Design and Test Technology for Dependable Systems-on-Chip

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Designing reliable and dependable embedded systems has become increasingly important as the failure of these systems in an automotive, aerospace or nuclear application can have serious consequences.

**Topics Covered:**

- Built-in self repair for logic structures
- Combined test-data compression and test planning
- Diagnostic modeling of digital systems
- Fault simulation and fault injection technology
- Fault-tolerant and fail-safe design based on reconfiguration
- Flexible fault-tolerant schedules for embedded systems
- Memory testing and self-repair
- Optimizing fault tolerance for multi-processor system-on-chip
- Software-based self-test of embedded microprocessors
- Transient faults detection and compensation


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