Table of Contents

Foreword Joseph Coyle
Preface Monique Ernst and Judith Rumsey

Part I. Techniques of Functional Neuroimaging:

1. Functional brain imaging with PET and SPECT Peter Herscovitch and Monique Ernst
2. Modeling of PET/SPECT receptor images Evan Morris, Raymond Muzic, Bradley Christian, Christopher Endres and Ronald Fisher
3. Techniques of functional neuroimaging: functional magnetic resonance imaging (fMRI) Guinevere F. Eden and Thomas A. Zeffiro
4. MRS in childhood psychiatric disorders Deborah Yurgelun-Todd and Perry Renshaw
5. Magnetoencephalography (MEG) Donald Rojas, Peter Teale and Martin Reite

Part II. Ethical Issues in Neuroimaging Research with Children Eugene Arnold, Alan Zametkin, Lauren Caravella and Nicole Korbly

Part III. Normal Development:

6. Brain development and evolution Manuel Casanova, Daniel Buxhoeveden and Gurkirpal Sohal
7. Cognitive development from a neuropsychological perspective Daisy Pascualvaca and Gloria Morote

Part IV. Psychiatric Disorders:

9. Autism Diane Chugani
10. Functional imaging in childhood onset schizophrenia Leslie Jacobsen and Alessandro Bertolino
11. Pediatric mood disorders and neuroimaging Robert A. Kowatch, Pablo Davanzo and Graham J. Emslie
14. Functional neuroimaging in dyslexia: conceptual issues and psychiatric comorbidity Frank Wood and Lynn Flowers
15. Attention deficit hyperactivity disorder: neuroimaging and behavioural/cognitive probes Julie B. Schweitzer, Carl Anderson and
Monique Ernst
16. Eating disorders Uttom Chowdhury, Isky Gordon and Bryan Lask

Part V. Future Directions:
17. Techniques of molecular genetics David Vandenbergh
18. Issues in the genetic study of complex neurobehavioral conditions David Pauls
19. The duplicity of plasticity: a conceptual approach to the study of early lesions and developmental disorders Ralph Axel Mueller and Eric Courchesne
22. Functional neuroimaging in child psychiatry: future directions Monique Ernst and Judith Rumsey

Glossary
Index.