

1. Record Nr.	UNINA9910298492103321
Titolo	Handbook of Operations Research in Agriculture and the Agri-Food Industry // edited by Lluís M. Plà-Aragónés
Pubbl/distr/stampa	New York, NY : , : Springer New York : , : Imprint : Springer, , 2015
ISBN	1-4939-2483-4
Edizione	[1st ed. 2015.]
Descrizione fisica	1 online resource (469 p.)
Collana	International Series in Operations Research & Management Science, , 0884-8289 ; ; 224
Disciplina	330 338.1 519.6 658.40301
Soggetti	Operations research Decision making Management science Agricultural economics Operations Research/Decision Theory Operations Research, Management Science Agricultural Economics
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Description based upon print version of record.
Nota di bibliografia	Includes bibliographical references and index.
Nota di contenuto	Optimal Planning of Pig Transfers Along a Pig Supply Chain -- Planning the Planting, Harvest and Distribution of Fresh Horticultural Products -- Production and Logistics Planning in Seed Corn -- Harvest Planning in Apple Orchards Using an Optimization Model -- Optimisation of the Supply Chain Management of Sugar Cane in Cuba -- A Hierarchical Planning Scheme Based on Precision Agriculture -- Optimal Transport Planning for the Supply to a Fruit Logistic Center -- Simulating Vulnerability in Victoria's Fruit and Vegetable Supply Chain -- Simulation Optimization: Applications in Fish Farming - Theory vs. Practices -- Swarm Intelligence in Optimal Management of Aquaculture Farms -- Multi-objective Optimisation for Improved Agricultural Water and Nitrogen Management in Selected Regions of Africa -- Modelling of Catastrophic Farm Risks Using Sparse Data -- Forecasting Grape

Maturation Under Head Stress Using MatPred -- Technical Efficiency of Sow Farms: A Parametric and Non-parametric Approach -- Multicriteria Analysis of Olive Farms Sustainability -- On the Feasibility of Establishing a Northern-Western Australian Beef Abattoir as a Facility Location Problem -- Optimal Delivery of Pigs to the Abattoir -- Diet Problem -- Markov Decision Processes to Model Livestock Systems.

Sommario/riassunto

The scope of this book is Operations Research methods in Agriculture and a thorough discussion of derived applications in the Agri-food industry. The book summarizes current research and practice in this area and illustrates the development of useful approaches to deal with actual problems arising in the agriculture sector and the agri-food industry. This book is intended to collect in one volume high quality chapters on Methods and Applications in Agriculture and Agri-food industry considering both theoretical issues and application results. Methods applied to problems in agriculture and the agri-food industry include, but are not restricted to, the following themes: Dynamic programming Multi-criteria decision methods Markov decision processes Linear programming Stochastic programming Parameter estimation and knowledge acquisition Learning from data Simulation Descriptive and normative decision tree techniques, including: agent modelling and simulation, and state of the art surveys Each chapter includes some standard and traditional methodology but also some recent research advances. All the applications presented in the chapters have been inspired and motivated by the demands from the agriculture and food production areas.
