

Séminaire SOLEIL

Synchrotron radiation based core-level electron spectroscopy studies of aqueous solutions

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Invité par Svante SVENSSON

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Grand Amphi SOLEIL**

Synchrotron radiation (SR) based experiments in the soft x-ray range have been very successful in studies of the electronic structure in the fields of molecular, surface and solid state physics. However, for liquid samples, only a few SR based experiments in the soft x-ray energy range have been performed, due to experimental problems. Recently, using a differentially pumped liquid micro-jet source, it has become able to perform core-level electron spectroscopy studies of water and other hydrogen-bonded systems.

Here I review some recent results from experiments using such a setup at the beamline I411 of the Swedish synchrotron laboratory MAX-lab. Among other things, an investigation into the pH-dependent protonation/deprotonation of aqueous glycine, using XPS, and a study of the Auger decay of aqueous potassium halide solutions, where the electrons from the surrounding water molecules take part in the decay of the core-ionized potassium ion, but not of the halide ion, will be presented.

Formalités d'entrée : accès libre dans l'amphi du Pavillon d'Accueil. Si la manifestation a lieu dans le Grand Amphi Soleil du Bâtiment Central, merci de vous munir d'une pièce d'identité (à échanger à l'accueil contre un badge d'accès).

SYNCHROTRON SOLEIL

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