

Postdoctoral Position at SSRL for Development & Application of X-ray Absorption Spectroscopy Methods in Catalysis

The Stanford Synchrotron Radiation Lightsource (SSRL), a Directorate of the SLAC National Accelerator Laboratory, Stanford University, and a national user facility, seeks a Ph.D. Postdoctoral Scholar with research interest and experience in synchrotron X-ray characterization of materials.

This 2-year postdoctoral position will involve using *in-situ/in-operando* synchrotron-based methods, primarily X-ray absorption spectroscopy (XAS), to study all aspects of catalysis. The focus of the project will be in developing advanced methods in data processing, data analysis and data modeling. The candidate will join a group at SSRL, under the guidance of Simon Bare, whose mission is to develop a world-class synchrotron catalyst characterization facility, and has recently received funding to establish the Consortium for Operando and Advanced Catalyst Characterization via Electronic Spectroscopy and Structure (Co-ACCESS).

In addition to the data analysis, the candidate will collaborate on beamline setup and data collection at SSRL. The candidate will also give instruction on data analysis to graduate students. The candidate will work closely with visiting scientists, postdoctoral fellows, and students from leading research groups, on all aspects of the synchrotron-mediated research; provide guidance to, and foster the development of, graduate and undergraduate students; publish experimental results in scientific journals and present results at scientific meetings; and maintain a safe working environment in the laboratory.

Qualifications:

- Ph.D. in physics, chemistry, chemical engineering, materials sciences or related fields.
- Experience with all aspects of synchrotron X-ray absorption spectroscopy is a must, including demonstrated ability in data analysis and modeling of XAFS data. Use of Athena/Artemis preferred.
- Strong programming skills and knowledge of instrument control preferred.
- Willingness to learn and bridge knowledge/experience gaps.
- Ability to work independently and in a team environment.
- Strong organizational skills a must.
- Ability to work and communicate effectively with a diverse population; good interpersonal skills are essential.
- Effective written and verbal communication skills.

Please send a letter with CV and list of publications, and names of two references, to the address below:

Simon R Bare, email: simon.bare@slac.stanford.edu