

1. Record Nr.	UNINA9910483507403321
Titolo	Formal theories of information : from Shannon to semantic information theory and general concepts of information / / Giovanni Sommaruga (ed.)
Pubbl/distr/stampa	Berlin, : Springer-Verlag, c2009
ISBN	3-642-00659-0
Edizione	[1st ed. 2009.]
Descrizione fisica	1 online resource (VII, 269 p.)
Collana	Lecture notes in computer science ; ; 5363
Classificazione	DAT 570f QH 710 SK 830 SS 4800 004
Altri autori (Persone)	SommarugaGiovanni
Disciplina	003.54
Soggetti	Information measurement Information storage and retrieval systems Self-organizing systems
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	Philosophical Reflections -- Philosophical Conceptions of Information -- The Syntactical Approach -- Information Theory, Relative Entropy and Statistics -- Information: The Algorithmic Paradigm -- The Semantical Approach -- Information Algebra -- Uncertain Information -- Comparing Questions and Answers: A Bit of Logic, a Bit of Language, and Some Bits of Information -- Channels: From Logic to Probability -- Beyond the Semantical Approach -- Modeling Real Reasoning -- Philosophical Conclusions -- One or Many Concepts of Information?.
Sommario/riassunto	This book presents the scientific outcome of a joint effort of the computer science departments of the universities of Berne, Fribourg and Neuchâtel. Within an initiative devoted to "Information and Knowledge", these research groups collaborated over several years on issues of logic, probability, inference, and deduction. The goal of this volume is to examine whether there is any common ground between the different approaches to the concept of information. The structure of this book could be represented by a circular model, with an innermost

syntactical circle, comprising statistical and algorithmic approaches; a second, larger circle, the semantical one, in which "meaning" enters the stage; and finally an outermost circle, the pragmatic one, casting light on real-life logical reasoning. These articles are complemented by two philosophical contributions exploring the wide conceptual field as well as taking stock of the articles on the various formal theories of information.

---