Research Analyst – Environmental Remote Sensing and Geoinformatics Lab

Salary Range: $43,290 to $50,000
Job Number 34797BR

Description:
We seek a high-performing, positive, service-oriented individual with excellent attention to detail to work with our diverse faculty and researchers and colleagues across the university as part of the Environmental Remote Sensing and GeoInformatics Lab team at ASU. Housed within the School of Geographical Sciences and Urban Planning, the Environmental Remote Sensing and Geoinformatics Lab undertakes the collection and analyses of remote sensing information (NAIP, Landsat, lidar, drone-derived) generating base data employed by environmental, human-environmental and sustainability units across ASU. These data include land-use/cover at multiple resolutions, among others. Finished products are stored with the Global Institute of Sustainability.

Essential Duties:
Working most closely with the Directors of the Lab, the ideal candidate will meet most if not all of the desired qualifications outlined below and bring a commitment to excellence.

Coordinates the development of data for special management, policy studies and/or research activities.

Analyzes developments in the industry; remains current regarding significant developments and/or initiatives

Designs, coordinates, and conducts research activities and statistical studies

Develops and maintains databases used to generate information for management decision making and evaluation of programs.

Participates on project teams in special studies resulting in recommending solutions or alternatives.

Helps train staff in the use of departmental data processing tools.

Creates and maintains databases utilizing various computer programming languages or user-oriented software.

Utilizes statistical methods to analyze management problems and/or policy implications

Assists evaluators in the development of measurement tools.

Develops, implements, and coordinates efforts to develop large proposals to the federal government

Develops a rapport and credibility with appropriate parties to best facilitate engaging them in substantive research partnerships.

Understands and promotes the research capabilities and interests of the lab in terms of industry needs and national priorities.

Establishes a resource network in the community, the nation, and the international arena to identify and cultivate partners.

Makes recommendations to management, public/private sector representatives, and external constituencies.

Undertake data acquisition and analysis for major contributors to the lab, including the Central Arizona-Phoenix Long-term Ecological program and other current grant supported activities maintaining the lab.

Administering graduate Research Associates assigned to lab-level activities.

Knowledge, Skills and Abilities:
Knowledge of organizational practices. Knowledge of supervisory practices and principles. Skill in organizing work of self and others. Skill in effective communication, both verbal and written.

Working Environment:
The Research Analyst will have a dedicated workspace within the School of Geographical Sciences and Urban Planning, in close-proximity to the offices of the Directors, and other faculty affiliates, postdocs, and students of the center.
Use office equipment including a personal computer
Sit or stand for extended periods of time and walk moderate distances to perform work
Communicate orally and in writing to perform essential functions
Read/interpret written and oral instructions/directions

Minimum Qualifications:

Bachelor's degree in a related field AND three years of experience in research, information analysis or program evaluation; OR, Master's degree in a related field AND one year of experience in research, information analysis or program evaluation; OR, Any equivalent combination of education and/or experience from which comparable knowledge, skills and abilities have been achieved.

Desired Qualifications:

An MA/MS in geography, earth science, ecology, environmental study, geoinformatics, civil engineering, or a related discipline is preferred.

Strong knowledge and experience in Earth Science including Remote Sensing (RS) and Geographic Information Systems (GIS) technologies, Spatial Statistics, Landscape Ecology, Environmental Science, and Coupled Human and Natural Science.

Mastery of digital imagery processing at multiple scales and with a variety of sensors. Required software skills such as using ERDAS, ENVI, eCognition, ArcGIS, and open source GIS and RS software, etc.

Strong modelling and programming skills including use of Python, R, Matlab, SPSS, C/C++, or Interactive Data Language

Ability to arrange multiple projects and manage all types of data source. Deadline and results oriented.

Ability to lead project design, coordinate with other scientists and researchers in data acquisition, proposal writing, and publication of project findings in peer-reviewed science journals. Strong written and oral communication skills are essential.

Experience managing large geospatial data sets or the application of machine learning

Experience with LiDAR, microwave and ortho data analysis, 3D modelling and UAV data collection and processing.

Experience with Google Earth Engine API, and JavaScript Programming

Experience writing competitive research grants.

SGSUP Information:
The School of Geographical Sciences and Urban Planning (SGSUP) is a major participant in the instructional and research activities of Arizona State University. A staff team of ten supports 33 tenure/tenure-track faculty including four members of the National Academy of Sciences, approximately 1,000 undergraduate majors (split between campus and online) and 200 graduate students studying in one of five graduate degree programs (MA and PhD programs in Geography, a PhD in Urban Planning, a Masters in Urban and Environmental Planning and a Master of Advanced Studies in Geographical Information Systems) as well as graduate certificate programs in GIS and transportation. SGSUP has grown quickly in the past year, especially via online enrollment, and more new programs are due to launch on-campus and online in the next two years. More complete school and program information can be found at http://geoplan.asu.edu/

ASU Information:
Arizona State University is a new model for American higher education, an unprecedented combination of academic excellence, entrepreneurial energy and broad access. This New American University is a single, unified institution comprising four 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 more than 90,000 students in metropolitan Phoenix, Arizona, the nation's fifth largest city. ASU champions intellectual and cultural diversity, and welcomes students from all fifty states and more than one hundred nations across the globe.

ASU is a tobacco-free university. For details visit www.asu.edu/tobaccofree

AmeriCorps, Peace Corps, and other national service alumni are encouraged to apply.

Arizona State University is a VEVRAA Federal Contractor and an Equal Opportunity/Affirmative Action Employer. All qualified applicants will be considered without regard to race, color, sex, religion, national origin, disability, protected veteran status, or any other basis protected by law.

Specific Application Direction:
To apply please visit ASU's employment job page and submit a compelling letter of interest explaining why this is the right position for you at this time and how your professional experience will add value to the school. Please also include a detailed resume that clearly illustrates prior knowledge, skills, and experience that meets minimum and desired qualifications. Please also provide full contact information for three professional references. **Deadline for applications is 3:00pm Arizona time on Monday, August 28th.**