

Nano-ISSP 2021 – from fundamentals to applications

The 168th Regular Seminar of Division of Sputtering & Plasma Processes

The Japan Society of Vacuum and Surface Science

This year 2021 was the year of the "16th International Symposium on Sputtering and Plasma Processes: ISSP 2021". However, due to concerns about unprecedented circumstances surrounding the COVID-19 pandemic, it was decided to be held jointly with the "International Vacuum Congress", which will be held in 2022, and thus we lost the opportunity to have international interaction between researchers and engineers from academia and industry. We, therefore, by taking advantage of the recent online meeting platforms, decided to have an opportunity to communicate with five prominent researchers who are globally leading the field of sputtering and plasma processes, to learn about the basics and applications of sputtering. Through the whole schedules of the seminar, we aim to provide the opportunity to create the innovative ideas and the networking for the future developments of sputtering technologies and its applications. We sincerely look forward to your participation.

Time and Date: September 2nd, 2021, 15:00 -19:00 JST (Online system opens at 14:30, JST, GMT+09:00)

Meeting platform: Online meeting using Zoom, Meeting ID will be provided after your registration completed.

Program: Each lectures will be 40 mins including 5 mins discussion

15:00 -15:05 Opening address Dr. Kazuki Tajima, Chair of ISSP 2021 Committee (AIST)

15:05 -15:45 "Deposition of various TCO's and the functional oxide films by dc reactive sputtering; (1) with plasma-emission or impedance feedback systems, (2) hollow cathode gas flow sputtering", Prof. Yuzo Shigesato (Aoyama Gakuin University, Japan)

15:45 -16:25 "High-density arc plasma technology to tailor oxygen-related defects and its critical roles for achieving unconventional metal oxide films", Prof. Tetsuya Yamamoto (Kochi University of Technology, Japan)

16:25 -16:45 Break

16:45 -17:25 "On the deposition rate during reactive magnetron sputtering", Prof. Diederik Depla (Ghent university, Belgium)

17:25 -18:05 "Bipolar HiPIMS for low-energy ion-bombardment during growth of dielectric thin films", Prof. Ulf Helmersson (Linköping University, Sweden)

18:05 -18:45 "On electron heating, deposition rate and ion recycling in the high-power impulse magnetron sputtering discharge", Prof. Jon Tomas Gudmundsson (University of Iceland, Iceland)

18:45 -18:50 Closing remarks Prof. Yasuhito Gotoh, Chair, SP Division (Kyoto University)

Maximum number: Limited to max. 70 participants

Registration: Please register through a registration form at the JVSS web page <https://www.jvss.jp/>

Registration will be closed on ~~23rd August, 2021~~ ⇒ **31st August, 2021**

Registration fee:

SP division member	All JVSS member	Academia	Student	Others
Free	3,000 JPY	3,000 JPY	Free	5,000 JPY

Payment: You can choose payment by bank transfer/ secure credit card payment (Paypal), Invoice will be sent after your registration to the registered E-mail address. Note: Registration fee will not be refunded in the case of cancellation or non-participation due to participant's personal convenience.

Contact: JVSS Secretariat, Tel: +81-3-3812-0266, E-mail: office@jvss.jp

Event organizers: Takeo Nakano (Seikei University), Naho Itagaki (Kyushu University), Tetsuhide Shimizu (Tokyo Metropolitan University),