

Postdoctoral Fellow Opportunity - Vanderbilt University Medical Center

Job Summary:

The Vanderbilt University Medical Center (VUMC) Aldrich Genetic Epidemiology Lab seeks to recruit a highly motivated, collaborative, and talented postdoctoral fellow with knowledge of genetic epidemiology, biostatistics, or data science. The Aldrich Lab is a cutting-edge computational genetic epidemiology lab dedicated to accelerating discoveries in lung cancer. We focus on racially diverse populations and seek to understand the role of genetic and non-genetic (environmental and social) factors influencing lung cancer. The Aldrich Lab uses large-scale biobanks and national and international observational studies to investigate lung cancer and related phenotypes. Multiple projects utilize high-quality survey data alongside high-dimensional data, including genotyping data, whole genome sequencing, methylation, and RNA sequencing. Key projects are focused on early detection of lung cancer, identification of mechanisms contributing to lung cancer disparities, genetics of immunotherapy response, racial diversity in lung cancer clinical trials, and population genetic modeling. We are particularly interested in candidates from diverse backgrounds who share an interest in health disparities research. The successful candidate will have access to a rich training environment, experienced mentors, a multidisciplinary and collaborative team, and the opportunity to develop methodology and perform innovative analyses across multiple large-scale projects.

Key responsibilities:

- Contribute to the intellectual environment of the lab.
- Independently develop and lead projects.
- Assist with written reports, research grant applications, and articles for publication.
- Assist with visualization of data for manuscripts, grants, and presentations.
- Present at national conferences.
- Provide guidance to graduate and undergraduate students.
- Maintain transparent analysis practices.

Qualifications:

- Ph.D. degree in a relevant field (human genetics, biostatistics, statistics, epidemiology, data science, etc.).
- Computational background required, with experience working with R or python and in a unix/linux environment.
- Demonstrated ability to analyze complex datasets.
- Strong interpersonal and organizational skills, excellent verbal, and written communication skills, plus an enthusiasm for developing collaborative partnerships required.
- Knowledge of complex trait genomics and epidemiologic principles is preferred.
- Experience in multi-level modeling and geospatial analyses desirable.
- The candidate must have a passion for health disparities and for using data to advance healthcare and population health.

We value diverse voices in science and seek to support individuals from all backgrounds. VUMC is an affirmative action/equal opportunity employer.

Interested candidates should send an email inquiry and CV to Dr. Melinda Aldrich, MPH, PhD (melinda.aldrich@vumc.org).