1. Record Nr. UNINA9910782886303321 Autore Dragotti Pier Luigi Titolo Distributed source coding: theory, algorithms, and applications / / Pier Luigi Dragotti, Michael Gastpar Pubbl/distr/stampa Amsterdam: Boston: Academic Press/Elsevier., [2009] ©2009 **ISBN** 1-282-28683-8 9786612286834 0-08-092274-0 Descrizione fisica 1 online resource (359 p.) Disciplina 621.382/16 22 621.38216 Soggetti Data compression (Telecommunication) Multisensor data fusion Coding theory Electronic data processing - Distributed processing 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 Front Cover; Distributed Source Coding; Copyright Page; Table of Contents; List of Contributors; Introduction; Part I: Theory; Chapter 1. Foundations of Distributed Source Coding; 1.1 Introduction; 1.2 Centralized Source Coding: 1.2.1 Lossless Source Coding: 1.2.2 Lossy Source Coding; 1.2.3 Lossy Source Coding for Sources with Memory; 1.2.4 Some Notes on Practical Considerations: 1.3 Distributed Source Coding; 1.3.1 Lossless Source Coding; 1.3.2 Lossy Source Coding; 1.3.3 Interaction; 1.4 Remote Source Coding; 1.4.1 Centralized; 1.4.2 Distributed: The CEO Problem 1.5 Joint Source-channel CodingAcknowledgments; Appendix A: Formal Definitions and Notations; A.1 Notation; A.1.1 Centralized Source Coding: A.1.2 Distributed Source Coding: A.1.3 Remote Source Coding: References; Chapter 2. Distributed Transform Coding; 2.1 Introduction; 2.2 Foundations of Centralized Transform Coding; 2.2.1 Transform

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4.6 Conclusions

The advent of wireless sensor technology and ad-hoc networks has made DSC a major field of interest. Edited and written by the leading players in the field, this book presents the latest theory, algorithms and applications, making it the definitive reference on DSC for systems designers and implementers, researchers, and graduate students. This book gives a clear understanding of the performance limits of distributed source coders for specific classes of sources and presents the design and application of practical algorithms for realistic scenarios. Material covered includes the use of

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