

Contents

FOREWORDS	v
William H. Thies	
Theodore L. Sourkes	
PREFACE FROM THE EDITOR	ix
A. Claudio Cuello	
LIST OF CONTRIBUTORS	xv
1. OVERVIEW OF THE ALZHEIMER'S DISEASE PATHOLOGY AND POTENTIAL THERAPEUTIC TARGETS	1
A. Claudio Cuello	
2. TRIAL DESIGNS AND OUTCOMES TO MONITOR NOVEL THERAPEUTICS IN ALZHEIMER'S DISEASE	28
Serge Gauthier	
3. THE PHARMACOLOGICAL TREATMENT OF ALZHEIMER'S DISEASE WITH CHOLINESTERASE INHIBITORS AND MEMANTINE	36
Gordon Keith Wilcock	
4. M1 MUSCARINIC AGONISTS: A COMPREHENSIVE THERAPY AGAINST MAJOR HALLMARKS OF ALZHEIMER'S DISEASE	50
Abraham Fisher	
5. CHOLINERGIC NEURODEGENERATION IN ALZHEIMER'S DISEASE: BASIS FOR NERVE GROWTH FACTOR THERAPY	64
Ahmad Salehi, Alexander Kleshevnikov, and William C. Mobley	

6. THE RATIONALE FOR GLUTAMATERGIC THERAPY IN ALZHEIMER'S DISEASE.	105
Paul T. Francis	
7. SECRETASES AS PHARMACOLOGICAL TARGETS IN ALZHEIMER'S DISEASE.	113
Nigel M. Hooper and Emma R. L. C. Vardy	
8. γ-SECRETASE AS A TARGET FOR ALZHEIMER'S DISEASE	125
Michael S. Wolfe	
9. THE RATIONALE FOR AN IMMUNOLOGICAL APPROACH TO ALZHEIMER'S THERAPEUTICS	141
Dave Morgan	
10. NEUROINFLAMMATION, ALZHEIMER DISEASE, AND OTHER AGING DISORDERS	149
Edith G. McGeer and Patrick L. McGeer	
11. NONSTEROIDAL ANTI-INFLAMMATORY DRUGS (NSAIDs) AND DERIVED Aβ42-LOWERING MOLECULES FOR TREATMENT AND PREVENTION OF ALZHEIMER'S DISEASE (AD)	167
Sascha Weggen, Eva Czirr, Stefanie Leuchtenberger, and Jason Eriksen	
12. THE POTENTIAL APPLICATION OF ANTIOXIDANT AGENTS IN ALZHEIMER DISEASE THERAPEUTICS.	194
Paula I. Moreira, Mark A. Smith, Xiongwei Zhu, Akihiko Nunomura, and George Perry	
13. APOLIPOPROTEIN E: A POTENT GENE-BASED THERAPEUTIC TARGET FOR THE TREATMENT OF SPORADIC ALZHEIMER'S DISEASE.	212
Judes Poirier	
14. TAU PATHOLOGY AS A TARGET IN ALZHEIMER'S THERAPEUTICS	223
Khalid Iqbal and Inge Grundke-Iqbal	
15. DESIGN OF INHIBITORS OF AMYLOID-β MISFOLDING AND AGGREGATION FOR ALZHEIMER'S THERAPY	238
Lisbell D. Estrada, Cristian Lasagna, and Claudio Soto	

16. POTENTIAL APPLICATIONS OF GLYCOSAMINOGLYCAN-RELATED COMPOUNDS IN ALZHEIMER'S DISEASE	255
Céline Morissette, Diane Lacombe, Xianqi Kong, Ahmed Aman, Pascale Krzywkowski, Lioudmila Rodionova, Mounia Azzi, Daniel Delorme, and Barry D. Greenberg	
17. MULTIFUNCTIONAL NEUROPROTECTIVE DRUGS FOR THE TREATMENT OF ALZHEIMER'S DISEASE	274
Cornelis J. Van der Schyf, Werner J. Geldenhuys, and Moussa B. H. Youdim	
18. INTERPRETING CLINICAL STUDIES OF PUTATIVE THERAPEUTICS FOR ALZHEIMER'S DISEASE: THE CASE OF STATINS AND NSAIDs	296
Benjamin Wolozin	
INDEX	309

Pharmacological Mechanisms in Alzheimer's
Therapeutics

Cuello, C. (Ed.)

2007, XX, 324 p. 35 illus., Hardcover

ISBN: 978-0-387-71521-6