Record Nr. UNINA9910208955203321 **Titolo** Handbook of olfaction and gustation / / edited by Richard L. Doty Hoboken, New Jersey:,: Wiley Blackwell,, 2015 Pubbl/distr/stampa ©2015 **ISBN** 1-118-97175-2 1-118-96936-7 Edizione [Third edition.] Descrizione fisica 1 online resource (xviii, 1217 pages, 46 unnumbered plates): illustrations Disciplina 612.8/6 Soggetti Chemical senses Smell Taste Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Description based upon print version of record. Note generali Nota di bibliografia Includes bibliographical references at the end of each chapters and index. ""Title Page""; ""Copyright""; ""Table of Contents""; ""Foreword""; Nota di contenuto ""Preface""; ""Contributors""; ""Part 1: General Introduction""; ""Chapter 1: Introduction and Historical Perspective""; ""1.1 Introduction""; ""1.2 A Brief History of Perfume and Spice Use""; ""1.3 The Chemical Senses and Early Medicine""; ""1.4 The Renaissance and the Birth of Modern Studies of Taste and Smell""; ""1.5 The Modern ERA: 20th and 21st Century Advances""; ""1.6 Conclusions""; ""References""; ""Part 2: Olfaction""; ""Chapter 2: Anatomy of the Nasal Passages in Mammals""; ""2.1 Introduction"" ""2.2 Evolution of Complexity in the Vertebrate Nasal Cavity""""2.3 Mammalian Nasal Anatomy""; ""2.4 Primate Internal Nasal Anatomy""; ""2.5 Conclusions""; ""A2.1 Some Techniques for Studying the Nasal Passageways"": ""References"": ""Chapter 3: Olfactory Mucosa: Composition, Enzymatic Localization, and Metabolism"; ""3.1 Introduction""; ""3.2 Anatomy of the Nasal Cavity""; ""3.3 Composition of the Olfactory Mucosa""; ""3.4 Identity, Tissue- and Cell-Selective Expression, and Developmental Regulation of Nasal Biotransformation Enzymes""; ""3.5 Functions of Nasal Biotransformation Enzymes""

""3.6 Modification of Olfactory Xenobiotic Metabolism""""3.7 Conclusions"": ""Acknowledgments"": ""References"": ""Chapter 4: Development, Morphology, and Functional Anatomy of the Olfactory Epithelium""; ""4.1 Introduction""; ""Acknowledgments""; ""References""; ""Chapter 5: Olfactory Receptor Function""; ""5.1 Introduction""; ""5.2 Vertebrate Odorant Receptors""; ""5.3 A Novel Member of the Vertebrate Olfactory Receptors in the Olfactory Epithelium"; ""5.4 Olfactory Receptors in Non-Olfactory Tissues""; ""5.5 Conclusions""; ""References""; ""Chapter 6: Odorant Receptor Gene Regulation"" ""6.1 Introduction and Overview"""6.2 Organization and Structure of the Odorant Receptor Genes""; ""6.3 Conclusion""; ""References""; ""Chapter 7: Neurogenesis in the Adult Olfactory Epithelium""; ""7.1 Introduction""; ""7.2 Neurogenesis in Adult Olfactory Epithelium""; ""7.3 Regulation of Olfactory Neurogenesis""; ""7.4 Molecular Regulation of Olfactory Neurogenesis""; ""7.5 Clinical Applications from Olfactory Neurogenesis""; ""7.6 Conclusions""; ""Abbreviations""; ""Acknowledgments""; ""References""; ""Chapter 8: Anatomy and Neurobiology of the Main and Accessory Olfactory Bulbs"" ""8.1 Introduction"""8.2 Main Olfactory Bulb (MOB)""; ""8.3 Accessory Olfactory Bulb (AOB)""; ""8.4 Extrinsic Inputs""; ""References""; ""Chapter 9: Adult Neurogenesis in the Subventricular Zone and Migration to the Olfactory Bulb""; ""9.1 Introduction""; ""9.2 Subventricular Zone and Rostral Migratory Stream as a Neurogenic Niche""; ""9.3 Integration of Adult-Generated Neurons in the OB""; ""9.4 Phenotype Specification and Maintenance""; ""9.5 Adult Neurogenesis in the SVZ/RMS of the Aging and Pathological Brain""; ""9.6 Functional Roles Of Adult-Generated Neurons""; ""References"" ""Chapter 10: Cortical Olfactory Anatomy and Physiology""

Sommario/riassunto

"The largest collection of basic, clinical, and applied knowledge on the chemical senses ever compiled in one volume, the third edition of Handbook of Olfaction and Gustation encompass recent developments in all fields of chemosensory science, particularly the most recent advances in neurobiology, neuroscience, molecular biology, and modern functional imaging techniques. Divided into five main sections, the text covers the senses of smell and taste as well as sensory integration, industrial applications, and other chemosensory systems. This is essential reading for clinicians and academic researchers interested in basic and applied chemosensory perception"--Provided by publisher.