

# 非線形解析学と凸解析学の研究

研究集会

京都大学数理解析研究所の共同研究事業の一つとして、下記のように研究集会を催しますので、ご案内申し上げます。

研究代表者 田中 環 (新潟大学・大学院自然科学研究科)  
研究提案者 高橋 渉 (東京工業大学, 慶応義塾大学)

記

日 時: 2015年9月7日(月) 9:05~  
9月9日(水) 16:10

場 所: 京都大学数理解析研究所111号室  
京都市左京区北白川追分町  
市バス 京大農学部前 または 百万遍 下車

プログラム

9月7日(月)

- 9:05~9:25 ○児玉賢史, 亀山眞也, 明石重男, 小瀬木悠佳, 皆川暁生 (東理大院・理工)  
確率分布の分散とその密度関数の勾配ベクトルとの不等式理論的關係
- 9:25~9:50 Do Sang Kim (Pukyong National University, Korea)  
Approximate solutions for nonsmooth multiobjective optimization problems
- 9:50~10:15 Gue Myung Lee (Pukyong National University, Korea)  
On stability and genericity for semi-algebraic compact programs
- 10:30~10:55 Jong Kyu Kim (Kyungnam University, Korea)  
Fixed point theorems and convergence theorems for Lipschitzian type mapping in CAT(0) spaces
- 10:55~11:20 Jong Soo Jung (Dong-A University, Korea)  
An iterative algorithm for generalized mixed equilibrium problems, monotone mappings and pseudocontractive mappings
- 11:20~11:45 青山耕治 (千葉大・法経)  
強擬非拡大写像について
- 13:05~13:30 川崎敏治 (日本大・工, 玉川大・工), ○豊田昌史 (玉川大・工)  
不動点定理とニューロンモデルに関する非整数階微分方程式
- 13:30~13:55 Wei-Shih Du (National Kaohsiung Normal University, Taiwan)  
New existence results of best proximity points and fixed points for  $MT(\lambda)$ -functions
- 13:55~14:20 Ruey-Lin Sheu (National Cheng Kung University, Taiwan)  
On general  $p$ -regularized subproblems for  $p > 2$
- 14:35~14:55 井上裕仁, ○鎌田祥一, 内藤幸一郎 (熊本大院・自然科学)  
 $p$ -進数の多重近似問題における転移法則と格子暗号系の構築
- 14:55~15:15 Yi-Chou Chen (National Army Academy, Taiwan)  
Infinitely many solutions of extended eigenvalue polynomial problems
- 15:15~15:35 ○Ing-Jer Lin, Ya-Ling Chang (National Kaohsiung Normal University, Taiwan)  
Some new generalizations of Karapinar's theorems
- 15:50~16:20 ○Hang-Chin Lai, Cheng Te Liu, Jin-Chirng Lee (National Tsing Hua University, Taiwan)  
An inverse problem of the isomorphism theorem for  $A^p(G)$ -algebras,  $1 \leq p < \infty$
- 16:20~16:50 Sehie Park (Seoul National University, Korea)  
On the KKM theory of locally  $p$ -convex spaces

9月8日(火)

