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Collana	Modern Drying Technology
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Nota di contenuto	Modern Drying Technology: Product Quality and Formulation; Contents; Series Preface; Preface of Volume 3; List of Contributors; Recommended Notation; EFCE Working Party on Drying; Address List; 1 Quality Changes in Food Materials as Influenced by Drying Processes; 1.1 Introduction; 1.2 Biochemical Reactions Induced by Drying; 1.3 Physical Transformations During Drying; 1.4 Mechanical Transformations Induced by Drying; 1.5 Storage and Rehydration of Food Products; 1.6 Conclusion; References; 2 Impact of Drying on the Mechanical Properties and Crack Formation in Rice; 2.1 Introduction 2.2 Impact of Drying Conditions on Head Rice Yield for Paddy and Parboiled Rice2.3 Characterization of Fissures Formation by Image Analysis Techniques; 2.4 Characterization of the Mechanical Properties of the Rice Material; 2.4.1 Stress-Strain Relationships for Linear Materials; 2.4.2 Failure Strength in Rice Grains; 2.5 Modeling the Impact of Drying on the Final Quality of Rice Grains; 2.6 Conclusion; References; 3 Characterization and Control of Physical Quality Factors During Freeze-Drying of Pharmaceuticals in Vials; 3.1 Introduction 3.2 Characterization Methods of the Key Quality Factors During Freeze-

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Sommario/riassunto

This five-volume series provides a comprehensive overview of all important aspects of modern drying technology, concentrating on the transfer of cutting-edge research results to industrial use. Volume 3 deals with product quality and formulation. Biochemical, physical, and mechanical transformations which can occur during drying are described as well as methods for monitoring product quality such as process analytical technology. The preservation of desired product properties is discussed in detail for foods and biomaterials, freeze-dried active pharmaceutical ingredients, and highly porous

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