

Meet the Researcher - Dr. John Spence



Dr. John Spence is a *Professor in the Department of Physics at Arizona State University*. His areas of study include "*condensed matter physics and biophysics, based around the use of electron and X-ray beams for imaging, spectroscopy and diffraction - broadly diffraction physics*".

Dr. Spence is an affiliate of CBST and his research project on the topic of "progress towards protein structure determination using serial crystallography" is partially funded by the Center. "Dr. Spence's serial crystallography method is being tested as a way of overcoming the notorious difficulties associated with the X-ray diffraction of proteins, in which the sample is difficult to prepare (both with respect to the protein crystallization and final preparation), and the radiation damage ultimately limits the resolution of the structure. "

To read more about Dr. Spence and his current research projects, please click on <http://cbst.ucdavis.edu/research/diffraction-imaging/diffraction-imaging> or <http://www.public.asu.edu/~spence/>.

Recent Publications:

Micron. 2009 Jun; 40(4):507-9. SEM imaging of liquid jets. DePonte DP, Doak RB, Hunter M, Liu Z, Weierstall U, Spence JC.

Ultramicroscopy. 2008 Nov; 108(12):1502-3. Diffract-and-destroy: can X-ray lasers "solve" the radiation damage problem? Spence JC, Hawkes PW.

Current group members:

Rick Kirian, graduate student; Dan DePonte, research associate; Dmitri Starodub, research associate.

To read more, please click on

<http://biophysics.asu.edu/CBP/person.php?ID=81>.