

1. Record Nr.	UNINA9910438050203321
Autore	Krishnaswamy Smita
Titolo	Design, analysis and test of logic circuits under uncertainty // Smita Krishnaswamy, Igor L. Markov, John P. Hayes
Pubbl/distr/stampa	New York, : Springer, 2013
ISBN	9781283640770 1283640775 9789048196449 9048196442
Edizione	[1st ed. 2013.]
Descrizione fisica	1 online resource (129 p.)
Collana	Lecture notes in electrical engineering, , 1876-1100 ; ; v. 115
Altri autori (Persone)	MarkovIgor L HayesJohn P <1944-> (John Patrick)
Disciplina	621.395
Soggetti	Logic circuits Uncertainty (Information theory)
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	Introduction -- Probabilistic Transfer Matrices -- Computing with Probabilistic Transfer Matrices -- Testing Logic Circuits for Probabilistic Faults -- Signature-based Reliability Analysis -- Design for Robustness -- Summary and Extensions.
Sommario/riassunto	Integrated circuits (ICs) increasingly exhibit uncertain characteristics due to soft errors, inherently probabilistic devices, and manufacturing variability. As device technologies scale, these effects can be detrimental to the reliability of logic circuits. To improve future semiconductor designs, this book describes methods for analyzing, designing, and testing circuits subject to probabilistic effects. The authors first develop techniques to model inherently probabilistic methods in logic circuits and to test circuits for determining their reliability after they are manufactured. Then, they study error-masking mechanisms intrinsic to digital circuits and show how to leverage them to design more reliable circuits. The book describes techniques for: <ul style="list-style-type: none"> • Modeling and reasoning about probabilistic behavior in logic circuits, including a matrix-based reliability-analysis framework; • Accurate analysis of soft-error rate (SER) based on

functional-simulation, sufficiently scalable for use in gate-level optimizations; • Logic synthesis for greater resilience against soft errors, which improves reliability using moderate overhead in area and performance; • Test-generation and test-compaction methods aimed at probabilistic faults in logic circuits that facilitate accurate and efficient post-manufacture measurement of soft-error susceptibility.

2. Record Nr.	UNINA9910703237703321
Titolo	Enhancing the use and quality of colorectal cancer screening
Pubbl/distr/stampa	[Place of publication not identified], : Agency for Health Care Policy and Research Dept of Health and Human Services, 2010
Descrizione fisica	1 online resource (xi, 197 p.)
Collana	Evidence report/technology assessment Enhancing the use and quality of colorectal cancer screening
Disciplina	616.99/435
Soggetti	Colon (Anatomy) - Cancer - Diagnosis Rectum - Cancer - Diagnosis Medical screening - Quality control Medical screening - Utilization Medical laboratories Colonic Diseases Intestinal Neoplasms Rectal Diseases Diagnosis Health Services Administration Health Care Quality, Access, and Evaluation Gastrointestinal Neoplasms Intestinal Diseases Delivery of Health Care Digestive System Neoplasms Gastrointestinal Diseases Digestive System Diseases Neoplasms by Site Disease Neoplasms Colorectal Neoplasms Diagnostic Techniques and Procedures Quality of Health Care

Medicine
Health & Biological Sciences
Oncology

Lingua di pubblicazione

Inglese

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