Record Nr. UNINA9910139117603321 Handbook of nanotoxicology, nanomedicine and stem cell use in **Titolo** toxicology / / Saura C. Sahu, Daniel A. Casciano, editors Pubbl/distr/stampa West Sussex, England:,: John Wiley & Sons,, 2014 ©2014 **ISBN** 1-118-85586-8 1-118-85601-5 1-118-85604-X Edizione [First edition.] Descrizione fisica 1 online resource (441 p.) Disciplina 615.1901 Nanoparticles - Toxicology Soggetti Nanostructured materials - Toxicology 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 and indexes. Nota di contenuto Handbook of Nanotoxicology, Nanomedicine and Stem Cell Use in Toxicology; Contents; Contributors; Preface; Acknowledgments; Dedication; Abbreviations and Acronyms; Part One Nanotoxicology; Chapter 01 Testing Nanotoxicity: An Update of New and Traditional Methods; Chapter 02 Considerations for In Vitro Nanotoxicity Testing: Chapter 03 In Vivo Evaluation of Acute and Chronic Nanotoxicity: Chapter 04 Genotoxicity of Silver Nanoparticles; Chapter 05 Immunotoxicology of Nanomaterials; Chapter 06 Neurotoxicity of **Nanoparticles** Chapter 07 Nanoparticles and Plants: From Toxicity to Activation of GrowthChapter 08 Epigallocatechin-3-gallate (EGCG) in or on Nanoparticles: Enhanced Stability and Bioavailability of EGCG Encapsulated in Nanoparticles or Targeted Delivery of Gold Nanoparticles Coated with EGCG; Part Two Nanomedicine; Chapter 09 Factors Affecting the Oral Bioavailability of Nanomaterials; Chapter 10 Nanomedicine in Cancer Treatment: Chapter 11 Nanomedicine in Diabetes: Using Nanotechnology in Prevention and Management of **Diabetes Mellitus** Chapter 12 Inhalation Pathway as a Promising Portal of Entry: What Has to Be Considered in Designing New Nanomaterials for Biomedical Application? Chapter 13 Nanomedicine for the Brain and the Eye: Disease Management in Poorly Accessible Compartments of the Body; Part Three Stem Cell Toxicology; Chapter 14 Stem Cells in Toxicity Testing; Chapter 15 Human Stem-Cell-Derived Cardiomyocytes in Drug Discovery and Toxicity Testing; Chapter 16 Pluripotent Stem Cells as Tools to Assess Developmental Toxicity: Diversity Instead of Consolidation

Chapter 17 Impact of Various Nanosystems on Stem Cell PhysiologyChapter 18 Predictive Mechanisms in Stem Cells: An In Vitro System-Based Method for Testing Carcinogenicity; Chapter 19 Epigenetic Modifications and Stem Cell Toxicology: Searching for the Missing Link; Chapter 20 Epigenetic Modeling and Stem Cells in Toxicology Testing; Chapter 21 Use of Video Bioinformatics Tools in Stem Cell Toxicology; Author Index; Subject Index

Sommario/riassunto

Handbook of Nanomedicine and Nanotoxicology