

1. Record Nr.	UNINA9910704018603321
Autore	Torres-Gonzalez Sigfredo
Titolo	Hydrogeology and simulation of ground-water flow in the upper aquifer of the Rio Camuy to Rio Grande de Manati area, Puerto Rico / by Sigfredo Torres-Gonzalez, Michael Planert, and Jose M. Rodriguez ; prepared in cooperation with the Puerto Rico Aqueduct and Sewer Authority, Puerto Rico Industrial Development Corporation, Puerto Rico Department of Natural and Environmental Resources
Pubbl/distr/stampa	San Juan, Puerto Rico : , : U.S. Geological Survey Denver, CO : , : Earth Science Information Center, Open-File Reports Section [distributor], , 1996
Descrizione fisica	1 online resource (vi, 102 pages) : illustrations, maps
Collana	Water-resources investigations report ; ; 95-4286
Soggetti	Hydrogeology - Puerto Rico - Arecibo Region Groundwater flow - Puerto Rico - Arecibo Region Groundwater flow - Puerto Rico - Simulation methods Hydrogeology - Puerto Rico - Simulation methods
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Title from title screen (viewed Nov. 4, 2015).
Nota di bibliografia	Includes bibliographical references (pages 41-42).

2. Record Nr.	UNINA9910953793103321
Autore	Alsina Claudi
Titolo	Associative functions : triangular norms and copulas / / Claudi Alsina, Maurice J. Frank, Berthold Schweizer
Pubbl/distr/stampa	Singapore ; ; Hackensack, NJ, : World Scientific, c2006
ISBN	9786611919344 9781281919342 1281919349 9789812774200 9812774203
Edizione	[1st ed.]
Descrizione fisica	1 online resource (253 p.)
Altri autori (Persone)	SchweizerB (Berthold) FrankMaurice J
Disciplina	515/.7
Soggetti	Functional equations Associative law (Mathematics) Mathematical analysis Functional equations - Study and teaching Associative law (Mathematics) - Study and teaching Mathematical analysis - Study and teaching
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 (p. 223-234) and index.
Nota di contenuto	Preface -- Special symbols -- 1. Introduction. 1.1. Historical notes. 1.2. Preliminaries. 1.3. t-norms and s-norms. 1.4. Copulas -- 2. Representation theorems for associative functions. 2.1. Continuous, Archimedean t-norms. 2.2. Additive and multiplicative generators. 2.3. Extension to arbitrary closed intervals. 2.4. Continuous, non-Archimedean t-norms. 2.5. Non-continuous t-norms. 2.6. Families of t-norms. 2.7. Other representation theorems. 2.8. Related functional equations -- 3. Functional equations involving t-norms. 3.1. Simultaneous associativity. 3.2. n-duality. 3.3. Simple characterizations of Min. 3.4. Homogeneity. 3.5. Distributivity. 3.6. Conical t-norms. 3.7. Rational Archimedean t-norms. 3.8. Extension and sets of uniqueness -- 4. Inequalities involving t-norms. 4.1. Notions of concavity and

convexity. 4.2. The dominance relation. 4.3. Uniformly close associative functions. 4.4. Serial iterates and n -copulas. 4.5. Positivity.

Sommario/riassunto

The functional equation of associativity is the topic of Abel's first contribution to Crelle's Journal. Seventy years later, it was featured as the second part of Hilbert's Fifth Problem, and it was solved under successively weaker hypotheses by Brouwer (1909), Cartan (1930) and Aczel (1949). In 1958, B Schweizer and A Sklar showed that the "triangular norms" introduced by Menger in his definition of a probabilistic metric space should be associative; and in their book Probabilistic Metric Spaces, they presented the basic properties of such triangular norms and the closely related copulas. Since then, the study of these two classes of functions has been evolving at an ever-increasing pace and the results have been applied in fields such as statistics, information theory, fuzzy set theory, multi-valued and quantum logic, hydrology, and economics, in particular, risk analysis. This book presents the foundations of the subject of associative functions on real intervals. It brings together results that have been widely scattered in the literature and adds much new material. In the process, virtually all the standard techniques for solving functional equations in one and several variables come into play. Thus, the book can serve as an advanced undergraduate or graduate text on functional equations.