



Session Title	Direct-Detection Systems	Session Code	3B1
Date and Time	July 3 (Tue.) / 14:00-15:30 (90')		
Place	Room B		
Session Chair	Nobuhiko Kikuchi (Hitachi)		

3B1-1 (Invited)

14:00-14:30 (30')

Advanced Signal Processing Techniques for Direct Detected Short Reach Systems

Xian Zhou^{1,2}, Jiahao Huo^{1,2}, Baoxian Yu³, Changjian Guo¹, Changyuan Yu¹, Alan Pak Tao Lau¹, and Chao Lu¹

¹The Hong Kong Polytechnic Univ., China, ²Univ. of Sci. and Tech. Beijing, China, ³Sun Yat-Sen Univ., China

3B1-2

14:30-14:45 (15')

Achievement of 186-Gb/s PAM-4 under 20.5- GHz Bandwidth Limitation using MLSE based on 2nd Order Volterra Filter

Hiroki Taniguchi, Shuto Yamamoto, Akira Masuda, and Mitsunori Fukutoku
NTT Corp., Japan

3B1-3

14:45-15:00 (15')

78.41-Gb/s Direct-Detection OFDM Transmission over 80-km SMF using Four-State Chirp Control with DEMZM

Shota Ishimura and Kosuke Nishimura
KDDI Research, Inc., Japan

3B1-4

15:00-15:15 (15')

A Modified Fractional DFT based FTNNOFDM Technique for IM/DD Optical Systems

Zhouyi Hu and Chun-Kit Chan
The Chinese Univ. of Hong Kong, China

3B1-5

15:15-15:30 (15')

Optical Equalization of 56-Gb/s PAM-4 Signals by FM-to-AM Conversion using DMLs with Insufficient Bandwidth

Zhong-Jie Zhang¹, Hong-Sing Lee², Lung Wei Chung¹, and San-Liang Lee¹
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