Hamburg Photon Science Colloquium

# IR BRIDGES ACROSS THE PRESSURE AND MATERIALS GAPS IN OXIDES

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Bridging the materials and pressure gaps is a central challenge in heterogeneous catalysis. It will be demonstrated that polarization-resolved IRRAS on oxide single crystals provides site-selective information on terrace, defect, and step-edge adsorption sites. Oxide IRRAS exhibits characteristic features such as positive and negative bands, polarization-dependent frequency shifts, and azimuthal anisotropy. Finally, UHV IRRAS data will be linked to operando DRIFTS studies on powders at 1 bar.

FRIDAY,
10.07.2026

2:00 PM

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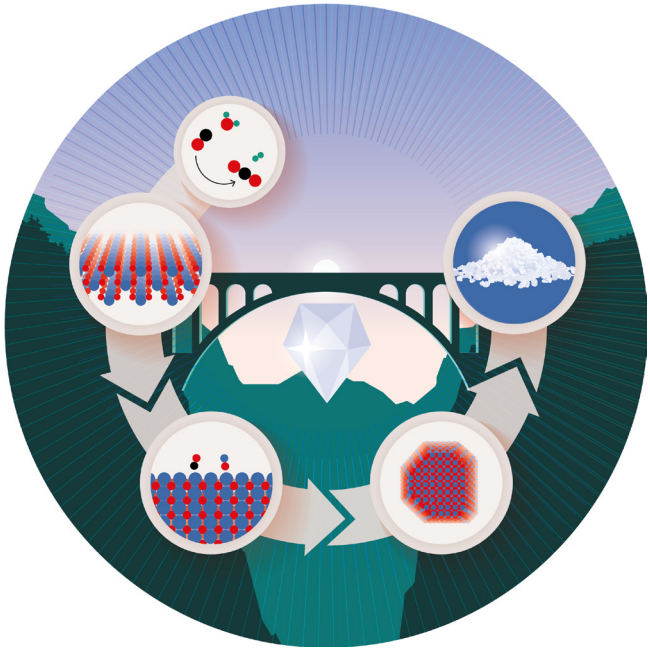

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