DAY 1
Monday, November 7

8:30 - 9:30	Registration
Place	**2F Auditorium**
9:30 - 9:45	**Sergej Flach, IBS PCS**
	Opening address
9:45 - 10:30	**Steven Storgatz, Cornell University, USA**
	Global Synchronization: New Theorems, New Puzzles (Online)
10:30 - 11:00	Break
11:00 - 11:45	**Boris Altshuler, Columbia University, USA**
	Many-Body Localization
11:45 - 12:30	**Ying-Cheng Lai, Arizona State University, USA**
	Finding the Equations and Structures of Complex Systems from Data
12:30 - 14:00	Lunch (IBS Theory Building 1F Cafeteria)

Place	**2F Auditorium**
14:00 - 14:30	**Emil Yuzbashyan, Rutgers University, USA**
	Is Nonequilibrium Superconductivity a Quantum or a Classical Phenomenon?
14:30 - 15:00	**Dario Rosa, IBS PCS**
	Delocalization and Scrambling of Operators in Quantum Networks
15:00 - 15:30	**Sudhir-Ranjan Jain, Bhabha Atomic Research Centre, India**
	Qubit Control and Protection: Ideas from Nonlinear Science (Online)
15:30 - 16:00	**Thomas Bilitewski, Oklahoma State University, USA**
	From KPZ Scaling to Long-Lived Solitons in the Classical Heisenberg Chain
	2F Hall
14:00 - 14:30	**Hayato Chiba, Tohoku University, Japan**
	A Bifurcation in the Kuramoto Model on Networks
14:30 - 15:00	**Kazumasa Takeuchi, The University of Tokyo, Japan**
	Scaling and Spontaneous Symmetry Restoring of Topological Defect Dynamics in Liquid Crystal
15:00 - 15:30	**Arkady Pikovsky, University of Potsdam, Germany**
	Dynamics of Oscillator Populations: Exact Finite-Dimensional Reduction and Beyond
15:30 - 16:00	**Daan Crommelin, CWI Amsterdam & University of Amsterdam, Netherlands**
	Machine Learning and Resampling for Stochastic Parameterization with Memory (Online)
	3F Hall
14:00 - 14:30	**Christian Franzke, IBS Center for Climate Physics & Pusan National University, Korea**
	Causality Detection and Multi-Scale Decomposition of the Climate System using Machine Learning
14:30 - 15:00	**Yoo-Geun Ham, Chonnam National University, Korea**
	Deep Learning for Detecting Anthropogenic Global Warming Signal in Daily Precipitation
15:00 - 15:30	**Laurie Menviel, The University of New South Wales, Australia**
	Drivers of the Evolution and Amplitude of African Humid Periods (Online)
15:30 - 16:00	**Malte Stuecker, University of Hawaii at Manoa, USA**
	The Climate Trio: Stochastic Climate Variability, Seasonal Cycle, and El Niño
16:00 - 16:30	Break

Place	**2F Auditorium**
16:30 - 17:15	**Changsong Zhou, Hong Kong Baptist University, Hong Kong**
	Cost-Efficient Neural Dynamics: Reconciling Multilevel Spontaneous and Evoked Activity in E-I Balanced Neural Networks at Criticality (Online)
17:15 - 18:00	**Yamir Moreno, University of Zaragoza, Spain**
	Contagion Dynamics on Single, Multilayer, and Higher-Order Networks (Online)
18:00 - 20:00	Welcome reception (3F Lounge)

DAY 2
Tuesday, November 8

Place	2F Auditorium
9:00 - 9:45	**Takahiro Sagawa, University of Tokyo, Japan**
	Quantum Fluctuation Theorems under Measurement and Feedback
9:45 - 10:30	**Wenwei Ho, National University of Singapore, Singapore**
	Quantum Many-Body Dynamics in the Age of Noisy, Intermediate-Scale Quantum (NISQ) Devices (Online)
10:30 - 11:00	Break

