversity and creative thought that their fields of research demand. And we extend special thanks to Anette Lindqvist at Springer for her enduring patience as our editor, Margarita Neff-Heinrich for her Preface

outstanding English-for-the-sciences proofreading, Christine John and Dennis Ergezinger for their diligence in dealing with matters of layout and graphics, and a warm "thank you" to the extensive support staff too numerous to mention; without their help, an endeavour such as this would have been impossible.

Göttingen, Germany Zurich, Switzerland Trier, Germany November 2010 Margarete Boos and Peter M. Kappeler Michaela Kolbe Thomas Ellwart