

1. Record Nr.	UNINA9910971110303321
Titolo	Internet policies and issues . Volume 8 // B.G. Kutais, editor
Pubbl/distr/stampa	New York, : Nova Science Publishers, 2011
ISBN	1-62100-151-2
Edizione	[1st ed.]
Descrizione fisica	1 online resource (339 p.)
Collana	Internet policies and issues, , 2158-1517 ; ; v. 8
Altri autori (Persone)	KutaisB. G
Disciplina	343.7309/944
Soggetti	Internet - Law and legislation - United States Internet - Government policy - United States Internet
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	Intro -- Contents -- Preface -- Traffic Conditioners for QoS assurance -- Abstract -- 1. Introduction -- 2. Differentiated Services -- 3. Design of Traffic Conditioners -- 3.1 Equal fairness -- 3.1.1. Based on rate estimators -- 3.1.2. Based on tokens -- 3.1.3. Based on network conditions -- 3.2 Proportional Fairness -- 3.3 Comparative Performance Evaluation -- 4. Wireless Technologies and Traffic Conditioning -- 4.1 QoS in 3G/4G -- 4.2 WLAN QoS -- 5. Optical Packet Switching Networks and Traffic Conditioning -- 5.1 Classical Shaping -- 5.2 Based on maximum optical size and maximum aggregation delay -- 5.3 Traffic Shaping with Variable Output Rates -- Conclusion -- Acknowledgment -- References -- Support for Design Knowledge Management and Sharing Using XML -- Abstract -- 1. Introduction -- 1.1 Markup method -- 1.2 Markup Languages -- 1.2 The Application of XML -- 2. Applications -- 2.1 Support of Design -- 2.1.1 Markup for CAD Models - Key Techniques -- 2.1.2 Case Study -- 2.1.2.1. Constraint modeller -- 2.1.2.2. What extra information needs for the constraint modeller? -- 2.1.2.3. Generation of the markup files -- 2.1.2.4. Implementation -- 2.2 Capture of Knowledge during the Design Process -- 2.2.1 Constraint Knowledge during The Design Process -- 2.2.2 Recording of the Design Process -- 2.2.3 Case Study -- 2.3 Knowledge Management Throughout a Product Lifecycle -- 2.3.1 Framework -- 2.3.2 Key Technique - Geometrical Matching of a

CAD Model with its Lightweight Derivations -- 2.3.3 Implementation -- 3. Summary and Future Directions -- 4. Conclusion -- Acknowledgments -- Author bibliographies -- References -- FPGA Based Video Streaming System for Bi-Network Multicasting Protocols -- Abstract -- Introduction -- 1.1 Existing Video Streaming on Homogenous Networks -- 1.2 Embedded Network Processors -- 1.3 Scope of the Chapter.

2. Overview of Firewire and Ethernet Protocols -- 2. Overview of FPGA Technology -- 3.1 Relevant Technologies -- 3.1.1. ASIC: MPGA -- 3.1.2. Standard cells -- 3.1.3. IP cores -- 3.2 FPGA Architecture -- 3.2.1 FPGA Routing -- 3.2.2 User Programmable Switches -- 3.3 FPGA Advantages -- 3.4 FPGA Limitations -- 3.5 FPGA CAD Tools/ Placement and Routing Tools -- 3.6 Commercially Available FPGA Devices -- 4. Enabling Technology: Ethernet Multicast Streaming -- 5. FPGA Based Video Streaming System Architecture -- 5.1 FPGA Design Specification -- 5.2 FPGA System Design -- 6. FPGA System Simulation and Output Waveforms -- 7. FPGA System Design Synthesis -- 8. FPGA System Timing and Power Analysis -- 8.1 Timing Analysis -- 8.2 Cable Power Provisioning -- 9. FPGA System Experimental Setup -- 10. Conclusion and Future Work -- References -- Evidence of a Two-Parameter Correlation of Internet Traffic -- Abstract -- 1. Introduction -- 2. Research Background -- 2.1. Traffic Series on a Packet-by-Packet Basis -- 2.2. Long-Range Dependence of Traffic -- 2.2. Long-Range Dependence of Traffic -- 2.3. Fractional Gaussian Noise -- 2.4. Problems Statements -- 2.5. Research Thoughts -- 2.6. Test Data -- 3. Set-Valued Analysis of ACFs of Traffic -- 4. Verifications -- 4.1. Timestamp Increment Series of Dec-pkt2.TCP -- 4.2. Rate Series of Dec-pkt-2.TCP -- 4.2. Rate Series of Dec-pkt-2.TCP -- 4.3. Dec-pkt-2.TCP in Packet Size -- 4.4. Timestamp Increment Series of Dec-pkt-2.UDP -- 4.5. Timestamp Increment Series of Dec-pkt-2.IP -- 4.6. Timestamp Increment Series of Dec-pkt-2.OTHER -- 4.7. BC-pAug89 -- 4.8. Summary of Verification Results -- 5. Discussions -- 5.1. Observations of Model Fitting -- 5.2. Observations of Model Fitting in G or Ga -- 5.3. Little History of Discussed 2-Parameter Correlation Model -- 6. Conclusion -- Acknowledgments -- References.

