

**Postdoctoral Research Associate
in Theory of Thermoelectric Materials**

**Materials Science & Technology Division
Physical Sciences Directorate
Oak Ridge National Laboratory
Oak Ridge, Tennessee**

ORNLO9-74-MSTD

Project Description:

This fellowship is for research investigating the properties of thermoelectric materials in collaboration with D.J. Singh. This will involve a combination of first principles calculations of electronic structure, transport theory, and/or dynamical simulations, such as first principles phonon calculations and/or molecular dynamics calculations. A particular emphasis will be placed on developing understanding of thermoelectric performance in terms of structure and chemical composition and on the prediction of new thermoelectric compositions.

Qualifications:

PhD degree in condensed matter physics or closely related field. It is expected that the candidate will have background and interest in first principles calculations. It would be very desirable if the candidate has background in transport theory, thermoelectric materials, phonon calculations and/or molecular dynamics.

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:

David J. Singhat singhdj@ornl.gov (Include the requisition number and title when responding.)

How to Apply:

Qualified applicants may 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 Associates Program and is administered by Oak Ridge Associated Universities (ORAU). This appointment 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.