1. Record Nr. UNINA9910626113203321 Autore Castilla Nicolas Titolo Greenhouse technology and management by // Nicolas Castilla; translated by Esteban J. Baeza; reviewed by A.P. Papadopoulos Wallingford, Oxfordshire, UK; Cambridge, MA; CABI, 2012 Pubbl/distr/stampa 1-78064-202-4 **ISBN** Edizione [2nd ed.] 1 online resource (373 p.) Descrizione fisica Disciplina 635.9823 Soggetti Greenhouses Plastics in agriculture Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Note generali Translation of the second ed.: Invernaderos de plastico: tecnologia v manejo. Nota di bibliografia Includes bibliographical references and index. Nota di contenuto Contents; Foreword; Preface to the First Edition (Spanish); Preface to the Second Edition (Spanish); Acknowledgements; 1 Protected Cultivation; 1.1 Introduction; 1.2 Types of Protection; 1.3 Objectives of Protected Cultivation; 1.4 History; 1.5 Importance; 1.6 Plastic Materials; 1.7 Summary; 2 The External Climate; 2.1 Introduction; 2.2 The Earth and the Sun; 2.2.1 Introduction; 2.2.2 The seasons; 2.3 Day Length; 2.4 Solar Radiation; 2.4.1 Introduction; 2.4.2 Quality of solar radiation; 2.4.3 Quantity of solar radiation; 2.4.4 Measurement of solar radiation; 2.5 The Earth's Radiation 2.6 Net Radiation 2.7 Temperature; 2.7.1 Air temperature; 2.7.2 Soil temperature; 2.7.3 The relationship between solar radiation and air temperature; 2.8 Wind; 2.9 Composition of the Atmosphere; 2.9.1 Water vapour content; 2.9.2 CO[sub(2)] content; 2.9.3 Atmospheric pollution; 2.10 Rainfall; 2.11 Altitude and Topography; 2.12 Summary; 3 The Greenhouse Climate; 3.1 Introduction; 3.2 The Greenhouse Effect; 3.3 Solar Radiation in Greenhouses; 3.3.1 Introduction; 3.3.2 Transmissivity to radiation; 3.3.3 Orientation and transmissivity; 3.3.4 Optimization of the transmissivity; 3.4 Temperature 3.4.1 Air temperature3.4.2 Plant temperature; 3.4.3 Soil temperature; 3.4.4 Thermal inertia in the greenhouse; 3.5 The Wind Inside the

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Sommario/riassunto

Greenhouse cultivation has expanded in recent decades with increased demand for food production and newly developed technologies to improve processes. This book, which concentrates on plant production grown in plastic greenhouse conditions, covers growing techniques such as fertilization and plant protection and up-to-date technologies and management practices. It also takes an integrated approach to greenhouse production addressing issues such as economics, marketing and production strategies. This is the English edition of the successful Spanish book published by Ediciones Mundi-Prensa, Madri