

# High Speed Semiconductor Devices, VLSI Devices, Device Modeling

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Bibliography  
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Sr. No.	Books available in the Resource Centre
1.	Ali, Fazal, ed., Gupta, Aditya, ed. HEMTs and HBTs : devices, fabrication and circuits 621.3815284 ALI 011814
2.	Anderson, Betty Lise & Anderson, Richard L. Fundamentals of semiconductor devices 621.38152 AND 017185
3.	Bell, David A. Electronic devices and circuits, 4th ed. 621.3815 BEL 013635
4.	Benda, Vitezslav, Gower, John & Grant, Duncan A. Power semiconductor devices : theory and applications 621.3815 BEN 011902
5.	Bhattacharya, Pallab Semiconductor optoelectronic devices, 2nd ed. 621.381 52 BHA 011811
6.	Bose, Bimal K. Modern power electronics and AC drives 621.381 BOS 004471
7.	Brennan, Kevin F. Introduction to semiconductor devices : for computing and telecommunications applications 621.38152 BRE 015364
8.	Brennan, Kevin F. & Brown, April S. Theory of modern electronic semiconductor devices 621.38152 BRE 014028
9.	Bushnell, Michael L., Agrawal, Vishwani D. Essentials of electronic testing for signal VLSI circuits 621.395 BUS 002100
10.	Chein, Wai-Kai, ed. Memory, microprocessor, and ASIC 621.395 CHE 05925
11.	Colinge, Jean-Pierre & Colinge, Cynthia A. Physics of semiconductor devices 537.622 COL 016724
12.	DasGupta, Nandita & DasGupta, Amitava Semiconductor devices : modelling and technology 621.38152 DAS 009496
13.	Dutta, Alope Semiconductor devices and circuits 621.38152 DUT 021263, 020233, 020234
14.	Dimitrijevic, Sima Principles of semiconductor devices 621.38152 DIM 017502

15.	Dimitrijević, Sima Understanding semiconductor devices 621.38152 DIM 014317
16.	Fjeldly, Tor A., Ytterdal, Trond & Shur, Michael Introduction to device modeling and circuit simulation 621.38152 FJE 010235
17.	Geiger, Randall L. , Allen, Phillip E. & Strader, Noel R. VLSI design techniques for analog and digital circuits 621.381 GEI 003406
18.	Golio, Mike ed. RF and microwave semiconductor device handbook 621.384 REF GOL 004486
19.	Gu, Richard X. High-performance digital VLSI circuit design 621.381 GU 004021
20.	Haraszti, Tegze P. CMOS memory circuits 621.39732 HAR 002075
21.	Hartnagel, Hans Ludwig, Katilius, Ramunas & Matulionis, Arvydas Microwave noise in semiconductor devices 621.38133 HAR 002281
22.	Ibach, Harald, Luth, Hans Solid-state physics : an introduction to principles of materials science, 3 <sup>rd</sup> ed. 530.41 LUT 015291
23.	Irons, Fred H., ed. Active filters for integrated-circuit applications 621.3815324 IRO 012907
24.	Islam, S. S. Semiconductor physics and devices 537.622 ISL 014829
25.	Itoh, Kiyoo VLSI memory chip design 621.39722 ITO 015296
26.	Kano, Kanaan Semiconductor devices 621.38152 KAN 010468
27.	Keeth, Brent ... [et al.] DRAM circuit design : fundamental to high-speed topics 621.39732 KEE 018390
28.	Kelly, Joe, Engelhardt, Michael Advanced production testing of RF, SoC, and SiP devices 621.3815 KEL 016331
29.	Levinshtein, Michael, Kostamovaara, Juha & Vainshtein, Sergey: Breakdown phenomena in semiconductors and semiconductor devices 621.38152 LEV 014012

30.	Luryi, Serge, Xu, Jimmy, Zaslavsky, Alex Future trends in microelectronics 621.381 LUR 002110
31.	Massabrio, Giuseppe, Antognetti, Paolo Semiconductor device modeling with spice 621.38152028553 MAS 014284
32.	Millman, Jacob, Grabel, Arvin Microelectronics 621.3817 MIL 003179
33.	Nagchoudhuri, Dipankar Microelectronic devices 621.38152 NAG 012636
34.	Narasimhan, K. L., ed. & Sharma, Dinesh K., ed. International workshop on physics of semiconductor devices 537.31133 NAR 018367
35.	Natarajan, Sundaram Microelectronics : analysis and design 621.3815 NAT 015237
36.	Neamen, Donald A. Semiconductor physics and devices : basic principles, 3rd ed. 537.622 NEA 005804
37.	Ng, Kwok K. Complete guide to semiconductor devices, 2nd ed. 621.38152 NG 015502
38.	Pierret, Robert F. Semiconductor fundamentals. Volume 1, 2nd ed. 621.38152 PIE 011664
39.	Pierret, Robert F. Advanced semiconductor fundamentals, 2nd ed. 621.38152 PIE 014804
40.	Piprek, Joachim Semiconductor optoelectronic devices : introduction to physics and simulation 621.381045 PIP 011855
41.	Roblin, Patrick, Rohdin, Hans High-speed heterostructure devices : from device concepts to circuit modeling 621.38152 ROB 014164
42.	Rossetti, Nazzareno Managing power electronics : VLSI and DSP-driven computer systems 621.381044 ROS 017517
43.	Roy, Sitesh Kumar & Mitra, Monojit Microwave semiconductor devices 621.38133 ROY 010031-35
44.	Sapoval, B., Hermann, C. Physics of semiconductors 537.622 SAP 011394

45.	Sapoval, B., Hermann, C. Physics of semiconductors 537.622 SAP 011394
46.	Seeger, Karlheinz Semiconductor physics : an introduction, 9th ed. 537.622 SEE 018533
47.	Sharma, Ashok K. Advanced semiconductor memories : architectures, designs, and applications 621.39732 SHA 017774
48.	Sharma, Ashok K. Semiconductor memories : technology, testing, and reliability 621.39732 SHA 017775
49.	Singh, Jasprit Semiconductor devices : basic principles 621.38152 SIN 012272
50.	Singh, M. D. & Khanchandani, K. B. Power electronics 621.381 SIN 003402
51.	Sze, S. M. Physics of semiconductor devices 537.622 SZE 017590
52.	Sze, S. M. Semiconductor devices 621.3815 SZE 003273-77
53.	Sze, S. M. & Ng, Kwok K. Physics of semiconductor devices, 3rd ed. 537.622 SZE 015495
54.	Sze, S. M. , Ed. Modern semiconductor device physics 621.38152 SIM 008340
55.	Sze, S. M., ed. High speed semiconductor devices 621.38152 SZE 011815
56.	Sze, S.M. VLSI technology 621.381 SZE 003426
57.	Taur, Yuan & Ning, Tak H. Fundamentals of modern VLSI devices 621.395 TAU 008253
58.	Tritt, Terry M, Ed. Recent trends in thermoelectric materials research 620.112 972 TRI 009552

59.	Tyagi, M. S. Introduction to semiconductor materials and devices 621.38152 TYA 004137
60.	Ytterdal, Trond & Cheng, Yuhua Device modeling for analog and RF CMOS circuit design 621.395 YTT 008862
61.	Yu, Peter Y., Cardona, Manuel Fundamentals of semiconductors: physics and materials properties, 3rd ed. 537.622 YU 018755

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