

Postdoctoral in Neuroimaging and Autism

The College of Health Solutions (CHS) at Arizona State University (ASU) is seeking to fill a postdoctoral vacancy in neuroimaging and autism. The candidate will work in the Autism and Brain Aging lab directed by Dr. B. Blair Braden. Please see the Lab's website for more information about current projects (<https://sites.google.com/asu.edu/autismandbrainaginglab/>).

The ideal candidate will have experience in MRI-based neuroimaging and computational techniques for applied research. The primary project will be data analysis for a longitudinal cognitive and brain aging study in autistic adults vs. neurotypical controls. Types of imaging modalities include task-based and resting-state functional MRI, structural T1, diffusion-weighted imaging, and T2 FLAIR.

Responsibilities for this position include managing data organization, implementing ongoing longitudinal imaging analyses, and integrating novel analytic techniques into the lab. The postdoc will also be expected to assist in mentoring a group of graduate and undergraduate students, prepare first-author, peer-reviewed publications, and present results at international conferences. Assisting with participant screening, scheduling, and data collection may also be necessary at times. This position is expected to demonstrate progress towards a K99/R00 application and publish at least 3 manuscripts (1 as lead author) within the first 12 months of position.

At ASU and the College of Health Solutions, we work to maximize opportunities for people from diverse backgrounds, abilities, and perspectives. We value and encourage [inclusive excellence as outlined in our ASU Charter](#) and strive to foster a welcoming and inclusive environment for all faculty, staff, and students — which we believe is critical to our success as a community. All individuals who can strengthen our academic community are encouraged to apply and will be considered without regard to race, color, religion, sex, sexual orientation, gender identity, national origin, disability, protected veteran status, or any other basis protected by law.

About the College of Health Solutions

The College of Health Solutions is committed to translating scientific health research and discovery into practice to improve health outcomes through education, research, and service. We equip students with the knowledge and skills to influence healthier lifestyle choices; develop creative interventions to improve the health of people and populations; analyze and translate large amounts of health data into solutions; and maximize the technology, science, business, and application of diagnostics. Through teaching, academic programs, service and research, all faculty at the College of Health Solutions address one or more of our three major areas of focus: 1) The systems of health care and the health needs of populations; 2) Health and human performance of individuals across the lifespan; 3) Personalized interventions through precision health. Across these areas, we work to address complex and difficult health problems which require transformative collaboration, translational research, and innovation. We are particularly interested in making an impact on populations with significant health disparities.

Our research programs encompass basic science, discovery science, clinical trials, intervention science and measurement of health outcomes. In all cases, our faculty use interdisciplinary approaches to address the complex systems that underpin health problems. We are highly collaborative, transparent and team-oriented. Our innovative organizational structure includes translational teams that move science from labs into communities with evidence-based interventions that make a difference, as well as affinity networks where teams of people work together to improve methodologies and processes. All our programs, in and out of the classroom, are designed with the goal of improving the health of people and communities.

Current training programs include behavioral health, biomedical diagnostics, biomedical informatics, exercise science, health promotion, health sciences, kinesiology, medical studies, nutrition, population health, the science of health care delivery, and speech and hearing science. Our programs are offered at the ASU Downtown Phoenix, Tempe, Polytechnic, West and Lake Havasu campuses, as well as on Mayo Clinic's campus in north Phoenix.

About Arizona State University

Arizona State University is a new model for American higher education, an unprecedented combination of academic excellence, entrepreneurial energy, and broad access. U.S. News & World Report ranks ASU #1 in the U.S. for innovation for nine years in a row. ASU has been named a Hispanic-Serving Institution (HSI) by the U.S. Department of Education, a major milestone in its enterprise-wide commitment to increase the diversity of its student body. ASU is also part of the prestigious Association of American Universities (AAU), which comprises the nation's most elite research universities.

This New American University is a single, unified institution comprising multiple differentiated campuses positively impacting the economic, social, cultural, and environmental health of the communities it serves. Its research is inspired by real world application blurring the boundaries that traditionally separate academic disciplines. ASU serves 144,800 students across all campuses and on-line as of the Fall 2023 semester. ASU champions intellectual and cultural diversity and welcomes students from all fifty states and more than one hundred nations across the globe.

For more information about ASU and the College of Health Solutions, visit <http://about.asu.edu/> and <https://chs.asu.edu>.

Required Qualifications

- Doctorate (e.g., PhD, ScD) in neuroscience, cognitive psychology, speech and hearing, computational neuroscience, bioinformatics, statistics, quantitative methods, or related fields.
- Existing research focus in MRI-based neuroimaging analysis.
- Demonstrated ability to progress towards a K99/R00 application and publish at least 3 manuscripts (1 as lead author) within the first 12 months of position.
- Demonstrated ability to work, collaborate, and communicate effectively with diverse colleagues, community partners, and staff in a multicultural environment.

- Shows support of ASU's commitment to inclusive excellence as outlined in the [ASU charter](#)

Desired Qualifications

- Expertise in functional and structural MRI pre-processing and analysis.
- Expertise in advanced longitudinal, multi-level modeling and multivariate analyses.
- Expertise in machine learning analysis techniques.
- Expertise in neuropsychological assessments.
- Expertise in autism.
- Expertise in cognitive and brain aging.
- Experience with MATLAB (SPM, Conn, xjView, etc.) and freesurfer.
- Experience with programming via Python and R.
- Experience with a variety of statistical packages including SPSS and SAS.
- Background, knowledge, and/or research that could be conducted or relevant to the needs of Arizona's diverse populations.
- Potential for high impact research.
- Evidence of participation in translational, trans-disciplinary, and team science initiatives

Applications and Inquiries

Application deadline is **November 3, 2023**. Applications will continue to be accepted on a rolling basis for a reserve pool. Applications in the reserve pool may then be reviewed in the order in which they were received until the position is filled.

To apply, click <http://apply.interfolio.com/133116> to submit the following:

- A letter of interest including the name of the position for which you are applying, your qualifications and professional experience, and an example(s) of how your work has exemplified [Arizona State University's Charter](#) and its values of Inclusive Excellence
- Research statement
- Curriculum vitae
- Copies of up to three publications
- Information for three professional references (their position, title, e-mail, phone number). References will not be contacted until the candidate progresses to the latter stages of the search process.

Informal inquiries and questions can be directed to Associate Professor B. Blair Braden, bbbraden@asu.edu.

A background check is required for employment. Arizona State University is a VEVRAA Federal Contractor and an Equal Opportunity/Affirmative Action Employer. All qualified applicants will receive consideration for employment without regard to race, color, religion, sex, sexual orientation, gender identity, national origin, disability, protected veteran status, or any other basis protected by law. (See <https://www.asu.edu/aad/manuals/acd/acd401.html> and <https://www.asu.edu/titleIX/>)



In compliance with federal law, ASU prepares an annual report on campus security and fire safety programs and resources. ASU's Annual Security and Fire Safety Report is available online at <https://www.asu.edu/police/PDFs/ASU-Clery-Report.pdf>. You may request a hard copy of the report by contacting the ASU Police Department at 480-965-3456.