Record Nr. UNINA9910349508403321 Bioactive Molecules in Plant Defense: Signaling in Growth and Stress // **Titolo** edited by Sudisha Jogaiah, Mostafa Abdelrahman Pubbl/distr/stampa Cham:,: Springer International Publishing:,: Imprint: Springer,, 2019 **ISBN** 3-030-27165-X Edizione [1st ed. 2019.] 1 online resource (XIV, 258 p. 45 illus., 26 illus. in color.) Descrizione fisica Disciplina 660.6 Soggetti Biotechnology Plant biochemistry Bioorganic chemistry Plant science **Botany** Mycology Agriculture Plant Biochemistry Bioorganic Chemistry **Plant Sciences** Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Nota di bibliografia Includes bibliographical references. Introduction -- Plant Growth Promoting Fungi: Diversity and Nota di contenuto Classification -- Microbial Signaling and Plant Growth Promotion --Role of Elicitors in Plant Defense Signaling -- Plant-Microbe Interaction: Gene-to-Metabolite Network -- Phytohormones in the Modulation of Plant Cellular Responses to Stress -- Reactive Oxygen Species Generation-Scavenging and Signaling -- Lipoxygenase Signaling in Plant Defense -- Alkaloid Role in Plant Defense -- Beta-Glucosidades as detonators of Plant Chemical Defense -- Plant Nutritional Deficiency and its Impact on Crop Production. This book focuses on signaling molecules in plant defense, outlining Sommario/riassunto some of the most important cellular and chemical plant defense

strategies during periods of stress and growth. Written by leading

experts, it covers topics such as the diversity of plant-growth-promoting fungi, the gene-to-metabolite network of plant-microbe interactions, modulation of plant cellular responses to stress, and how plant nutritional deficiency affects crop production. Together with the companion volume Bioactive Molecules in Plant Defense: Saponins, this book offers an essential source of information for postgraduate students and researchers interested in plant pathology, mycology and sustainable agriculture.