Job Title	Information Systems and Modeling Postdoc
Location	Los Alamos, NM, US
Organization Name	A-1/Information Systems and Modeling

What You Will Do

The transport and dispersion team within the Information Systems & Modeling Group (A-1) provides support for a wide variety of government agencies primarily focused on global security. The transport and dispersion team is world renowned for developing and deploying physics based transport and dispersion models that account for complex terrain.   Additionally, we apply our expertise in the field of boundary-layer meteorology and turbulence to wind-energy applications for the New Mexico Small Business Assistance program. The primary purpose of this position is to initially develop a fast 3D wind solver for flow within wind farms based on the technology used in our Quick Urban & Industrial Complex (QUIC) wind solver for wind flow in urban areas. The long term objective is to contribute to the advancement of the state-of-the-art of LANL's dispersion modeling tools.

Responsibilities for this position include, but are not limited to:

·   Primary responsibility will be to develop empirical parameterizations based on experiments and/or high fidelity CFD simulations for an empirical-diagnostic wind solver to account for the wakes of individual wind turbines as well as inter-turbine interactions.
·   Assist in development of QUIC atmospheric transport and dispersion modelling system.

What You Need
Minimum Job Requirements:
·   Demonstrated ability to meet schedule and deliverables for multiple concurrent projects with a range of priorities.
·   Knowledge of fluid mechanics, atmospheric sciences, and/or meteorology.
·   Knowledge of programming in both compiled (Fortran, C++, etc.) and scripted (Python, Matlab, etc.) languages.
·   Excellent interpersonal, oral and written communication skills.
·   Demonstrated ability to interact effectively with others.
·   Demonstrated ability to work independently with minimum supervision, as well as the ability to be an effective member of a multidisciplinary team.

Desired:

·   Familiarity with flow around wind turbines, structures, and/or bluff bodies.
·   Project management training and/or prior experience with planning, executing, and completing complex activities within scope, schedule, and budget.
·   Active DOE L or Q Clearance.

Education: PhD specializing in fluid mechanics, atmospheric sciences, or meteorology preferred.

Additional Details:
Q Clearance: (Position will be cleared to this level). Applicants selected will be subject to a Federal background investigation and must meet eligibility requirements* for access to classified matter.

*Eligibility requirements: To obtain a clearance, an individual must be at least 18 years of age; U.S. citizenship is required except in very limited circumstances. See DOE Order 472.2 for additional information.

New-Employment Drug Test: The Laboratory requires successful applicants to complete a new-employment drug test and maintains a substance abuse policy that includes random drug testing.

Candidates may be considered for a Director's Fellowship and outstanding candidates may be considered for the prestigious Marie Curie, Richard P. Feynman, J. Robert Oppenheimer, or Frederick Reines Fellowships.

For general information to go to Postdoc Program.

Equal Opportunity:
Los Alamos National Laboratory is an equal opportunity employer and supports a diverse and inclusive workforce. All employment practices are based on qualification and merit, without regards to race, color, national origin, ancestry, religion, age, sex, gender identity, sexual orientation or preference, marital status or spousal affiliation, physical or mental disability, medical conditions, pregnancy, status as a protected veteran, genetic information, or citizenship within the limits imposed by federal laws and regulations. The Laboratory is also committed to making our workplace accessible to individuals with disabilities and will provide reasonable accommodations, upon request, for individuals to participate in the application and hiring process. To request such an accommodation, please send an email to applyhelp@lanl.gov or call 1-505-665-4444 option 1.

Where You Will Work

Come join the best and brightest minds in the world at one of the most innovative and creative multidisciplinary research institutions engaged in strategic science on behalf of national security. The work we do at the Los Alamos National Laboratory (LANL) matters to our country and the world.

A-Division is the Laboratory's principal technical division for engagement with the Intelligence Community (IC). A-Division conducts a broad range of analytical, technology development and application, and rapid-response activities in support of the Intelligence Community, Homeland Security, Defense and national emergency response organizations. Core capabilities in the division include: nuclear weapons technology assessment ; electromagnetic technology and applications; systems analysis; specialized technical training for emergency

responders; sensor design and development; development and maintenance of customized, secure information systems; and analysis of export commodities and export-control practices for potential proliferation risks; research in cyber systems and cyber defense. The division groups are spread across multiple Technical Areas, with approximately 150 full-time employees. Its activities present security challenges, spanning unclassified to TS/RD and SCI, and a full-range of safety hazards that must be thoroughly understood and mitigated, working in collaboration with support organizations, to enable effective mission execution.

Please submit your application at the following link:

https://jobszp1.lanl.gov/OA_HTML/RF.jsp?function_id=14330&resp_id=51616&resp_appl_id=800&security_group_id=0&lang_code=US&params=MckUmQNBU-lthYEh-nM95N-HUz4FXyh559q-nXfhcHVATLhV1EKKfMP8X3LGjq5S&oas=uWQMz5GHvSCeJHKrQ7gopw..