## Contents

1. **Chebyshev Sets, Klee Sets, and Chebyshev Centers with Respect to Bregman Distances: Recent Results and Open Problems** .......................................................... 1  
   Heinz H. Bauschke, Mason S. Macklem, and Xianfu Wang

2. **Self-Dual Smooth Approximations of Convex Functions via the Proximal Average** .......................................................... 23  
   Heinz H. Bauschke, Sarah M. Moffat, and Xianfu Wang

3. **A Linearly Convergent Algorithm for Solving a Class of Nonconvex/Affine Feasibility Problems** ........................................ 33  
   Amir Beck and Marc Teboulle

   Adi Ben-Israel and Yuri Levin

5. **Entropic Regularization of the $\ell_0$ Function** .................................. 65  
   Jonathan M. Borwein and D. Russell Luke

6. **The Douglas–Rachford Algorithm in the Absence of Convexity** .......................................................... 93  
   Jonathan M. Borwein and Brailey Sims

7. **A Comparison of Some Recent Regularity Conditions for Fenchel Duality** .......................................................... 111  
   Radu Ioan Boţ and Ernö Robert Csetnek

8. **Non-Local Functionals for Imaging** ............................................. 131  
   Jérôme Boulanger, Peter Elbau, Carsten Pontow, and Otmar Scherzer
9 Opial-Type Theorems and the Common Fixed Point Problem
Andrzej Cegielski and Yair Censor

10 Proximal Splitting Methods in Signal Processing
Patrick L. Combettes and Jean-Christophe Pesquet

11 Arbitrarily Slow Convergence of Sequences of Linear Operators: A Survey
Frank Deutsch and Hein Hundal

12 Graph-Matrix Calculus for Computational Convex Analysis
Bryan Gardiner and Yves Lucet

13 Identifying Active Manifolds in Regularization Problems
W.L. Hare

14 Approximation Methods for Nonexpansive Type Mappings in Hadamard Manifolds
Genaro López and Victoria Martín-Márquez

15 Existence and Approximation of Fixed Points of Bregman Firmly Nonexpansive Mappings in Reflexive Banach Spaces
Simeon Reich and Shoham Sabach

16 Regularization Procedures for Monotone Operators: Recent Advances
J.P. Revalski

17 Minimizing the Moreau Envelope of Nonsmooth Convex Functions over the Fixed Point Set of Certain Quasi-Nonexpansive Mappings
Isao Yamada, Masahiro Yukawa, and Masao Yamagishi

18 The Brézis-Browder Theorem Revisited and Properties of Fitzpatrick Functions of Order $n$
Liangjin Yao
Fixed-Point Algorithms for Inverse Problems in Science and Engineering
Bauschke, H.H.; Burachik, R.; Combettes, P.L.; Elser, V.;
2011, XII, 404 p., Hardcover
ISBN: 978-1-4419-9568-1