Place	2F Auditorium
11:00 - 11:30	**Dario Poletti, Singapore University of Technology and Design, Singapore**
	Typicality of Nonequilibrium (Quasi-)Steady Currents
11:30 - 12:00	**Berge Englert, National University of Singapore, Singapore**
	Highly accurate numerical solutions of the time-dependent Schrödinger equation (Online)
12:00 - 12:30	**Mile Gu, Nanyang Technological University, Singapore**
	Can Quantum Machines Execute Complex Adaptive Strategies more Efficiently?
	2F Hall
11:00 - 11:30	**Lock Yue Chew, Nanyang Technological University, Singapore**
	Thermodynamics of Information Ratchet with Finite Tape: Second Law and Correlation Effects
11:30 - 12:00	**Andreas Dechant, Kyoto University, Japan**
	Geometric Decomposition of Entropy Production
12:00 - 12:30	**Jae Sung Lee, KIAS, Korea**
	Speed Limit for a Highly Irreversible Process and Tight Finite-Time Landauer's Bound
	3F Hall
11:00 - 11:30	**Kenta Ishimoto, Kyoto University, Japan**
	Swimming in Flows: Beyond Jeffery's Orbits
11:30 - 12:00	**Rui Zhang, Hong Kong University of Science and Technology, Hong Kong**
	Dynamic Features of Topological Defects in Active Liquid Crystals (Online)
12:00 - 12:30	**Younghae Do, Kyungpook National University, Korea**
	Complexity Dynamics of Atopic Dermatitis System
12:30 - 14:00	Conference picture & Lunch (IBS Theory Building 1F Cafeteria)

Place	3F Lounge
14:00 - 16:30	Poster Session (3F)

Place	2F Auditorium
16:30 - 17:15	**Henk Dijkstra, Utrecht University, Netherlands**
	Tipping of the Atlantic Ocean Circulation (Online)
17:15 - 18:00	**Antonio Politi, University of Aberdeen, UK**
	A New Interpretation of Laser Instabilities
18:00 - 20:00	Poster session dinner (3F Lounge)

DAY 3
Wednesday, November 9

Place	2F Auditorium
9:00 - 9:45	**Juergen Kurths, Potsdam Institute for Climate Impact Research, Germany** *Climate Meets Complex Systems: Exploring Predictability of Extreme Climate Events via a Complex Network Approach*
9:45 - 10:30	**Yoshiyuki Kabashima, University of Tokyo, Japan** *Assessing Transfer Entropy from Biochemical Data (Online)*
10:30 - 11:00	Break
11:00 - 11:45	**Jiangbin Gong, National University of Singapore, Singapore** *Nonequilibrium topological phases and Floquet quantum computation (Online)*
11:45 - 12:30	**Byungnam Kahng, Korea Institute of Energy Technology, Korea** *Universal microscopic mechanism of hybrid percolation transitions*
12:30 - 13:30	Lunch (IBS Theory Building 1F Cafeteria)
13:30 - 19:00	Excursion (Jeonju) - Shuttle departure at 1.30 pm (Sharp)
19:00 - 20:30	Banquet (쌍촌본가)

DAY 4
Thursday, November 10

Place	2F Auditorium
9:00 - 9:45	**Igor Aronson, Pennsylvania State University, USA** *Self-Organization of Signaling Active Matter*
9:45 - 10:30	**Reka Albert, Pennsylvania State University, USA** *Identifying Decisions in Biological Systems: Toward Understanding and Control (Online)*
10:30 - 11:00	Break

