Harmonic Analysis and its Applications in Tokyo 2017

August 2 (Wed) – 4 (Fri), 2017

Nihon University
College of Economics

Building No.7
Auditorium on the second and third floor

1-3-2 Misaki-cho, Chiyoda-ku, Tokyo, 102-8360, Japan

Organizers

Eiichi Nakai (Ibaraki University) — Chair Katsuo Matsuoka (Nihon University) — Vice Chair Akihiko Miyachi (Tokyo Woman's Christian University) Yasuo Komori-Furuya (Tokai University) Yoshihiro Sawano (Tokyo Metropolitan University)

Chairmen

August 2

Morning

Dunyan Yan (University of Chinese Academy of Sciences, China) Yutaka Terasawa (Nagoya University, Japan)

Afternoon

Dachun Yang (Beijing Normal University, China) Naohito Tomita (Osaka University, Japan)

August 3

Morning

Akihiko Miyachi (Tokyo Woman's Christian University, Japan) Yoshihiro Sawano (Tokyo Metropolitan University, Japan)

Afternoon

Yasuo Komori-Furuya (Tokai University, Japan) Mitsuru Sugimoto (Nagoya University, Japan)

August 4

Morning

Yohei Tsutsui (Shinshu University, Japan)

Toshio Horiuchi (Ibaraki University, Japan)

Afternoon

August 2 (Wednesday)

- 09:20–09:55 Registration
- 09:55-10:00 Opening
- 10:00–10:30 Dachun Yang (Beijing Normal University, China) Ball average characterizations of function spaces
- 10:35–11:05 Dongyong Yang (Xiamen University, China)
 Boundedness and compactness of Riesz transform commutator in the
 Bessel setting

Coffee break

- 11:25–11:55 Gaku Sadasue (Osaka Kyoiku University, Japan) Fractional integrals on martingale spaces
- 12:00–12:30 Takahiro Noi (Tokyo Metropolitan University, Japan)
 A characterization of generalized Besov Morrey spaces by differences
 Lunch break
- 14:00–14:30 Yoshihiro Sawano (Tokyo Metropolitan University, Japan)

 An observation of the atomic decomposition of Hardy spaces with variable exponent
- 14:35–15:05 Ciqiang Zhuo (Hunan Normal University, China) Variable weak Hardy spaces and their applications
- 15:10–15:40 Yong Jiao (Central South University, China) Variable Hardy-Lorentz spaces $H^{p(\cdot),q}$

Coffee break

- 16:00–16:30 Sibei Yang (Lanzhou University, China) The L^p Robin problem of Laplace equations in Lipschitz domains
- 16:35–17:05 Yutaka Terasawa (Nagoya University, Japan)
 Finite energy for the Navier-Stokes equations and Liouville-type theorems
- 17:10–17:40 Tsuyoshi Yoneda (The University of Tokyo, Japan) A weak type of norm inflation for solutions of the incompressible 2D Euler equations near the critical Besov space $B_{2,1}^2$

August 3 (Thursday)

09:30–10:00 Wen Yuan (Beijing Normal University, China) The Gaussian capacities 10:05–10:35 Liguang Liu (Renmin University of China, China) Restricting Riesz-Morrey-Hardy potentials Coffee break 10:55–11:25 Haibo Lin (China Agricultural University, China) Weighted Morrey spaces on non-homogeneous metric measure spaces 11:30–12:00 Shohei Nakamura (Tokyo Metropolitan University, Japan) Recent developments of the weight theory on Morrey spaces 12:05–12:35 Denny Ivanal Hakim (Tokyo Metropolitan University, Japan) Complex interpolation of predual of local Morrey-type spaces 12:35–12:50 Conference photo Lunch break 14:10–14:40 Hitoshi Tanaka (Tsukuba University of Technology, Japan) The Carleson type embedding inequality for dyadic rectangles 14:45–15:15 Feng Liu (Shandong University of Science and Technology, China) Regularity properties of the strong maximal operators associated with rectangles 15:15–15:45 Poster Session Coffee break 15:50–16:20 Naohito Tomita (Osaka University, Japan) Bilinear pseudo-differential operators of type 1,1 and their application to the Kato-Ponce inequality 16:25–16:55 Masaharu Kobayashi (Hokkaido University, Japan) Representation of Airy evolution operator via short-time Fourier transform and its application 17:00–17:30 Yohei Tsutsui (Shinshu University, Japan) Asymptotic stability of the stationary Navier-Stokes flows in Besov spaces

Banquet

August 4 (Friday)

- 09:30–10:00 Mitsuru Sugimoto (Nagoya University, Japan)
 Remarks on nonlinear operations on modulation spaces
- 10:05–10:35 Jun Cao (Zhejiang University of Technology, China)
 Sharp bilinear decomposition of the product of Hardy space and its dual

Coffee break

- 10:55–11:25 Hidemitsu Wadade (Kanazawa University, Japan)
 On a maximizing problem associated with the Sobolev type embedding in the whole space with lower order terms
- 11:30–12:00 Dunyan Yan (University of Chinese Academy of Sciences, China) On Selberg's integral formula
- 12:05–12:35 Shinya Moritoh (Nara Women's University, Japan) Some variations on wavelet reconstruction formulae

Lunch break

14:00-17:00 Free discussion

Poster Session

Display Time: All days

Standing Time: August 3, 15:15–15:45

- Ryutaro Arai (Ibaraki University, Japan)
 Commutators of generalized fractional integral operators on generalized
 Morrey spaces
- Keisuke Asami (Tokyo Metropolitan University, Japan) Non-smooth decomposition of homogeneous Triebel-Lizorkin spaces with applications to the Marcinkiewicz integral
- Xiaojing Liu (Ibaraki University, Japan) Improved Kato's inequalities for the quasilinear elliptic operator and relating topics
- Toru Nogayama (Tokyo Metropolitan University, Japan) Compactness of the commutator generated by Lipschitz functions and fractional itegral operators
- Kazuya Ootsubo (Bon Agency Co., Ltd., Ibaraki University, Japan) On Kuratsubo phenomenon
- Yoshihiro Sawano (Tokyo Metropolitan University, Japan) A non-dense subspace of \mathcal{M}_q^p