

1. Record Nr.	UNINA9910583003703321
Autore	Norman Thomas L
Titolo	Electronic Access Control
Pubbl/distr/stampa	San Diego : , : Elsevier Science & Technology, , 2017 ©2018
ISBN	0-12-805465-4
Edizione	[2nd ed.]
Descrizione fisica	1 online resource (566 pages)
Disciplina	621.38928
Soggetti	Electronic security systems Electronic locking devices
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di contenuto	Front Cover -- Electronic Access Control -- Copyright Page -- Contents -- I. The Basics -- 1 Introduction and Overview -- Chapter Overview -- Rules to Live By -- Who Should Read This Book? -- How Is Material Presented in This Book? -- What Will You Learn, and How Will It Help Your Career? -- What Is in This Book? -- Part I: the basics -- Chapter 2 -- Chapter 3 -- Part II: how things work -- Chapter 4 -- Chapter 5 -- Chapter 6 -- Chapter 7 -- Chapter 8 -- Chapter 9 -- Chapter 10 -- Chapter 11 -- Chapter 12 -- Chapter 13 -- Chapter 14 -- Chapter 15 -- Chapter 16 -- Chapter 17 -- Chapter 18 -- Part III: The things that make systems sing -- Chapter 19 -- Chapter 20 -- Chapter 21 -- Chapter 22 -- Chapter 23 -- Chapter 24 -- Chapter 25 -- Chapter 26 -- Chapter 27 -- Chapter Summary -- 2 Foundational Security and Access Control Concepts -- Chapter Overview -- Understanding Risk -- Types of organization assets -- Types of users -- Types of threat actors -- Understanding criticalities and consequences -- Understanding vulnerability -- Understanding probability -- What is risk? -- Managing Risk -- Methods of managing risk -- How security and access control programs help manage risk -- Security program elements -- The importance of a qualified risk analysis -- The importance of security policies and procedures -- Types of Countermeasures -- Hi-tech -- Lo-tech -- No-tech -- Mixing approaches -- Layering security countermeasures -- Access Control

System Concepts -- Types of users -- Types of areas/groups -- User schedules -- Portal programming -- Credential programming -- Group and schedule programming -- Chapter Summary -- 3 How Electronic Access Control Systems Work -- Chapter Overview -- First, a Little History -- The Basics -- Authorized Users, User Groups, Access Zones, Schedules, and Access Groups -- Authorized users -- User groups -- Access zones.

Schedules -- Access groups -- Portals -- Types of portals -- Credential readers -- Electrified locks -- Safety systems -- Alarm monitoring -- Request-to-exit sensors -- Credentials and Credential Readers -- Credential authorization -- Locks, Alarms, and Exit Devices -- Electrified locks -- Alarms -- Exit Devices -- Data, Data Retention, and Reports -- Chapter Summary -- II. How Things Work -- 4 Access Control Credentials and Credential Readers -- Chapter Overview -- Access Credentialing Concepts -- Keypads -- Access Cards, Key Fobs, and Card Readers -- Wiegand Wire Cards -- 125K Passive Proximity Cards -- 125KHz (Low Frequency) Active Proximity Cards -- 13.56MHz (High Frequency) Contactless Smart Cards -- RFID Wireless Transmitter Systems -- Multitechnology Cards -- Mobile Phone Access Control -- Capture Card Reader -- Multitechnology Card Readers -- Biometric Readers -- Photo Identification -- Chapter Summary -- 5 Types of Access Controlled Portals -- Chapter Overview -- Portal Passage Concepts -- Card entry/free exit -- Card entry/card exit -- Tailgate detection -- Positive access control -- 2-Man rule -- Schedules -- Antipassback -- Pedestrian Portal Types -- Standard doors -- Automatic doors -- Revolving doors -- Turnstiles -- Man-traps -- Automated walls -- Vehicle Portals -- Standard barrier gates -- Automated vehicle swing gates -- Automated sliding vehicle gates -- Automated roll-up vehicle gates -- High-security barrier gates -- Sally ports -- Chapter Summary -- 6 Life Safety and Exit Devices -- Chapter Overview -- Life Safety First -- Security Versus Life Safety -- Understanding National and Local Access Control Codes and Standards -- NFPA 101 -- International building code -- NFPA 72 -- More on these codes -- UL 294 -- Life Safety and Locks -- Life Safety and Exit Devices -- Life Safety and Fire Alarm System Interfaces -- Chapter Summary.

