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Nota di bibliografia	Includes bibliographical references.
Nota di contenuto	Themes And Issues -- On the Security Implications of Disruptive Technologies -- Cyber Security: Are Economic Incentives Adequate? -- Government Intervention in Information Infrastructure Protection -- Infrastructure Security -- Security of Information Flow in the Electric Power Grid -- Securing Positive Train Control Systems -- Lessons Learned from the Maroochy Water Breach -- Reducing Risk in Oil and Gas Production Operations -- Control Systems Security -- Securing Current and Future Process Control Systems -- Security Strategies for SCADA Networks -- Security Enhancements for Distributed Control Systems -- Security Challenges of Reconfigurable Devices in the Power Grid -- Intrusion Detection and Event Monitoring in SCADA Networks -- Passive Scanning in Modbus Networks -- Formal Modeling and Analysis of the Modbus Protocol -- Security Analysis of Multilayer SCADA Protocols -- Remote Forensic Analysis of Process Control Systems -- Creating a European SCADA Security Testbed -- Network Infrastructure Security -- Protecting Internet Services from Low-Rate DoS Attacks -- Detecting Wormhole Attacks in Wireless Sensor Networks -- Detecting Non-Discoverable Bluetooth Devices -- Infrastructure Interdependencies -- Risk Analysis in Interdependent Infrastructures -- Analysis of Interdependencies Between Italy's Economic Sectors -- The ISE Metamodel for Critical Infrastructures -- Multigraph Dependency Models for Heterogeneous Infrastructures --

Visualizing Cascading Failures in Critical Cyber Infrastructures -- Risk Assessment -- A Service-Oriented Approach for Assessing Infrastructure Security -- Analysis of Electrical Power and Oil and Gas Pipeline Failures.

Sommario/riassunto

The information infrastructure---comprising computers, embedded devices, networks and software systems---is vital to day-to-day operations in every sector: information and telecommunications, banking and finance, energy, chemicals and hazardous materials, agriculture, food, water, public health, emergency services, transportation, postal and shipping, government and defense. Global business and industry, governments, indeed society itself, cannot function effectively if major components of the critical information infrastructure are degraded, disabled or destroyed. Critical Infrastructure Protection describes original research results and innovative applications in the interdisciplinary field of critical infrastructure protection. Also, it highlights the importance of weaving science, technology and policy in crafting sophisticated, yet practical, solutions that will help secure information, computer and network assets in the various critical infrastructure sectors. Areas of coverage include: - Themes and Issues - Infrastructure Security - Control Systems Security - Network Infrastructure Security - Infrastructure Interdependencies - Risk Assessment This book is the first volume in the annual series produced by the International Federation for Information Processing (IFIP) Working Group 11.10 on Critical Infrastructure Protection, an international community of scientists, engineers, practitioners and policy makers dedicated to advancing research, development and implementation efforts focused on infrastructure protection. The book contains a selection of twenty-seven edited papers from the First Annual IFIP WG 11.10 International Conference on Critical Infrastructure Protection, held at Dartmouth College, Hanover, New Hampshire, USA in the spring of 2007. Critical Infrastructure Protection is an important resource for researchers, faculty members and graduate students, as well as for policy makers, practitioners and other individuals with interests in homeland security. Eric Goetz is the Associate Director for Research at the Institute for Information Infrastructure Protection, Dartmouth College, Hanover, New Hampshire, USA. Sujeet Shenoj is the F.P. Walter Professor of Computer Science and a principal with the Center for Information Security at the University of Tulsa, Tulsa, Oklahoma, USA.
