1. Record Nr. UNINA9910483362803321

Titolo	Inconsistency tolerance / / Leopoldo Bertossi, Anthony Hunter, Torsten Schaub (eds.)
Pubbl/distr/stampa	Berlin, : Springer, 2004
ISBN	3-540-30597-1
Edizione	[1st ed. 2005.]
Descrizione fisica	1 online resource (VIII, 300 p.)
Collana	Lecture notes in computer science, , 0302-9743 ; ; 3300
Altri autori (Persone)	BertossiLeopoldo HunterAnthony <1962-> SchaubTorsten
Disciplina	620/.0045
Soggetti	Tolerance (Engineering) - Data processing Data integration (Computer science)
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Bibliographic Level Mode of Issuance: Monograph
Nota di bibliografia	Includes bibliographical references and index.
Nota di contenuto	Introduction to inconsistency tolerance / Leopoldo Bertossi, Anthony Hunter, Torsten Schaub -- Consistency of XML specifications / Marcelo Arenas, Wenfei Fan, Leonid Libkin -- Consistent query answers in virtual data integration systems / Leopoldo Bertossi, Loreto Bravo -- Representing paraconsistent reasoning via quantified propositional logic / Philippe Besnard ... [et al.] -- On the computational complexity of minimal-change integrity maintenance in relational databases / Jan Chomicki, Jerzy Marcinkowski -- On the computational complexity of paraconsistent inference relations / Sylvie Coste-Marquis, Pierre Marquis -- Approaches to measuring inconsistent information / Anthony Hunter, Sebastien Konieczny -- Inconsistency issues in spatial databases / Andrea Rodriguez -- Relevant logic and paraconsistency / John Slaney.
Sommario/riassunto	Inconsistency arises in many areas in advanced computing. Often inconsistency is unwanted, for example in the specification for a plan or in sensor fusion in robotics; however, sometimes inconsistency is useful. Whether inconsistency is unwanted or useful, there is a need to develop tolerance to inconsistency in application technologies such as databases, knowledge bases, and software systems. To address this situation, inconsistency tolerance is being built on foundational

technologies for identifying and analyzing inconsistency in information, for representing and reasoning with inconsistent information, for resolving inconsistent information, and for merging inconsistent information. The idea for this book arose out of a Dagstuhl Seminar on the topic held in summer 2003. The nine chapters in this first book devoted to the subject of inconsistency tolerance were carefully invited and anonymously reviewed. The book provides an exciting introduction to this new field.