After many years of scholarly neglect, interest in intuition is now exploding in psychology, cognitive science, and philosophy. Yet there is no single definition of intuition or consensus on its meaning in any discipline. *Rational Intuition* covers a broad range of historical and contemporary contexts in which prominent philosophers, psychologists, and cognitive scientists explain how intuition is implicated in rational activity in its diverse forms. In bringing the philosophical history of intuition into novel dialogue with contemporary philosophical and empirical research, Lisa M. Osbeck and Barbara S. Held invite a comparison of the conceptions and functions of intuition, thereby clarifying and advancing conceptual analysis across disciplines.

Lisa M. Osbeck is Professor of Psychology at the University of West Georgia, where she teaches courses on the history, philosophy, and comparative theories of psychology. She collaborated closely with the Cognition and Learning in Interdisciplinary Cultures (CLIC) Research Group, headed by Nancy Nersessian, in ethnographic studies of science laboratories, which led to *Science as Psychology: Sense-Making and Identity in Science Practice* (Cambridge University Press, 2011), the 2012 co-winner of the William James Book Award from the Society for General Psychology of the American Psychological Association (APA). Osbeck received the Sigmund Koch Award for Early Career Contribution to Psychology (2005) and the Theodore Sarbin Award (2012) from the Society for Theoretical and Philosophical Psychology of the APA. She is a Fellow of the APA and the Center for Philosophy of Science, University of Pittsburgh.

Barbara S. Held is the Barry N. Wish Professor of Psychology and Social Studies at Bowdoin College in Maine. She focuses on the theoretical, philosophical, and practical aspects of movements in psychology and psychotherapy and is author of *Back to Reality: A Critique of Postmodern Theory in Psychotherapy* (1995); *Stop Smiling, Start Kvetching: A 5-Step Guide to Creative Complaining* (2001); and *Psychology's Interpretive Turn: The Search for Truth and Agency in Theoretical and Philosophical Psychology* (2007). Held is the 2012 recipient of the American Psychological Foundation's Joseph B. Gittler Award, which recognizes significant scholarly contribution to the philosophical foundations of psychological knowledge. She is a former president of the Society for Theoretical and Philosophical Psychology of the APA, of which she is a Fellow.
Rational Intuition

PHILOSOPHICAL ROOTS, SCIENTIFIC INVESTIGATIONS

Edited by
Lisa M. Osbeck
University of West Georgia

Barbara S. Held
Bowdoin College
Contents

List of Contributors
Acknowledgments
Introduction
Lisa M. Osbeck and Barbara S. Held

PART I. INTUITION IN WESTERN PHILOSOPHY

1. Intuition in Aristotle
   Robert Bolton
   39

2. Ockham: Intuition and Knowledge
   Claude Panaccio
   55

3. Descartes on Intuition and Ideas
   Peter Machamer and Marcus P. Adams
   75

4. In a Grain of Sand: Spinoza’s Conception of Intuition
   William Meehan
   90

5. Kant: Intuition and the Synthetic A Priori
   Daniel N. Robinson
   114

6. Husserl’s Phenomenological Theory of Intuition
   Chad Kidd
   131

7. Bergsonian Intuition: Getting Back into Duration
   Heath Massey
   151

8. Intuition in Mathematics
   Elijah Chudnoff
   174

© in this web service Cambridge University Press www.cambridge.org
## Contents

9. Intuition in Contemporary Philosophy  
   *Jonathan Jenkins Ichikawa*  
   192

### PART II. INTUITION IN PSYCHOLOGY AND COGNITIVE SCIENCE

10. Expert Intuition  
    *Edward T. Cokely and Adam Feltz*  
    213

11. Intuition in Strategic Thinking  
    *William Duggan*  
    239

12. Intuition in Kahneman and Tversky’s Psychology of Rationality  
    *Thomas Sturm*  
    257

13. Creative Intuition: How *Eureka* Results from Three Neural Mechanisms  
    *Paul Thagard*  
    287

    *Sanjay Chandrasekharan*  
    307

15. Intuition in 21st-Century Moral Psychology  
    *Roger Giner-Sorolla*  
    338

16. Intuitions in the Study of Language: Syntax and Semantics  
    *Peter Slezak*  
    362

17. Jung and Whitehead: An Interplay of Psychological and Philosophical Perspectives on Rationality and Intuition  
    *Farzad Mahootian and Tara-Marie Linné*  
    395

