Record Nr. UNINA9910736014003321 Autore **Husen Azamal** Titolo Nanomaterials from Agricultural and Horticultural Products / / edited by Azamal Husen Singapore:,: Springer Nature Singapore:,: Imprint: Springer,, 2023 Pubbl/distr/stampa **ISBN** 9789819934355 9819934354 Edizione [1st ed. 2023.] Descrizione fisica 1 online resource (295 pages) Collana Smart Nanomaterials Technology, , 3004-8281 Disciplina 338.16 Soggetti Nanotechnology Nanobiotechnology Nanochemistry Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Nota di contenuto Nanomaterials and Nanocomposite in Agricultural and Horticultural Sectors -- Synthesis of Metal Nanoparticles from Vegetables and their Waste Materials for Diverse Application -- Synthesis of Metal-oxide Nanoparticles from Vegetables and their Waste Materials for Diverse Applications -- Synthesis of Metal Nanoparticles from Fruits and their Waste Materials for Diverse Applications -- Green Synthesis of Metaloxide Nanoparticles from Fruits and their Waste Materials for Diverse Applications -- Palm Waste Utilization for Nanoparticles Synthesis and their Various Application -- Rice Straw Waste Utilization for Nanoparticles Synthesis and their Various Applications -- Wheat Straw

Sommario/riassunto

This book gives a complete overview of current developments in the fabrication and diverse applications of metal and metal oxide nanomaterials synthesized from agricultural/horticultural products and organic waste materials. Nanoparticles are thought to have been

Applications -- Maize Waste Utilization for Nanoparticles Synthesis and

Waste Utilization for Nanoparticles Synthesis and their Various

their Various Application -- Various Metabolites and or Bioactive Compounds from Vegetables, and their use Nanoparticles Synthesis, and Applications -- Various Metabolites and Bioactive Compounds from Fruits, and their use Nanoparticles Synthesis and Applications.

present on earth naturally since its origin in the form of soil, water, volcanic dust, and minerals. Besides their natural origin, they have been also synthesized by using physical, chemical, and biological means. The chapters in this book look at agricultural as well as horticultural wastes from industries, such as palm oil, rubber, paper, wood, vegetable, coffee/tea, rice, wheat, maize, grass, and fruit juice processing factories, and describe the methods to extract and synthesize metal and metal oxide nanoparticles, which are then applied in various sectors such as food, agriculture, cosmetics, and medicines industries. The book is a reference source for academician, scientists, policymakers, students, and researchers scientist working in minimizing the environmental pollution and implementing nanotechnology into agricultural waste products to produce ecofriendly and cost-effective nanoparticles.