



**POSITION DESCRIPTION: Lead Scientist**

**The Changing Landscapes Lab at Conservation Science Partners (CSP, [csp-inc.org](http://csp-inc.org)) is seeking a Lead Scientist passionate about ecology and conservation to provide analytical, technical, project management and client relations leadership as part of a team of conservation biologists, ecologists, and data scientists working to address conservation challenges across the U.S. – including, but not limited to, freshwater systems – and internationally.**

**About:** CSP is a dynamic 501(c)(3) nonprofit established in 2012 to meet the analytical and research needs of diverse stakeholders in achieving conservation and protection of the natural world. Our mission is to apply human ingenuity to the preservation of species, populations, and ecosystems using scientific principles, innovative approaches, and lasting partnerships with conservation practitioners. We connect the best minds in conservation science to solve problems in a way that is comprehensive, flexible, and service-oriented. CSP works in the complex and fast-paced nonprofit realm using tools that include data science and advanced analytics; risk analysis and climate change vulnerability analyses; terrestrial and freshwater species and habitat modeling; and wildlife and ecological connectivity analysis to identify solutions through land and water use, designating protected areas, and advancing social and environmental justice. We are a recognized leader in the development of data, models, and maps to convey the status of and change to natural systems and human impacts on the environment. Core clients and partners include federal agencies, foundations, environmentally progressive businesses, and other non-governmental organizations. Outcomes of projects are designed to explain ecological phenomena and lead to tools, map products, and strategies often tailored to the needs of decision makers.

**Organizational Values and Culture:** Our core values include scientific and technical excellence and integrity, which help to advance the function, direction, and initiatives of the organization. We support and encourage creativity and innovation in practice and products; respectful co-production of knowledge; and connection to the living world. We are actively seeking project opportunities that directly involve Black, Indigenous, and communities of color and diverse international partners, address disparate impacts of environmental change, and support social justice. We welcome the broader complement of knowledge and skills that stem from applicants' professional and life experiences. We seek a candidate with deep curiosity directed toward diverse research interests, as well as aptitude and enthusiasm to develop new skills and areas of expertise.

**Position Description:** We are seeking a Lead Scientist passionate about ecology and conservation to help support and drive the Changing Landscapes Lab at CSP. The Lead Scientist will join a team of ecologists, biologists, and data scientists working to advance conservation and climate adaptation science by accounting for the interacting trajectories of global changes in climates, land use, and biodiversity in socio-ecological systems. Projects involve coordinating with research and management partners in federal, state, local, non-profit, and private sectors to produce more effective conservation, management, and research outputs. In general, Lead Scientists in the Changing Landscapes Lab contribute to and lead a range of projects focused on addressing multiple conservation objectives, including mitigating and adapting to climate change, facilitating ecological connectivity and resilience, restoring and protecting habitat, and promoting human-wildlife coexistence in increasingly modified landscapes. This position will focus initially on large-scale river and floodplain protection and



conservation prioritization efforts in the U.S., conducted in close partnership with our non-profit and university partners. The Lead Scientist should have well-developed problem-solving, statistical, and analytical thinking capabilities and a demonstrated record of applying these skills to ecological research. They should demonstrate attention to reproducibility and quality assurance/quality control in all their work. We are looking for someone with excellent organizational and communication (oral and written) skills who can balance several projects simultaneously. We seek a candidate with deep curiosity directed toward diverse research interests, as well as aptitude and enthusiasm to develop new skills and areas of expertise. It is expected that this position contributes to an internal culture of diversity, equity, inclusion, innovation, creativity, and experimentation, and helps to advance the function, direction, and initiatives of the organization.

