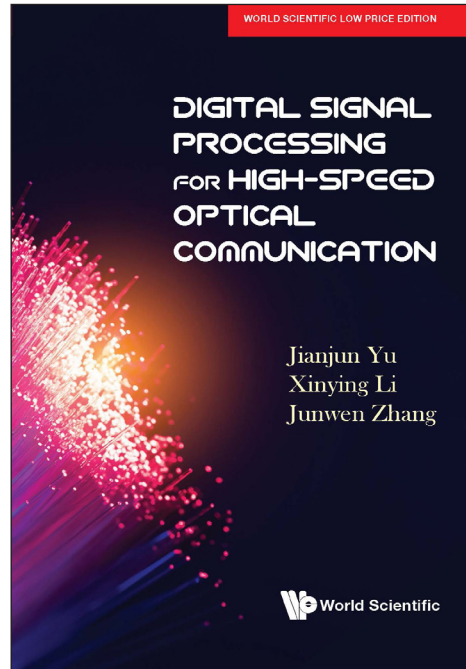


# DIGITAL SIGNAL PROCESSING FOR HIGH-SPEED OPTICAL COMMUNICATION

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## ABOUT THE BOOK

There is an increasing tendency to integrate optical communication with wireless communication to satisfy continuously emerging (new) data communication demands. Thus, optical-wireless-integrated access networks and transmission systems, as well as LED-based visible light communication are attracting ever increasing research interest. Digital signal processing (DSP) is one new technology for optical transmission. As such this book is designed to pave the way to the better understanding of the deployment of DSP in optical fiber communication systems.

*Digital Signal Processing for High-Speed Optical Communication* covers a wide area of DSP topics in optical communications, and describes state-of-the-art digital signal processing techniques for high-speed optical communication. In this book, numerous advanced digital signal processing techniques aiming at the promotion of the capacity increase and performance improvement of optical or optical-wireless communication systems and networks are presented and explained. Coverage includes new technologies, optical filter with MLSE, and new pre-coding and pre-equalization applicable to single-carrier and multi-carrier, direct-detection and coherent-detection optical communication systems and networks.

## READERSHIP

Graduate students, researchers and professionals dealing with Digital Signal Processing in optical fiber communication.

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