

1. Record Nr.	UNINA9910956536303321
Titolo	Computer system performance modeling in perspective : a tribute to the work of Professor Kenneth C. Sevcik // editor Erol Gelenbe
Pubbl/distr/stampa	London, : Imperial College Press, c2006
ISBN	9786611867430 9781281867438 1281867438 9781860948923 1860948928
Edizione	[1st ed.]
Descrizione fisica	1 online resource (290 p.)
Collana	Advances in computer science and engineering: Texts ; ; 1
Altri autori (Persone)	GelenbeErol <1945->
Disciplina	004.24
Soggetti	Computer systems - Evaluation Computer systems - Reliability Electronic digital computers - Evaluation
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.
Nota di contenuto	Contents ; Preface ; Chapter 1 Ken Sevcik as an Advisor and Mentor ; Chapter 2 Shadow Servers and Priority Scheduling ; 1. Introduction ; 2. Single Class Models ; 3. Multi-Class Models ; 4. Importance of Priorities ; 5. The Shadow Server Approximaton ; 6. Extensions 7. Comments on Significance References ; Chapter 3 On the Chronology of Dynamic Allocation Index Policies: The Pioneering Work of K. C. Sevcik ; 1. Introduction ; 2. Sevcik's Smallest-Rank-First Index Policy ; 3. Background and Chronology ; 4. Examples ; 5. Concluding Remarks References Chapter 4 Operational Analysis ; 1. Introduction ; 2. Dead Cows ; 3. Dead Cows in Markovian Queueing Networks ; 4. The Birth of Operational Analysis ; 5.

The Fundamental Assumptions of Operational Analysis
; 6. Controversy ; 7. Salute ; 8. An Historical
Footnote
References (Published) References (Unpublished
Technical Reports) ; Appendix -
Operational Analysis: A Fable ; Chapter 5
Function Approximation by Random Neural Networks with a Bounded
Number of Layers
; 1. Introduction ; 2. The GNN and Its Extensions
; 2.1. The BGNN model
3. Approximation of Functions of One Variable by the GNN with a
Bounded Number of Layers
3.1. Technical premises ; 3.2. BGNN approximation
of continuous functions of one variable
; 3.3. CGNN approximation of continuous functions of one variable
4. Approximation of Continuous Functions of s Variables

Sommario/riassunto

Computer system performance evaluation is a key discipline for the understanding of the behavior and limitations of large scale computer systems and networks. This volume provides an overview of the milestones and major developments of the field. The contributions to the book include many of the principal leaders from industry and academia with a truly international coverage, including several IEEE and ACM Fellows, two Fellows of the US National Academy of Engineering and a Fellow of the European Academy, and a former President of the Association of Computing Machinery. <i>Sample Chapter(s)