### **Core responsibilities and skills.**

Primary responsibilities are expected to include, but not be limited to:

- Contributing to the design, development, and management of multiple projects simultaneously, including both long-term partnerships and short-turnaround projects responding to pressing conservation opportunities, as well as leading or guiding advanced technical steps for these efforts.
- Demonstrated capacity to work in creative collaboration with diverse partners, including core staff, contractors, clients, postdocs, graduate students, and others to ensure research questions, methods, and outcomes are clear, and to support appropriate communication, interpretation, translation, and use of scientific products for multiple audiences, including land managers and policy makers.
- Experience with a range of ecological and environmental data types (e.g., terrestrial/aquatic ecosystem health data, pollutant and other EPA datasets, remote sensing datasets, species detection data) and modeling approaches (e.g., hydrological modeling; ecosystem service modeling; network and/or connectivity analyses; hierarchical regression analyses, potentially in a Bayesian framework) using reproducible workflows developed in statistical programming languages such as R or Python
- Strong familiarity with a variety of spatial datasets, including hydrologic, topographic, land cover and/or climatological datasets, and experience incorporating such datasets into statistical/spatial analyses.
- Knowledge of common Geographic Information System data formats and tools to download, process, map, and export such data. Preparing or deriving GIS and other spatial data layers, including metadata, and tabular data sources for use in modeling, reporting, and planning activities, using a variety of tools and cloud-based platforms (e.g., Google Earth Engine, QGIS, ArcGIS).
- Supervising the activities of one or more staff scientists, postdoctoral scientists, and/or contractors, as appropriate.
- Supporting existing or developing new funding partnerships and revenue streams, helping to sustain this position over the longer term.
- Developing and supporting manuscripts, reports, and professional presentations.
- Learning new methods and software for specific projects, as appropriate.



**Additional desired skills:**

- Research or management experience with river systems (including the biodiversity therein, water quality assessments, conservation and/or restoration strategies, etc.) through field studies, computer modeling, or other applied settings.
- Experience with (or willingness to learn) cloud platforms for data management and high-performance computing (e.g., Google Cloud Services, Microsoft Azure, Google Earth Engine).
- Experience creating user-friendly data visualizations and other syntheses of complex information for multiple end-users via web-based tools (e.g., custom web apps, Tableau, ArcGIS dashboard).
- Experience collaborating with state and/or federal agencies.
- Experience collaborating meaningfully with indigenous or other under-represented communities and non-traditional conservation partners with diverse interests and perspectives.
- Knowledge of federal contracting, reporting systems, and schedules (e.g., grantsolutions, grants.gov, ASAP.gov).

**Required qualifications:** PhD (or equivalent experience) in ecology, conservation biology, or a related field AND a minimum of three years of research or professional experience.

**Application deadline and expected start date:** Priority will be given to complete applications received by **April 10, 2023**, with screening and interviews to begin soon thereafter. The ideal start date is no later than **June 1, 2023**.

**Location:** Flexible within North America, home or office-based, with preference for the Reno-Tahoe region and CSP's Truckee, CA, headquarters.

**Compensation:** The Lead Scientist salary range is \$75,000-\$85,000 depending on experience. We offer a comprehensive group medical, dental, and vision insurance package; retirement benefits; and professional growth and advancement opportunities.

**How to apply:** Please email a cover letter explaining how your goals, skills, and experience fit the core responsibilities of the role and please also describe how your broader knowledge and experiences can contribute to our organizational culture and values. Include the names and contact information of at least three relevant professional references, as well as your CV and a writing sample for which you are the sole or primary author, and send to: [hiring@csp-inc.org](mailto:hiring@csp-inc.org). Your cover letter, reference list, CV, and writing sample should be compiled and sent as a single PDF file. Please indicate **FRESHWATER SCIENTIST** in the subject line. *We sincerely appreciate all those expressing interest in this position. However, only applicants invited for an interview will be contacted.*

*CSP is an equal opportunity employer and does not discriminate on the basis of race, color, national origin, sex, disability, age, religion, sexual orientation, gender identity, gender expression, creed, veteran status, parental status, or marital status in its programs and activities. We recognize that diverse backgrounds, cultures, and experiences can only enrich our community and our conservation mission and goals. As part of our intentional efforts to increase inclusivity, equity, diversity, and justice, we encourage applicants from underrepresented groups in conservation, e.g., those who identify as women or*



*non-binary, LGBTQ+, are people of color, or represent any combination of these and other identities.*