Record Nr. UNISA996466120003316 General Theory of Information Transfer and Combinatorics [[electronic **Titolo** resource] /] / edited by Rudolf Ahlswede, Lars Bäumer, Ning Cai, Harout Aydinian, Vladimir Blinovsky, Christian Deppe, Haik Mashurian Berlin, Heidelberg:,: Springer Berlin Heidelberg:,: Imprint: Springer, Pubbl/distr/stampa 2006 **ISBN** 3-540-46245-7 Edizione [1st ed. 2006.] Descrizione fisica 1 online resource (XIII, 1128 p.) Theoretical Computer Science and General Issues, , 2512-2029;; 4123 Collana 511/.6 Disciplina Soggetti Computer networks Algorithms Computer science—Mathematics Discrete mathematics Numerical analysis Data structures (Computer science) Information theory Computer Communication Networks Discrete Mathematics in Computer Science **Numerical Analysis** Data Structures and Information Theory Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia "The Center for Interdisciplinary Research (ZiF) of the University of Note generali Bielefeld hosted a research group under the title 'General Theory of Information Transfer and Combinatorics,' abbreviated as GTIT-C, from October 1, 2001 to September 30, 2004. As head of the research group the editor shaped the group's scientific directions ..."--Pref., p. [v]. "Bibliography of publications by Rudolf Ahlswede": p. [1109]-1124. Nota di bibliografia Includes bibliographical references and index. Rudolf Ahlswede — From 60 to 66 -- Information Theory and Some Nota di contenuto Friendly Neighbors - Ein Wunschkonzert -- Probabilistic Models --Identification for Sources -- On Identification -- Identification and Prediction -- Watermarking Identification Codes with Related Topics on Common Randomness -- Notes on Conditions for Successive Refinement of Information -- Coding for the Multiple-Access Adder

Channel -- Bounds of E-Capacity for Multiple-Access Channel with Random Parameter -- Huge Size Codes for Identification Via a Multiple Access Channel Under a Word-Length Constraint -- Codes with the Identifiable Parent Property and the Multiple-Access Channel --Cryptology – Pseudo Random Sequences -- Transmission, Identification and Common Randomness Capacities for Wire-Tape Channels with Secure Feedback from the Decoder -- A Simplified Method for Computing the Key Equivocation for Additive-Like Instantaneous Block Encipherers -- Secrecy Systems for Identification Via Channels with Additive-Like Instantaneous Block Encipherer -- Large Families of Pseudorandom Sequences of k Symbols and Their Complexity – Part I -- Large Families of Pseudorandom Sequences of k Symbols and Their Complexity – Part II -- On a Fast Version of a Pseudorandom Generator -- On Pseudorandom Sequences and Their Application -- Authorship Attribution of Texts: A Review -- Quantum Models -- Raum-Zeit und Quantenphysik – Ein Geburtstagsständchen für Hans-Jürgen Treder --Quantum Information Transfer from One System to Another One -- On Rank Two Channels -- Universal Sets of Quantum Information Processing Primitives and Their Optimal Use -- An Upper Bound on the Rate of Information Transfer by Grover's Oracle -- A Strong Converse Theorem for Quantum Multiple Access Channels -- Identification Via Quantum Channels in the Presence of Prior Correlation and Feedback -- Additive Number Theory and the Ring of Quantum Integers -- The Proper Fiducial Argument -- On Sequential Discrimination Between Close Markov Chains -- Estimating with Randomized Encoding the Joint Empirical Distribution in a Correlated Source -- On Logarithmically Asymptotically Optimal Hypothesis Testing for Arbitrarily Varying Sources with Side Information -- On Logarithmically Asymptotically Optimal Testing of Hypotheses and Identification -- Correlation Inequalities in Function Spaces -- Lower Bounds for Divergence in the Central Limit Theorem -- Information Measures - Error Concepts -Performance Criteria -- Identification Entropy -- Optimal Information Measures for Weakly Chaotic Dynamical Systems -- Report on Models of Write-Efficient Memories with Localized Errors and Defects --Percolation on a k-Ary Tree -- On Concepts of Performance Parameters for Channels -- Appendix: On Common Information and Related Characteristics of Correlated Information Sources -- Search - Sorting -Ordering - Planning -- Q-Ary Ulam-Renyi Game with Constrained Lies -- Search with Noisy and Delayed Responses -- A Kraft-Type Inequality for d-Delay Binary Search Codes -- Threshold Group Testing -- A Fast Suffix-Sorting Algorithm -- Monotonicity Checking -- Algorithmic Motion Planning: The Randomized Approach -- Language Evolution --Pattern Discovery – Reconstructions -- Information Theoretic Models in Language Evolution -- Zipf's Law, Hyperbolic Distributions and Entropy Loss -- Bridging Lossy and Lossless Compression by Motif Pattern Discovery -- Reverse-Complement Similarity Codes -- On Some Applications of Information Indices in Chemical Graph Theory --Largest Graphs of Diameter 2 and Maximum Degree 6 -- Network Coding -- An Outside Opinion -- Problems in Network Coding and Error Correcting Codes Appended by a Draft Version of S. Riis "Utilising Public Information in Network Coding" -- Combinatorial Models -- On the Thinnest Coverings of Spheres and Ellipsoids with Balls in Hamming and Euclidean Spaces -- Appendix: On Set Coverings in Cartesian Product Spaces -- Testing Sets for 1-Perfect Code -- On Partitions of a Rectangle into Rectangles with Restricted Number of Cross Sections --On Attractive and Friendly Sets in Sequence Spaces -- Remarks on an Edge Isoperimetric Problem -- Appendix: On Edge-Isoperimetric Theorems for Uniform Hypergraphs -- Appendix: Solution of

Burnashev's Problem and a Sharpening of the Erd?s/Ko/Rado Theorem -- Realization of Intensity Modulated Radiation Fields Using Multileaf Collimators -- Sparse Asymmetric Connectors in Communication Networks -- Problem Section -- Finding , the Identification Capacity of the AVC , if Randomization in the Encoding Is Excluded -- Intersection Graphs of Rectangles and Segments -- Cutoff Rate Enhancement -- Some Problems in Organic Coding Theory -- Generalized Anticodes in Hamming Spaces -- Two Problems from Coding Theory -- Private Capacity of Broadcast Channels -- A Short Survey on Upper and Lower Bounds for Multidimensional Zero Sums -- Binary Linear Codes That Are Optimal for Error Correction -- Capacity Problem of Trapdoor Channel -- Hotlink Assignment on the Web -- The Rigidity of Hamming Spaces -- A Conjecture in Finite Fields -- Multiparty Computations in Non-private Environments -- Some Mathematical Problems Related to Quantum Hypothesis Testing -- Designs and Perfect Codes.