

1. Record Nr.	UNINA9910143584903321
Autore	Davies J (N. John)
Titolo	Semantic Web technologies [[electronic resource]] : trends and research in ontology-based systems // John Davies, Rudi Studer, Paul Warren
Pubbl/distr/stampa	Chichester, England ; ; Hoboken, NJ, : John Wiley & Sons, c2006
ISBN	1-280-44888-1 9786610448883 0-470-03033-X 0-470-03034-8
Descrizione fisica	1 online resource (328 p.)
Altri autori (Persone)	StuderRudi WarrenPaul (Paul W.)
Disciplina	004.678 025.04
Soggetti	Semantic Web Electronic books.
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	Semantic Web Technologies; Contents; Foreword; 1. Introduction; 1.1. Semantic Web Technologies; 1.2. The Goal of the Semantic Web; 1.3. Ontologies and Ontology Languages; 1.4. Creating and Managing Ontologies; 1.5. Using Ontologies; 1.6. Applications; 1.7. Developing the Semantic Web; References; 2. Knowledge Discovery for Ontology Construction; 2.1. Introduction; 2.2. Knowledge Discovery; 2.3. Ontology Definition; 2.4. Methodology for Semi-automatic Ontology Construction; 2.5. Ontology Learning Scenarios; 2.6. Using Knowledge Discovery for Ontology Learning; 2.6.1. Unsupervised Learning 2.6.2. Semi-Supervised, Supervised, and Active Learning2.6.3. Stream Mining and Web Mining; 2.6.4. Focused Crawling; 2.6.5. Data Visualization; 2.7. Related Work on Ontology Construction; 2.8. Discussion and Conclusion; Acknowledgments; References; 3. Semantic Annotation and Human Language Technology; 3.1. Introduction; 3.2. Information Extraction: A Brief Introduction; 3.2.1. Five Types of IE; 3.2.2. Entities; 3.2.3. Mentions; 3.2.4. Descriptions; 3.2.5. Relations; 3.2.6. Events; 3.3. Semantic Annotation; 3.3.1. What is Ontology-Based

Information Extraction

3.4. Applying 'Traditional' IE in Semantic Web Applications 3.4.1. AeroDAML; 3.4.2. Amilcare; 3.4.3. MnM; 3.4.4. S-Cream; 3.4.5. Discussion; 3.5. Ontology-based IE; 3.5.1. Magpie; 3.5.2. Pankow; 3.5.3. SemTag; 3.5.4. Kim; 3.5.5. KIM Front-ends; 3.6. Deterministic Ontology Authoring using Controlled Language IE; 3.7. Conclusion; References; 4. Ontology Evolution; 4.1. Introduction; 4.2. Ontology Evolution: State-of-the-art; 4.2.1. Change Capturing; 4.2.2. Change Representation; 4.2.3. Semantics of Change; 4.2.4. Change Propagation; 4.2.5. Change Implementation; 4.2.6. Change Validation 4.3. Logical Architecture 4.4. Data-driven Ontology Changes; 4.4.1. Incremental Ontology Learning; 4.5. Usage-driven Ontology Changes; 4.5.1. Usage-driven Hierarchy Pruning; 4.6. Conclusion; References; 5. Reasoning With Inconsistent Ontologies: Framework, Prototype, and Experiment; 5.1. Introduction; 5.2. Brief Survey of Approaches to Reasoning with Inconsistency; 5.2.1. Paraconsistent Logics; 5.2.2. Ontology Diagnosis; 5.2.3. Belief Revision; 5.2.4. Synthesis; 5.3. Brief Survey of Causes for Inconsistency in the Semantic Web; 5.3.1. Inconsistency by Mis-representation of Default 5.3.2. Inconsistency Caused by Polysemy 5.3.3. Inconsistency through Migration from Another Formalism; 5.3.4. Inconsistency Caused by Multiple Sources; 5.4. Reasoning with Inconsistent Ontologies; 5.4.1. Inconsistency Detection; 5.4.2. Formal Definitions; 5.5. Selection Functions; 5.6. Strategies for Selection Functions; 5.7. Syntactic Relevance-Based Selection Functions; 5.8. Prototype of Pion; 5.8.1. Implementation; 5.8.2. Experiments and Evaluation; 5.8.3. Future Experiments; 5.9. Discussion and Conclusions; Acknowledgment; References; 6. Ontology Mediation, Merging, and Aligning 6.1. Introduction

Sommario/riassunto

The Semantic Web combines the descriptive languages RDF (Resource Description Framework) and OWL (Web Ontology Language), with the data-centric, customizable XML (eXtensible Mark-up Language) to provide descriptions of the content of Web documents. These machine-interpretable descriptions allow more intelligent software systems to be written, automating the analysis and exploitation of web-based information. Software agents will be able to create automatically new services from already published services, with potentially huge implications for models of e-Business. Semantic Web T
