



Advanced Institute for Materials Research (AIMR)
Online Lecture 2024

18:00 – 19:00 (JST), Feb. 29th (Thur)

Speaker : Prof. Dr. Astrid Pundt

Institute of Applied Material- materials science and engineering
(IAM-WK) Karlsruhe Institute of Technology (KIT), Germany

Hydrogen in Materials:

Process – Microstructure – Properties Relationships

Hydrogen is an important research topic at KIT. One of the institutes dealing with hydrogen, is the IAM-WK. This institute has the scope of determining process – microstructure – properties relationships. Metal-hydrogen (M-H) systems offer great opportunities for research studies on fundamental aspects. This is due to the high diffusivity of the smallest of all atoms that allows alloying even at room temperature. At this temperature, the materials microstructure remains rather stable. When the system size is reduced to the nano-scale, microstructural defects as well as mechanical stress significantly affect the thermodynamics and kinetics properties of the system. Effects will be demonstrated on Niobium-H and Palladium-H thin films.

Resistration : <https://forms.gle/GSvpXx8dbf2qvE6E6>

Due date for resistration : 13:00 (JST), Feb. 29th (Thur)

*Zoom information will be sent to registered participants on the day of the event.

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