Medical Image Streaming: DICOM & JPEG2000 Story -- Abstract -- Introduction -- Medical Image Streaming -- Medical Image Everywhere -- DICOM2000 - JPEG2000 Streaming Over DICOM Network -- Conclusion -- References -- Ontology for Geographic Information Metadata using OWL -- Abstract -- 1. Introduction -- 2. Ontology Concept -- 3. Mapping of UML Model and OWL Ontology -- 3.1 Similarities and Differences of UML and OWL Concepts -- a. Incompatibility of properties -- b. Monotonic worlds -- c. Modularization -- d. Generalization -- e. Abstract class -- 4. General Rules for Transforming the ISO 19115:2003 UML Model to OWL Ontology -- 4.1 Name / Role Name -- 4.2 Short Name and Domain Code -- 4.3 Definition -- 4.4 Obligation/Condition -- 4.4.1 Mandatory (M) -- 4.4.2 Conditional (C) -- 4.4.3. Optional (O) -- 4.5 Maximum Occurrence -- 4.6 Data Type -- 4.7 Constrained Type -- 4.8 Domain and Range -- 4.9 UML Model Stereotypes -- 4.10 Abstract class -- 4.11 Generalization -- 4.12 Enumeration -- 4.13 CodeList -- 4.14 DataType class -- 4.15 Union -- 5. Summary -- Acknowledgments -- References -- Fuzzy-Controlled Power-Awareness for Mobile Ad Hoc Networks -- Abstract -- 1. Introduction -- 1. Popluar Routing Protocols for Ad Hoc Networks -- 2. Adopted Energy Efficiency Techniques -- 2. Simulation Results -- Definition 1: Percentage of packet delivery ratio (PPDR) -- Definition 2: Routing Overhead (RO) -- Definition 3: Per Node Delay in Seconds (PNDS) -- Definition 1:

Percentage of energy consumption (PEC) -- 4. Conclusion -- About the Authors -- References -- An XML Based Framework Supporting Data Sharing in the Manufacturing Process -- Abstract -- 1. Introduction -- 2. Incompatibility of Data Between Different CAD/CAM Systems and the Machining Process Marketplace Language (MP-ML) -- 3. The Structure of MP-ML. 4. A Web Based Framework for Communication Between Designers and Manufacturers -- 5. Software Modules -- 6. Simple Object Access Protocol (SOAP) -- 7. Developed Soap Messages -- 7.1 Designer to Manufacturer Registry Messages -- 7.1.1 SOAP messages including parts data and system response -- 7.1.2 SOAP messages quotation results request/response -- 7.2 Manufacturer to Manufacturer Registry Messages -- 7.2.1 SOAP messages including parts data and manufacturer response -- 7.2.2 SOAP manufacturer registration messages -- 7.3 Designer to Manufacturer Messages -- 8. Conclusion -- References -- Appendix A -- The MP-ML Document Type Definition (DTD) of a specific part -- XML Retrieval: A Survey -- Internet Traffic Shaping in WLANS -- by Packet Size Control -- Performance Analysis of XOR-Based -- Routing Protocols in Vehicular ad hoc -- Networks -- Analysis of TCP and UDP Performance -- With Anonymous Routing in MANETS -- Index.

---

### Sommario/riassunto

This book is part of a series exploring the dynamic universe of the Internet in the 21st century. Collected here are papers discussing a wide range of topics and issues impacting and relating to the Internet such as: internet traffic conditioning methods applied to wireless networks; design knowledge management and sharing using XML; FGPA-Based video streaming; internet traffic modelling; and, an analysis of XOR-based flat routing protocols.

---