

1. Record Nr.	UNINA9910829833003321
Autore	Tan Teik-Kheong <1964->
Titolo	The world wide Wi-Fi [[electronic resource]] : technological trends and business strategies / / Teik-Kheong (TK) Tan, Benny Bing
Pubbl/distr/stampa	Hoboken, N.J., : Wiley-Interscience, c2003
ISBN	1-280-54190-3 9786610541904 0-470-31835-X 0-471-47824-5 0-471-47823-7
Descrizione fisica	1 online resource (219 p.)
Altri autori (Persone)	BingBenny
Disciplina	004.6 004.6/8 004.68
Soggetti	Wireless LANs IEEE 802.11 (Standard) Local area networks industry
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Description based upon print version of record.
Nota di bibliografia	Includes bibliographical references and index.
Nota di contenuto	Contents; Foreword; Preface; Acknowledgments; Chapter 1 Introduction; 1.1 Past Wireless Lessons; 1.2 What Are Wireless LANs?; 1.3 The 802.11 Standards; 1.4 The Wi-Fi Alliance; 1.5 Wireless Home and Community Networks; 1.6 Public Wi-Fi Services; 1.7 Accessing the Internet Without Wires; 1.8 Mobile Internet for Always-on Communication; 1.9 Your Wi-Fi Network Has No Clothes; 1.10 Simplicity Breeds Usability; 1.11 Technologies On the Horizon; 1.12 Summary; References; Chapter 2 IEEE 802.11 Standards; 2.1 The IEEE 802.11a Task Group; 2.2 The IEEE 802.11b Task Group; 2.3 The IEEE 802.11d Task Group; 2.4 The IEEE 802.11e Task Group; 2.5 The IEEE 802.11f Task Group; 2.6 The IEEE 802.11g Task Group; 2.7 The IEEE 802.11h Task Group; 2.8 The IEEE 802.11i Task Group; 2.9 Physical Transmission; 2.10 Sharing Network Capacity; 2.11 Multipath Fading and Delay Spread; 2.12 Next Generation Wireless LANs; 2.13 Throughput versus Data Rate; 2.14

Cable Replacement versus Mobility; 2.15 Wireless LAN Components; 2.15.1 Wireless Network Interface Cards; 2.15.2 Wireless Access Points; 2.15.3 Wireless LAN Switches; 2.15.4 Remote Wireless Bridges; 2.16 Wireless LAN Deployment Considerations 2.17 Roaming and Handoff 2.18 Health Concerns; 2.19 Site Survey; 2.20 Wireless Analyzers; 2.21 Network Management; 2.22 Applications; 2.23 Wi-Fi Deployment; 2.23.1 Hotels; 2.23.2 Airports; 2.23.3 Restaurants and Coffee Shops; 2.23.4 Corporations; 2.23.5 Shopping Malls; 2.24 Summary; References; Chapter 3 Wi-Fi Network Security; 3.1 Introduction; 3.2 Wi-Fi Protected Access (WPA); 3.3 The Maginot Line of Wireless LAN Security; 3.3.1 The Problem; 3.3.2 Security Issues Affecting Wireless LANs; 3.4 Initial 802.11 Security Approaches; 3.4.1 Authentication; 3.4.2 Wired Equivalent Privacy (WEP) 3.4.3 WEP's Fatal Flaws 3.4.4 802.1x; 3.5 Is the Problem Intractable?; 3.5.1 Wireless Networks; 3.5.2 The Need for a Unified Approach; 3.5.3 The Need for Key Management; 3.6 A Comprehensive Security Architecture for Wireless LANs; 3.6.1 Providing Improved Access Control; 3.6.2 Ensuring Link Privacy and Integrity; 3.7 Summary; References; Chapter 4 QoS Provisioning for 802.11 Wireless Home Networks; 4.1 Basics of Quality of Service (QoS) Provisioning; 4.2 QoS Provisioning in Home Wireless Networks; 4.2.1 Reserved Bandwidth; 4.2.2 Error Control; 4.2.3 Resource Allocation; 4.2.4 Traffic Shaping 4.2.5 Adaptive Applications 4.2.6 Media Compression; 4.2.7 Impact of Higher Layers; 4.2.8 Voice Traffic Support; 4.3 QoS Support at the Higher Network Layers; 4.4 QoS Support in IEEE 802.11 Wireless LANs; 4.4.1 IEEE 802.11e; 4.4.2 IEEE 802.11h; 4.4.3 IEEE 802.11i; 4.5 Case Study: Integrating 802.11 and Hybrid Fiber-Coax (HFC) Cable Networks; 4.5.1 Ongoing Initiatives; 4.5.2 An Integrated 802.11 /DOCSIS Architecture; 4.5.3 Integrated Scheduling and Fragmentation at the MAC Layer; 4.5.4 Throughput Matching; 4.5.5 Network Security and Privacy; 4.6 Summary; References; Chapter 5 Wi-Fi Hotspots 5.1 Enabling Technologies

Sommario/riassunto

Your success guide to the next wireless revolution
The next watershed innovation in wireless technology is here: IEEE 802.11 wireless local area networks (LANs). Recent studies from IDC indicate that the Wi-Fi wireless LAN market will likely account for ninety percent of projected LAN equipment revenues by 2005—a trend that promises to spill over into home wireless networks. Yet this amazing growth has also created confusion: Which version of 802.11 is best for vendors and end-users? What about solutions such as the a/g and a/b combinations of the 802.11 standards? In World Wide Wi-Fi
