1.	Record Nr.	UNINA9910366590703321
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	Titolo	A Practical Approach to VLSI System on Chip (SoC) Design : A Comprehensive Guide / / by Veena S. Chakravarthi
	Pubbl/distr/stampa	Cham : , : Springer International Publishing : , : Imprint : Springer, , 2020
	ISBN	9783030230494
		303023049X
	Edizione	[1st ed. 2020.]
	Descrizione fisica	1 online resource (XXXII, 312 p. 204 illus.)
	Disciplina	621.3815
	Soggetti	Electronic circuits
		Microtechnology
		Microelectromechanical systems
		Computer engineering
		Computer networks
		Microprocessors
		Computer architecture
		Electronic Circuits and Systems
		Microsystems and MEMS
		Computer Engineering and Networks
		Processor Architectures
	Lingua di pubblicazione	Inglese
	Formato	Materiale a stampa
	Livello bibliografico	Monografia
	Nota di contenuto	Introduction -- SoC design methodology -- System on Chip Components -- DFT and Synthesis -- Static timing Analysis (STA) -- VLSI System Verification -- Physical Design -- Advanced Techniques: Low power UPF flow -- Reference Design: Specification to Layout.
	Sommario/riassunto	This book provides a comprehensive overview of the VLSI design process. It covers end-to-end system on chip (SoC) design, including design methodology, the design environment, tools, choice of design components, handoff procedures, and design infrastructure needs. The book also offers critical guidance on the latest UPF-based low power design flow issues for deep submicron SOC designs, which will prepare

readers for the challenges of working at the nanotechnology scale. This practical guide will provide engineers who aspire to be VLSI designers with the techniques and tools of the trade, and will also be a valuable professional reference for those already working in VLSI design and verification with a focus on complex SoC designs. A comprehensive practical guide for VLSI designers; Covers end-to-end VLSI SoC design flow; Includes source code, case studies, and application examples.