*Index*  
421
Contributors

MARCUS P. ADAMS, Department of Philosophy, University at Albany, State University of New York, Albany, New York, USA

ROBERT BOLTON, Department of Philosophy, Rutgers University, New Brunswick, New Jersey, USA

SANJAY CHANDRASEKHARAN, Homi Bhabha Centre for Science Education, Tata Institute of Fundamental Research, Mumbai, India

ELIJAH CHUDNOFF, Department of Philosophy, University of Miami, Coral Gables, Florida, USA

EDWARD T. COKELY, Department of Cognitive and Learning Sciences, Michigan Technological University, Houghton, Michigan, USA

WILLIAM DUGGAN, Columbia Business School, Columbia University, New York, New York, USA

ADAM FELTZ, Department of Cognitive and Learning Sciences, Michigan Technological University, Houghton, Michigan, USA

ROGER GINER-SOROLLA, School of Psychology, University of Kent, Canterbury, Kent, United Kingdom

BARBARA S. HELD, Department of Psychology, Bowdoin College, Brunswick, Maine, USA

JONATHAN JENKINS ICHIKAWA, Department of Philosophy, University of British Columbia, Vancouver, British Columbia, Canada

CHAD KIDD, Department of Philosophy, Auburn University, Auburn, Alabama, USA

TARA-MARIE LINNÉ, Independent Scholar, New York, New York, USA
List of Contributors

PETER MACHAMER, Department of History and Philosophy of Science, University of Pittsburgh, Pittsburgh, Pennsylvania, USA

FARZAD MAHOOTIAN, Global Liberal Studies, New York University, New York, New York, USA

HEATH MASSEY, Department of Philosophy and Religious Studies, Beloit College, Beloit, Wisconsin, USA

WILLIAM MEEHAN, Independent Scholar and Private Clinical Practice, San Francisco, California, USA

LISA M. OSBECK, Department of Psychology, University of West Georgia, Carrollton, Georgia, USA

CLAUDE PANACCIO, Université du Québec à Montréal, Montréal, Québec, Canada

DANIEL N. ROBINSON, Fellow, Faculty of Philosophy, University of Oxford, Oxford, United Kingdom

PETER SLEZAK, School of Humanities and Languages, University of New South Wales, Sydney, Australia

THOMAS STURM, Departament de Filosofia, Universitat Autònoma de Barcelona, Barcelona, Spain

PAUL THAGARD, Department of Philosophy, University of Waterloo, Waterloo, Ontario, Canada
Acknowledgments

We begin by thanking our contributors, without whom there would be no expert and excellent coverage of the many scholarly contexts in which discussion of rational intuition continues to grow. There are others to thank as well. Lisa thanks Daniel Robinson and Rom Harré for exceptional mentorship in relation to the dissertation that began her study of the complex topic of intuition in its philosophical variants. Enduring thanks go to Peter Machamer, who encouraged analysis of intuition in psychological science during a fellowship year at the Center for Philosophy of Science, University of Pittsburgh. Thanks to colleagues at the University of West Georgia, notably the VPAA office, Don Rice and N. Jane McCandless, for leave time during the preparation of the manuscript, and to the School of Interactive Computing, Georgia Institute of Technology, for providing research facilities during that time. Thanks to Nancy Nersessian and the U.S. National Science Foundation (DRL097394084) for research support during a phase of the manuscript’s preparation. Three talented PhD students – Timothy Beck, India MacWeeney, and Ram Vivekanand – provided valuable assistance at various stages of the project. Barbara thanks Bowdoin College for the time and resources to complete this project, especially the award of a Porter Fellowship for Advanced Study or Research, which funded her spring 2009 appointment as a visiting scholar in the department of philosophy at the University of Miami, Coral Gables, Florida. Special thanks to Harvey Siegel, who, as chair of the philosophy department at the University of Miami, made this appointment possible and who, along with Elijah Chudnoff, Bradford Cokelet, Edward Erwin, Simon Evnine, and Amie Thomasson, provided courses and conversations that advanced her understanding of and work on rationality,
which culminated in her presidential address for the Society for Theoretical and Philosophical Psychology and its publication in the society’s journal. Special thanks also to Alexa Garcia, whose superb two-semester independent study on intuition at Bowdoin helped inform our own efforts, and to Bowdoin Psychology majors Gabrielle Lubin and Emily Martin, who provided valuable assistance in the final stages of the manuscript’s preparation.