



We are seeking a postdoc at the interface between spatial ecology and geology, supported by our recently awarded NSF grant: *Effects of environmental change on microbial self-organized patterns in Antarctic Lakes*. The candidate will be working as part of the research groups of Xiaoli Dong (Department of Environmental Science and Policy, UC Davis, [xldong@ucdavis.edu](mailto:xldong@ucdavis.edu)) and Dawn Sumner (Department of Earth and Planetary Science, UC Davis, [dysumner@ucdavis.edu](mailto:dysumner@ucdavis.edu)). The project will involve developing numerical models to understand the mechanisms forming the morphology and spatial patterns of microbial communities in lakes. An ideal applicant will have expertise in at least one of these areas: mechanistical spatial modeling of ecological dynamics, computational fluid dynamics, and numerical analysis. The position will be based at UC Davis.

The start date is negotiable, preferably by August 2024. The initial term will be 1 year with extension for up to 1 more year with satisfactory performance. Salary and benefits are competitive:

<https://www.ucop.edu/academic-personnel-programs/files/2023-24/oct-2023-acad-salary-scales/t23.pdf>

**Responsibilities:**

Under the guidance of the PIs, the postdoc will develop and analyze models inspired by spatial ecology to describe the mechanism and dynamics of morphology and spatial patterns formed by benthic microbial communities in Antarctic Lakes to inform our interpretation of ancient stromatolites in the geological records and to improve our understanding about Earth's evolutionary and environmental history.

**How to apply:**

Email a cover letter describing your background and interests in the position, CV, and contact information for 3 references to Xiaoli Dong ([xldong@ucdavis.edu](mailto:xldong@ucdavis.edu)). The position is open until filled.

University of California Davis strives to maintain a diverse and inclusive work environment. All applicants are protected under Federal law from discrimination based on race, color, religion, sex, national origin, disability, age, and genetics. University of California Davis provides reasonable accommodations to applicants with disabilities. Applicants requiring a reasonable accommodation for any part of the application and hiring process should contact the Office of Equity by email at [dmshelp@ucdavis.edu](mailto:dmshelp@ucdavis.edu). Determinations as to granting reasonable accommodations for any applicant will be made on a case-by-case basis.