

Position Announcement:
Forest Ecology Drone Pilot

Position: Summer Forest Ecology Drone Pilot

Employer: University of California, Davis (Latimer Lab, Department of Plant Sciences)

Compensation:

- Approx. \$15/hr – for University of California undergraduate student or spring 2020 graduate
- Approx. \$21/hr – for others, assuming directly relevant professional experience or previous coursework

Duration and employment period: Approx. 150-250 hours (approx. 4-6 weeks total). Flexible commitment level between 25% to 100%; work to be completed between May 1 and Aug 31, 2020.

Location:

- 90%: remote field sites in the mountains of northern California (Duty station: UC Davis, Davis, CA)
- 10%: office (computer lab) at UC Davis

Purpose: The Drone Pilot will support an ecological study of post-wildfire forest recovery by piloting a drone (a consumer-grade quadcopter) to collect imagery from recently burned forest sites.

Job description: The Drone Pilot will be responsible for planning and executing (piloting) drone missions in remote, mountainous, forested terrain. The candidate must be a FAA Part 107 certified UAS pilot. The work will require multiple consecutive days of flights at each study site. Flight plans and mission parameters will be developed in coordination with the position supervisor. The Pilot will also be responsible for managing and organizing collected data, including transferring data to servers in the office. The Pilot will be responsible for filing flight plans and post-flight reports with the UC Drone Safety Office. Depending on interest and skillset, the Pilot may also assist with imagery analysis. The Pilot should expect to conduct most work (including fieldwork) independently, though there will likely be opportunities to coordinate with a vegetation field crew that will be working at the same study sites to collect ground-truth data.

Work location: The duty station will be Davis, CA (UC Davis). While conducting fieldwork, the Drone Pilot will primarily be car camping near the project study sites on National Forests. Camping will usually be “dispersed camping” (undeveloped areas that are adjacent to remote roads and have no facilities) but will occasionally be in campsites (with campsite fees paid by employer). Camping location will change frequently as the Pilot moves to different study areas. The Pilot should expect to work and camp independently, though there will likely be opportunities to coordinate with a vegetation field crew that will be working at the same study sites to collect ground-truthing data.

Work schedule: The work schedule is flexible, though the Pilot is expected to plan data collection campaigns at each site (4-8 days of flights) such that it is only necessary to drive to each site once (barring unforeseen circumstances) in order to minimize driving time and mileage. Field campaigns will begin and end at the duty station in Davis, CA.

Transportation: The Pilot will be expected to drive their personal vehicle to field sites. The vehicle must be in good repair for traveling on moderately rough backcountry roads. The Pilot will be reimbursed at the UC personal vehicle reimbursement rate (currently \$0.58/mile), computed from the duty station (Davis, CA). Total driving for the project is roughly estimated at 2500 miles. In the event a personal vehicle is not available, it may be possible to use a UC Davis fleet vehicle.

Minimum qualifications

- FAA Part 107 certified Remote Pilot
- Experience piloting a drone to collect aerial imagery from mountainous field sites
- Experience hiking and camping in remote locations with no facilities
- Bachelor's degree or equivalent experience in (or current undergraduate student in) a natural science field
- Strong quantitative and organizational skills
- Experience using GIS and/or other geospatial software
- Attention to detail
- Ability to work independently
- Valid driver's license
- Experience operating a vehicle on rough roads

Desired qualifications

- Skilled navigating on- and off-trail using topographic maps, compass, and handheld GPS units
- Excellent organizational skills for planning, data management, and equipment management
- Ability to maintain a positive attitude in physically demanding and/or uncomfortable conditions
- CPR and Wilderness First Aid certified (certification may be accomplished after job offer is made, with registration cost paid by the employer)
- Enthusiasm for the type of work to be conducted

Application due date: Feb. 3, 2020

To apply: Send a cover letter, CV/resume, and contact information for three references (including name, organization, phone, email, and relationship to you) to Dr. Derek Young at djyoung@ucdavis.edu using the subject line "Forest Ecology Drone Pilot Application". Please combine all application materials into one PDF for submission. Applicants will be notified if they have been selected for an interview by Feb. 12, 2020.

Thank you for your interest!