

ENS/UTokyo WS on Physics

Nov. 25-26, 2019

Hongo Campus, University of Tokyo
Faculty of Science, Building No.4, Room 1320 (3rd floor)

November 25, 2019

- 9:30- *Welcome coffee*
- 9:50-10:00 Welcome address
- 10:00-10:30 Jakob Reichel
 “Spin Squeezing at a Metrologically Relevant Level”
- 10:30-11:00 Hidetoshi Katori
 “Transportable Optical Lattice Clocks to Test Gravitational Redshift”
- 11:00-11:30 Sébastien Gleyzes
 “Cat States and Quantum Metrology with Rydberg Atoms”
- 11:30-12:00 Masahito Ueda
 “Discrete Time-crystalline Order in Cavity and Circuit QED Systems”
- 12:00-13:30 *Lunch*
- 13:30-14:00 Kazuhiko Hirakawa
 “Terahertz Spectroscopy of Electron - vibron Coupling in Single Molecules”
- 14:00-14:30 Robson Ferreira
 “Graphene Quantum Dots in the THz domain”
- 14:30-15:00 Ryo Shimano
 “Electron-hole Bardeen-Cooper-Schrieffer State in a Photoexcited Semiconductor”
- 15:00-15:30 Synge Todo
 “Data Assimilation in Materials Science - crystal Structure Prediction Supported by Incomplete Experimental Data”
- 15:30-16:00 *Break*
- 16:00-16:30 Matthieu Delbecq
 “Sensing a Synthetic Spin Texture with Cavity Photons”
- 16:30-17:00 Kensuke Kobayashi
 “Non-equilibrium Fluctuations in Correlated Quantum Liquids”
- 17:00-17:30 Gwendal Fève
 “Microwave Photons Emitted by Fractionally Charged Quasiparticles”
- 17:30-18:00 Seigo Tarucha
 “Quantum Non-demolition Measurement of Single Spins”

November 26, 2019

- 10:00-10:30 Satoshi Yamamoto
“Why Chemistry in Astronomy?”
- 10:30-11:00 Edith Falgarone
“A Tale of Turbulence and Gravity”
- 11:00-11:30 Naoki Yoshida
“Cosmological Simulations of Galaxy Formation”
- 11:30-13:00 *Lunch*
- 13:00-13:30 Yasushi Okada
“Dissecting the Molecular Mechanisms of Axonal Transport Through Single Molecule and Super-resolution Imaging”
- 13:30-14:00 Frederic Pincet
“In Vitro Recapitulation of Synaptic Transmission with Model Physiological Membranes”
- 14:00-14:30 Tetsuya Kobayashi
“Understanding Biological Sensing and Its Optimality”
- 14:30-15:00 Jean François Allemand
“Some Single DNA Micromanipulation Experiments”
- 15:00-15:30 Takahiro Sagawa
“Thermodynamics of Information”
- 15:30-15:45 Closing