

National Aeronautics and
Space Administration

Ames Research Center
Thermal Protection Materials Branch
Moffett Field, CA 94035
July 17, 2015



Postdoctoral Position in Computational Modeling of Shape Memory Alloys at the NASA Ames Research Center

A postdoctoral position in computational material science is available immediately at the NASA Ames Research Center for a two year project related to high temperature shape memory alloys. The project will involve a combination of computational tools including *ab initio* methods, molecular dynamics simulations, cluster expansions and perhaps phase field modeling. Candidates should have significant experience with one or more of these techniques. Direct experience with the software package LAMMPS and/or ATAT is desirable but not required. The appointment is jointly with Drs John Lawson and Charles Bauschlicher.

Computational materials science research at the NASA Ames Research Center is directed towards multiscale modeling (*ab initio*, atomistic, continuum) of next generation materials for aerospace applications. We have multi- disciplinary teams (chemists, physicists, material scientists) working on both experimental and computational issues.

The candidate should hold a doctoral degree in a relevant discipline, such as Materials Science, Chemical Engineering, Mechanical Engineering, Chemistry or Physics before the commencement of the appointment. The ideal candidate will have a solid theoretical background as well as experience in computational materials modeling using standard software packages and also be strong in scientific programming.

Interested persons should submit by email a CV including publication list and contact information for 2-3 references to John Lawson (John.W.Lawson@nasa.gov). Applications will be reviewed until the position is filled. **Applicants who are US citizens or permanent US residents will receive special consideration.** However, well-qualified US based, foreign nationals will also be considered. **Due to limited travel/relocation funds, only applicants currently residing in the US will be considered.** The position is initially for one year with extensions possible based on mutual interest. The position is available immediately; however the exact start date can be negotiated.

The NASA Ames Research Center is located near Mountain View, California, in the heart of Silicon Valley, 10 miles from Stanford University and 40 miles from San Francisco.