

Postdoctoral Research Associate in Neutron Scattering Studies of Fluids & Polymers Under Confinement

**Neutron Scattering Science Division
Oak Ridge National Laboratory
Oak Ridge, Tennessee**

ORNL09-88-NSSD

Project Description:

The Neutron Scattering Sciences Division at the Oak Ridge National Laboratory has an immediate opening for a Postdoctoral Fellow in the area of condensed matter science. The successful candidate will participate in research to study the structure and dynamics of sub- and supercritical fluids as well as macromolecular liquids under confinement using small-angle neutron scattering (SANS).

The porous materials to be studied can include engineered porous matrices such as xerogels, nanotubes and carbon aerogels as well as natural porous materials such as coal, sandstones and shales. Confined fluids include but not limited to carbon dioxide and hydrogen. The results of these studies are expected to contribute into the development and optimization of carbon sequestration and hydrogen storage technologies.

The successful candidate will also provide user support to a limited number of visiting researchers coming to conduct experiments in the field of soft matter physics on the General Purpose SANS instrument at the High Flux Isotope Reactor (HFIR).

Qualifications:

A Ph.D. in physics, chemistry, materials science or a related field is required. The ideal candidate should have experience with either neutron or X-ray scattering techniques and strong computer skills. The desire to work in a team environment on scientifically challenging problems is required.

Applicants cannot have received the most recent degree more than five years prior to the date of application and must complete all degree requirements before starting their appointment.

Technical questions:

Contact Dr. Yuri Melnichenko, NSSD, Oak Ridge National Laboratory, Oak Ridge, TN 37831-6393, email: melnichenkoy@ornl.gov. Please reference the position title and number when corresponding about this position.

How to Apply:

Qualified applicants must apply online at https://www2.ornl.gov/ORNL_POST/. All applicants will need to register before they can begin the online application. For complete instructions, on how to apply, please see the instructions at <http://www.ornl.gov/orise/edu/ornl/ornl-pdpm/application.htm>. When applying for this position, please reference the position title and number.

This appointment is offered through the ORNL Postgraduate Research Participation Program and is administered by the Oak Ridge Institute for Science and Education (ORISE). The program is open to all qualified U.S. and non-U.S. citizens without regard to race, color, age, religion, sex, national origin, physical or mental disability, or status as a Vietnam-era veteran or disabled veteran.