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Nota di contenuto	Introduction -- Resilient Event-Triggered Controller Synthesis of Networked Control Systems Under Periodic DoS Jamming Attacks -- Observer-Based Event-Triggered Control for Networked Linear Systems Subject to Denial-of-Service Attacks -- Security Control of Cyber-Physical System Based on Switching Approach for Intermittent Denial-of-Service Jamming Attack -- Event-Based Secure Leader-Following Consensus Control for Multiagent Systems With Multiple Cyber Attacks -- Observer-Based Distributed Secure Consensus Control of a Class of Linear Multi-Agent Systems Subject to Random Attacks -- Security Control of Networked T-S Fuzzy System Under Intermittent DoS Jamming Attack with Event-Based Predictor -- Bandwidth Allocation-Based Switched Dynamic Triggering Control Against DoS Attacks -- Attack-Resilient Event-Triggered Controller Design of DC Microgrids Under DoS Attacks -- Resilient dynamic event-triggered control for multi-area power systems with renewable energy penetration under DoS attacks -- Resilient Load Frequency Control Design: DoS Attacks Against Additional Control Loop -- Secure Distributed Optimal Frequency Regulation of Power Grid with Time-Varying Voltages under Cyberattack.
Sommario/riassunto	This book shows some secure control methods of networked control systems related to linear control system, nonlinear control system, multi-agent system and its applications in power systems. The proposed secure control methods provide some useful results about

modeling of network attacks, resilient analysis and synthesis methods, active defense control method. The contents of this book are lists as followings. (1) Modeling of DoS attacks, deception attacks and replay attacks; (2) Secure control methods are proposed by combining delay system method, switched system method and event-based control method. (3) Active control methods are proposed by using model-predictive control and redundant control. (4) The proposed control methods are applied to the security problem of power system. The methods of this book include DoS attacks modeling such as, periodic jamming attack model, model-based average dwell time model, deception attack modeling and relay attack modeling; piece-wise Lyapunov-Krasoviskii functional method, stochastic control method; the results including resilient conditions of networked control system and related resilient control design method with linear matrix inequalities(LMIs). From this book, readers can learn about the general network attack modeling methods, resilient analysis and synthesis methods, active control methods from viewpoint of redundancy control, and secure conditions of power systems. Some fundamental knowledge prepared to read this book includes delay system theory, event triggered mechanism, T-S fuzzy system theory and frequency/voltage control of power system.
