Record Nr.	UNINA9910456224003321
Autore	Chen Chun-hung
Titolo	Stochastic simulation optimization [[electronic resource]] : an optimal computing budget allocation / / Chun-Hung Chen, Loo Hay Lee
Pubbl/distr/stampa	Singapore ; ; Hackensack, N.J., : World Scientific, c2011
ISBN	1-62870-230-3 1-283-14386-0 9786613143860 981-4282-65-0
Descrizione fisica	1 online resource (248 p.)
Collana	System engineering and operations research ; ; v. 1
Altri autori (Persone)	LeeLoo Hay
Disciplina	519.2
Soggetti	Systems engineering - Simulation methods Stochastic processes Mathematical optimization Electronic books.
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 (p. 219-224) and index.
Nota di contenuto	Foreword; Preface; Acknowledgments; Contents; 1. Introduction to Stochastic Simulation Optimization; 2. Computing Budget Allocation; 3. Selecting the Best from a Set of Alternative Designs; 4. Numerical Implementation and Experiments; 5. Selecting An Optimal Subset; 6. Multi-objective Optimal Computing Budget Allocation; 7. Large-Scale Simulation and Optimization; 8. Generalized OCBA Framework and Other Related Methods; Appendix A: Fundamentals of Simulation; Appendix B: Basic Probability and Statistics; Appendix C: Some Proofs in Chapter 6; Appendix D: Some OCBA Source Codes; References Index
Sommario/riassunto	With the advance of new computing technology, simulation is becoming very popular for designing large, complex, and stochastic engineering systems, since closed-form analytical solutions generally do not exist for such problems. However, the added flexibility of simulation often creates models that are computationally intractable. Moreover, to obtain a sound statistical estimate at a specified level of confidence, a large number of simulation runs (or replications) is usually required for

1.