1. Record Nr. UNINA9910438136503321

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Titolo	Encyclopedia of distances / / Michel Marie Deza, Elena Deza
Pubbl/distr/stampa	Heidelberg ; ; New York, : Springer, c2013
ISBN	1-283-91095-0 3-642-30958-5
Edizione	[2nd ed.]
Descrizione fisica	1 online resource (643 p.)
Altri autori (Persone)	DezaElena
Disciplina	514 514.32503 514/.32503
Soggetti	Metric spaces Distances - Measurement
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	Part I. Mathematics of Distances -- 1 General Definitions -- 2 Topological Spaces -- 3 Generalization of Metric Spaces -- 4 Metric Transforms -- 5 Metrics on Normed Structures -- Part II. Geometry and Distances -- 6 Distances in Geometry -- 7 Riemannian and Hermitian Metrics -- 8 Distances on Surfaces and Knots -- 9 Distances on Convex Bodies, Cones and Simplicial Complexes -- Part III. Distances in Classical Mathematics -- 10 Distances in Algebra -- 11 Distances on Strings and Permutations -- 12 Distances on Numbers, Polynominals and Matrices -- 13 Distances in Functional Analysis -- 14 Distances in Probability Theory -- Part IV. Distances in Applied Mathematics -- 15 Distances in Graph theory -- 16 Distances in Coding Theory -- 17 Distances and Similarities in Data Analysis -- 18 Distances in Systems and Mathematical Engineering -- Part V. Computer-Related Distances -- 19 Distances on Real and Digital Planes -- 20 Voronoi Diagram Distances -- 21 Image and Audio Distances -- 22 Distances in Networks -- Part VI. Distances in Natural Sciences -- 23 Distances in Biology -- 24 Distances in Physics and Chemistry -- 25 Distances in Earth Science and Astronomy -- 26 Distances in Cosmology and Theory of Relativity -- Part VII. Real-World Distances -- 27 Length Measures and Scales -- 28 Distances in Applied Social Sciences -- 29 Other

Distances.

Sommario/riassunto

This updated and revised second edition of the leading reference volume on distance metrics includes a wealth of new material that reflects advances in a field now regarded as an essential tool in many areas of pure and applied mathematics. The publication of this volume coincides with intensifying research efforts into metric spaces and especially distance design for applications. Accurate metrics have become a crucial goal in computational biology, image analysis, speech recognition and information retrieval. Leaving aside the practical questions that arise during the selection of a ‘good’ distance function, this work focuses on providing the research community with an invaluable comprehensive listing of the main available distances. As well as providing standalone introductions and definitions, the encyclopedia facilitates swift cross-referencing with easily navigable bold-faced textual links to core entries. In addition to distances themselves, the authors have collated numerous fascinating curiosities in their Who’s Who of metrics, including distance-related notions and paradigms that enable applied mathematicians in other sectors to deploy research tools that non-specialists justly view as arcane. In expanding access to these techniques, and in many cases enriching the context of distances themselves, this peerless volume is certain to stimulate fresh research.