- 9:05~9:25 ○松下慎也, 徐粒 (秋田県立大・システム科学技術)  
最良近似問題に対する解法の収束について
- 9:25~9:50 ○Jae Hyoung Lee, Gue Myung Lee (Pukyong National University, Korea)  
On solving a dc optimization problem with SOS-convex polynomials and a support function
- 9:50~10:15 Chih-Sheng Chuang (National Sun Yat-Sen University, Taiwan), Zenn-Tsun Yu (Nan Kai University of Technology, Taiwan), ○Lai-Jiu Lin (National Changhua University of Education, Taiwan)  
Mathematical programming for the sum of two convex functions with applications to lasso problem, split feasibility problems and image deblurring problem
- 10:30~10:55 Jein-Shan Chen (National Taiwan Normal University, Taiwan)  
How to construct complementarity functions and merit functions for circular cone complementarity problem
- 10:55~11:20 ○Yu-Lin Chang, Jein-Shan Chen (National Taiwan Normal University, Taiwan)  
Construction of convex functions on Euclidean space
- 11:20~11:45 厚芝幸子 (山梨大・教育人間科学)  
Attractive points, acute points, fixed points and convergence theorems for nonlinear mappings
- 13:15~13:40 木村泰紀 (東邦大・理)  
測地距離空間における近似点列の計算誤差
- 13:40~14:05 ○Shuechin Huang (National Dong Hwa University, Taiwan), Yasunori Kimura (Toho University, Japan)  
A projection method for quasinonexpansive mappings in complete metric spaces
- 14:05~14:30 Shyh-Nan Lee (Chung Yuan Christian University, Taiwan)  
Matrix computation of octahedral projection
- 14:45~15:10 竹内幸雄 (高橋非線形解析研究所)  
Acute points, attractive points, and fixed points
- 15:10~15:35 Jiawei Chen (Southwest University, China), ○Yeong-Cheng Liou (Cheng Shiu University, Taiwan), Jen-Chih Yao (Kaohsiung Medical University, Taiwan)  
Bilevel vector pseudomonotone equilibrium problems: duality and existence
- 15:50~16:20 Mau-Hsiang Shih (China Medical University, Taiwan)  
The tendency toward a moving equilibrium
- 16:20~16:50 高橋 涉 (東工大, 慶応大)  
Iterative methods for split common fixed point problems in Banach spaces and applications

9月9日(水)

- 9:00~9:20 ○北條真弓 (芝浦工大), 高橋 涉 (東工大, 慶応大)  
The strong convergence theorem for the split common fixed point problem in Banach spaces
- 9:20~9:40 ○Nirattaya Khamsemanan, Cholwich Nattee (Thammasat University, Thailand), Masayuki Numao (Osaka University, Japan)  
A first-order logic and metric space
- 9:40~10:00 M. Ali Khan (Johns Hopkins University, USA), ○佐柄信純 (法政大・経済)  
Strongly measurable selectors of multifunctions in measure-compact Banach spaces
- 10:15~10:40 Suthep Suantai (Chiang Mai University, Thailand)  
Fixed point theorems for G-nonexpansive mappings in Banach spaces with graphs
- 10:40~11:05 ○Somyot Plubtieng, Tadchai Yuying (Naresuan University, Thailand)  
Strong convergence theorems by hybrid and shrinking projection methods for sums of two monotone operators
- 11:05~11:30 Poom Kumam (King Mongkut's University of Technology Thonburi, Thailand)  
Fuzzy games for a general Bayesian abstract fuzzy economy model
- 13:00~13:20 荒谷洋輔 (千葉工大)  
集合均衡点問題についての統一的なアプローチ

- 13:20~13:40 星野満博 (秋田県立大・システム科学技術)  
1次元配列 SOM における状態保存性と学習プロセスについて
- 13:40~14:00 三宅啓道 (東京都市大)  
Almost everywhere convergence of ergodic averages of certain order-preserving operators on  $L^1$
- 14:15~14:35 ○原田涼平, 黒岩大史 (島根大院・総合理工)  
DC 最適化問題におけるもう1つの双対定理
- 14:35~14:55 ○瀬戸和希, 黒岩大史 (島根大院・総合理工)  
複数の不動点を持つ写像の Picard iteration の観察
- 14:55~15:15 ○鈴木 聡, 黒岩大史 (島根大院・総合理工)  
準凸計画問題に対する必要十分な最適性条件について
- 15:30~15:50 川崎敏治 (日本大・工, 玉川大・工)  
Fixed point theorems for contractively widely more generalized hybrid mappings in metric spaces
- 15:50~16:10 ○渡辺俊一 (日本大・理工), 豊田昌史 (玉川大・工)  
順序集合における不動点定理の非整数階微分方程式境界値問題への適用例

○印：講演者