Mingyu Xiao · Frances Rosamond (Eds.)

Frontiers in Algorithmics

11th International Workshop, FAW 2017
Chengdu, China, June 23–25, 2017
Proceedings

Springer

Contents

On the Complexity of Minimizing the Total Calibration Cost 1
Eric Angel, Evripidis Bampis, Vincent Chau, and Vassilis Zissimopoulos

On the Fixed-Parameter Tractability of Some Matching Problems Under the Color-Spanning Model 13
Sergey Bereg, Feifei Ma, Wencheng Wang, Jian Zhang, and Binhai Zhu

The Complexity of Finding (Approximate Sized) Distance-d Dominating Set in Tournaments 22
Arindam Biswas, Varunkumar Jayapaul, Venkatesh Raman, and Srinivasa Rao Satti

On Computational Aspects of Greedy Partitioning of Graphs 34
Piotr Borowiecki

Maximum Edge Bicliques in Tree Convex Bipartite Graphs 47
Hao Chen and Tian Liu

Complete Submodularity Characterization in the Comparative Independent Cascade Model 56
Wei Chen and Hanrui Zhang

A Risk–Reward Model for On-line Financial Leasing Problem with an Interest Rate 68
Xiaoli Chen and Weijun Xu

Designing and Implementing Algorithms for the Closest String Problem 79
Shota Yuasa, Zhi-Zhong Chen, Bin Ma, and Lusheng Wang

The Broken-Triangle Property with Adjoint Values 91
Jian Gao, Rong Chen, Minghao Yin, and Hui Li

Online Knapsack Problem Under Concave Functions 103
Xin Han, Ning Ma, Kazuhisa Makino, and He Chen

Fluctuated Fitting Under the ℓ_1-metric 115
Kai Jin

Optimal Partitioning Which Maximizes the Weighted Sum of Products 127
Kai Jin

Modular-Width: An Auxiliary Parameter for Parameterized Parallel Complexity 139
Faisal N. Abu-Khzam, Shouwei Li, Christine Markarian, Friedhelm Meyer auf der Heide, and Pavel Podlipyan

Online Strategies for Evacuating from a Convex Region in the Plane 151
Songhua Li and Yinfeng Xu

A Further Analysis of the Dynamic Dominant Resource Fairness Mechanism 163
Weidong Li, Xi Liu, Xiaolu Zhang, and Xuejie Zhang

A 42k Kernel for the Complementary Maximal Strip Recovery Problem 175
Wenjun Li, Haiyan Liu, Jianxin Wang, Lingyun Xiang, and Yongjie Yang

On-line Scheduling with a Monotonous Subsequence Constraint 187
Kelin Luo, Yinfeng Xu, Huili Zhang, and Wei Luo

A 1.4-Approximation Algorithm for Two-Sided Scaffold Filling 196
Jingjing Ma, Haitao Jiang, Daming Zhu, and Shu Zhang

FPT Algorithms for FVS Parameterized by Split and Cluster Vertex Deletion Sets and Other Parameters 209
Diptapriyo Majumdar and Venkatesh Raman

A Constant Amortized Time Algorithm for Generating Left-Child Sequences in Lexicographic Order 221
Kung-Jui Pai, Jou-Ming Chang, and Ro-Yu Wu

Geodetic Contraction Games on Trees 233
Yue-Li Wang

On Approximation Algorithms for Two-Stage Scheduling Problems 241
Guangwei Wu, Jianer Chen, and Jianxin Wang

A New Lower Bound for Positive Zero Forcing 254
Boting Yang

Phase Transition for Maximum Not-All-Equal Satisfiability 267
Junping Zhou, Shuli Hu, Tingting Zou, and Minghao Yin

Author Index 281