1.	Record Nr.	UNINA9910829976503321
	Autore	Sellathurai Mathini <1968->
	Titolo	Space-time layered information processing for wireless communications / / Mathini Sellathurai, Simon Haykin
	Pubbl/distr/stampa	Hoboken, New Jersey : , : Wiley : , c2009
	ISBN	1-282-25935-0
		9786612259357
		0-470-44363-4
		0-470-44362-6
	Descrizione fisica	1 online resource (220 p.)
	Collana	Adaptive and Learning Systems for Signal Processing, Communications and Control Series ; ; 30
	Altri autori (Persone)	HaykinSimon S. <1931->
	Disciplina	621.3840285/572
		621.3840285572
	Soggetti	Space time codes
		MIMO systems
	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	List of Tables. -- List of Figures. -- 1 Introduction. -- 1.1 Brief Historical Notes. -- 1.2 Turbo-Information Processing. -- 1.3 MIMO Wireless Communications. -- 1.4 Organization of the Book. -- 2 MIMO Channel Capacity. -- 2.1 Introduction. -- 2.2 Multiple-Input, Multiple-Output Antenna Systems. -- 2.3 Channel Capacity. -- -- 2.4 MIMO Capacity for a Channel Known at the Receiver. -- -- 2.5 Channel Known at the Transmitter. -- -- 2.6 Summary and Discussion. -- 3 BLAST Architectures. -- 3.1 BLAST Architecture. -- 3.2 Diagonal BLAST. -- 3.3 Vertical BLAST (V-BLAST). -- -- 3.4 Stratified Diagonal BLAST (SD-BLAST). -- -- 3.5 Simulations on BLAST for the Matrix Rayleigh Channel. -- 3.6 Multirate Layered Space-Time Architecture. -- 3.7 Outage Capacity. -- -- 3.8 Simulation Results. -- 3.9 Summary and Discussion. -- 4 Space-Time Turbo Codes and Turbo Decoding Principles. -- 4.1 Introduction. -- 4.2 Turbo Codes. -- 4.3 Interleaver Designs for Turbo Codes. -- -- 4.4 Space-Time Turbo Codes. -- 4.4.1 Example Space-Time Turbo Codes. -- 4.5 Multirate Layered Space-Time (MLST) Turbo Codes. -- 4.6 Summary and Discussion. -- 5

Sommario/riassunto	Discover cutting-edge research in wireless communications This book presents cutting-edge research in wireless communications, particularly in the fast-growing subject of multiple-input multiple-output (MIMO) wireless communication systems. It begins with an introduction, which includes historical notes and a review of turbo-information processing and MIMO wireless communications, and goes on to cover: . MIMO channel capacity. BLAST architectures. Space-time turbo codes and turbo decoding principles. Turbo-BLAST. Turbo-MIMO systems The material is complemented with abundant illustrations and computer experiments that are designed to help readers reinforce their understanding of the underlying subject matter. Space-Time Layered Information Processing for Wireless Communications is an ideal resource for researchers in academia and industry and an excellent textbook for related courses at the graduate level.