7 Door Types and Door Frames -- Chapter Overview -- Basics About Doors and Security -- Standard Single-Leaf and Double-Leaf Swinging Doors -- Hollow metal doors -- Solid core wood doors -- Framed glass doors -- Unframed glass doors -- Total doors -- Pivoting doors -- Balanced doors -- Door Frames and Mountings -- Hollow metal-high-use and high-impact -- Aluminum-medium-use and medium-impact -- Wood-light-use and light-impact -- Door mounting methods -- Overhead Doors -- Roll-up doors -- Paneled overhead doors -- Revolving Doors -- Sliding Panel Doors -- Bifold and Fourfold Doors -- Chapter Summary -- 8 Doors and Fire Ratings -- Chapter Overview -- What Are Fire Ratings? -- Basic fire egress concept -- How should this be done? -- Exceptions -- Fire Penetration Ratings -- Hose stream test -- Door Assembly Ratings -- The three-fourths rule -- Doors with glass -- Temperature rise doors -- Louvers -- Fire Door Frames and Hardware -- Latching devices -- Fire exit hardware -- Pairs of Doors -- Latching hardware -- Inactive leaf on pair of doors -- Double egress pairs -- Astragals -- Smoke and draft control -- "Path of Egress" Doors -- Electrified Locks and Fire Ratings -- Additional References -- Chapter Summary -- 9 Electrified Locks-Overview -- Chapter Overview -- Why Electric Locks? -- Types of Electrified Locks -- How Electrified Locks Work -- Electric strikes -- Electrified mortise locks -- Electrified panic hardware -- Electrified cylinder locks -- Magnetic locks --

Electrified dead-bolts -- Paddle-operated electromechanical dead-bolts -- Lock Power Supplies -- Electrified Lock Wiring Considerations -- Voltage drop example -- Electrified Lock Controls -- Types of Locks Not Recommended -- Chapter Summary -- 10 Free Egress Electrified Locks -- Chapter Overview -- Types of Free Egress Locks -- Electrified Mortise Locks -- Mortise latch only-no lock.

Mortise locks with no dead-bolt -- Mortise locks with dead-bolts -- Door frame considerations -- Additional lock switch fittings -- Door handing -- Electrified "Panic" Hardware -- Rim exit devices -- Mortise lock exit devices -- Surface-mounted vertical rod exit devices -- Concealed vertical rod exit devices -- Three-point latching exit device -- Exit device functions -- Electrical options -- Popular double door applications -- Electric Strikes -- Switches available for electric strikes -- Electrified Cylinder Locks -- Self-Contained Access Control Locks -- Chapter Summary -- 11 Magnetic Locks -- Chapter Overview -- Standard Magnetic Locks -- Standard magnetic lock applications -- Magnetic Shear Locks -- Magnetic shear lock applications -- Magnetic Gate Locks -- Cautions About Magnetic Locks -- Egress assurance -- Operational and maintenance warnings -- Chapter Summary -- 12 Electrified Dead-Bolt Locks -- Chapter Overview -- Surface-Mounted Electrified Dead-Bolt Locks -- Concealed Direct-Throw Mortise Dead-Bolt Lock -- Dead-Bolt Equipped Electrified Mortise Lock -- Top-Latch Release Bolt -- Electrified Dead-Bolt Gate Locks -- Electrified dead-bolt lock safety provisions -- Chapter Summary -- 13 Specialty Electrified Locks -- Chapter Overview -- Electrified Dead-Bolt-Equipped Panic Hardware -- Securitech Locks -- Delayed Egress Locks -- Specialize school locks to protect against active shooters -- Hi-Tower Locks -- CRL-Blumcraft Panic Hardware -- Chapter Summary -- 14 Selecting the Right Lockset for a Door -- Chapter Overview -- Standard Application Rules -- How to Select the Right Lock for Any Door -- Description of door -- Framed glass door -- Herculite lobby doors -- High-rise building stair-tower door -- Rear-exit door on warehouse with hi-value equipment -- Office suite door -- Double-egress doors-hospital corridor -- Inswing office door.

Revolving door-emergency egress side door -- Chapter Summary -- 15 Specialized Portal Control Devices and Applications -- Chapter Overview -- Specialized Portals for Pedestrians -- Automatic doors -- Man-traps -- Full-verification portals -- Electronic turnstiles -- Antitailgate alarm -- Specialized Portals for Vehicles -- High-security barrier gates -- Sally ports -- Chapter Summary -- 16 Industry History That can Predict the Future -- Chapter Overview -- A Little Background -- First Generation -- Second Generation -- Third Generation -- Fourth Generation -- Stalled progress -- Fifth Generation -- Avoiding Obsolescence -- Planned obsolescence -- Unplanned obsolescence -- What the future holds -- Chapter Summary -- 17 Access Control Panels and Networks -- Chapter Overview -- Access Control Panel Attributes and Components -- Communications Board -- Power supply and battery -- Central processing unit -- Erasable programmable read-only memory -- Random access memory -- Input/output interfaces -- Access Control Panel Form Factors -- Access Control Panel Functions -- Access Control Panel Locations -- Local and Network Cabling -- Networking Options -- Redundancy and Reliability Factors -- Good wiring and installation -- Good design -- Good power -- Good data infrastructure -- Redundancy -- Chapter Summary -- 18 Access Control System Servers and Workstations -- Chapter Overview -- Server/Workstation Functions -- Store system configurations -- Store the system's historical event data -- Manage communications throughout the entire system -- Serve workstations with real-time data

and reports -- Decision Processes -- System Scalability -- Unscalable Systems -- Basic scalability -- Multisite systems -- System-wide card compatibility -- Enterprise-wide system -- Master host -- Super-host/subhost -- Access Control System Networking -- The core network.

The server network.