Place	2F Auditorium
11:00 - 11:30	**Moon Jip Park, IBS PCS** *Non-Hermitian Hopf-bundle Matter*
11:30 - 12:00	**Yuto Ashida, University of Tokyo, Japan** *Dissipative Quantum Phase Transition and Cavity QED (Online)*
12:00 - 12:30	**Ryo Hanai, YITP, Japan & APCTP, Korea** *Non-Reciprocal Frustration: Time Crystalline Order-by-Disorder Phenomenon and a Spin-Glass-Like State*
12:30 - 14:00	Lunch (IBS Theory Building 1F Cafeteria)
14:00 - 14:30	**Alexei Andreanov, IBS PCS** *Flatbands: Construction and Perturbation*
14:30 - 15:00	**Arul Lakshminarayan, IIT Madras, India** *Dual Unitary Circuits as Models of Many-Body Quantum Chaos*
15:00 - 15:30	**Carlo Danieli, Sapienza University, Italy** *Localization Phenomena in Interacting Flatband Systems*
	2F Hall
11:00 - 11:30	**Deok-Sun Lee, KIAS, Korea** *Emergence and Robustness of Wealth Inequality in the Generalized Yard-Sale Model on Graphs*
11:30 - 12:00	**Yong Woon Kim, KAIST, Korea** *Random Target Searches by Multiple Particles*
12:00 - 12:30	**Seung Ki Baek, Pukyong National University, Korea** *Local Stability of Cooperation in a Continuous Model of Indirect Reciprocity*
12:30 - 14:00	Lunch (IBS Theory Building 1F Cafeteria)
14:00 - 14:30	**Dong-Hee Kim, Gwangju Institute of Science and Technology, Korea** *Bounds of Information Scrambling in the Strongly Disordered XXZ Model*
14:30 - 15:00	**Chi-Hang Lam, Hong Kong Polytechnic University, Hong Kong** *Quasivoid: A Quasi-Particle Approach for the Dynamics of Structural Glass (Online)*
15:00 - 15:30	**Chang-Hwan Yi, IBS PCS** *Bloch Theorem Dictated Wave Chaos in Microcavity Crystals*
	3F Hall
11:00 - 11:30	**Antonio Celani, ICTP, Italy** *Learning to Fly High: Reinforcement Learning for Soaring and Airborne Wind Energy*
11:30 - 12:00	**Liang Tian, Hong Kong Baptist University, Hong Kong** *Pharmacological Principle of Traditional Chinese Medicine: A Big-Data and AI Perspective*
12:00 - 12:30	**Yongjoo Baek, Seoul National University, Korea** *Negative Drag and Symmetry-Breaking Motility in a Dilute Active Fluid*
12:30 - 14:00	Lunch (IBS Theory Building 1F Cafeteria)
14:00 - 14:30	**Manas Kulkarni, ICTS - TIFR, India** *Anomalous Transport at Band Edges*
14:30 - 15:00	**Andrey Kolovsky, Kirensky Institute of Physics SB RAN, Russia** *Bistability and Chaos-Assisted Tunneling in Dissipative Quantum Systems*
15:00 - 15:30	**Giuliano Benenti, University of Insubria, Italy** *Micromasers as Quantum Batteries*
15:30 - 16:30	Conference picture & Break
Place	**2F Auditorium**
16:30 - 17:15	**Federico Ricci-Tersenghi, Sapienza University of Rome, Italy** *Rejuvenation and Memory: Amazing Effects in the Spin Glass Dynamics, Involving Several Growing Length Scales (Online)*
17:15 - 18:00	**David Saad, Aston University, UK** *Pandemics, Marketing and Opinion Formation – The Power of Spreading Processes*
18:00 - 19:00	Dinner (IBS Theory Building 1F Cafeteria)

DAY 5
Friday, November 11

Place	2F Auditorium
9:00 - 9:45	**Hugues Chate, CEA - Saclay, France**
	A Synchronization Viewpoint on Some Active Matter Results
9:45 - 10:30	**Jae Dong Noh, University of Seoul, Korea**
	Do Quantum Systems Thermalize?
10:30 - 11:00	Break
11:00 - 11:45	**Sriram Ramaswamy, Indian Institute of Science, Bangalore, India**
	Directions in the Hydrodynamics of Active Matter (Online)
11:45 - 12:30	**Axel Timmermann, IBS Center for Climate Physics & Pusan National University, Korea**
	Reconstructing, Simulating and Understanding Abrupt Climate Change
12:30 - 14:00	Closing & Lunch