





**Two PhD positions at** <u>Universidad de Castilla - La Mancha (uclm.es)</u>. ETSIAMB, Albacete Campus (<u>Agrónomos | Montes | ETSIAM | Albacete (uclm.es)</u>)

# Ecological restoration of wildfire affected forest: Short and longterm post-fire management effects on Forest multifunctionality after wildfires.

## Funding call:

- Proyectos de Generación de Conocimiento 2021 (<u>Proyectos de Generación de Conocimiento</u> 2021 | Agencia Estatal de Investigación (aei.gob.es))

 Proyectos estratégicos orientados transición ecológica y transición digital 2021 (<u>«Proyectos</u> <u>Estratégicos Orientados a la Transición Ecológica y a la Transición Digital» 2021 | Agencia</u> <u>Estatal de Investigación (aei.gob.es)</u>)

#### Summary:

The main objective of this project is to evaluate the effects of fire and different postfire management strategies on plant diversity, soil properties, and multiple ecosystem functions (nutrient cycling, climate regulation, waste decomposition, symbiosis, wood production and water regulation) in the short- and medium-term in climatically different forest ecosystems (semiarid and subhumid Mediterranean climate). A nearby unaffected wildfire area (UB), chosen as the reference system, provided baseline values of forest structure, properties, and general indicators of forest functions in unburned forest. Secondly, we aim to develop a multifunctionality index, based on forest ecosystem's structure and forest functions indicators to inform forest managers, society, politicians and policymakers about the effectiveness and efficacy of post-fire restoration techniques in Mediterranean areas. The proposed project will draw together political and scientific attention to massively scale up restoration of fire affected areas from successful pilot initiatives to areas of millions of hectares. This information is critical for understanding not only forest recovery after a given disturbance but also the role of different postfire management strategies to recover the forest structure, properties, and functions in wildfire-affected forests.

#### What are you going to do:

You will be based in Albacete city (Spain) and responsible for carrying out fieldwork in our field experiments (different parts of the Iberian Peninsula). You will count with the help of the ECOFOR research group (Grupos de Investigación : (uclm.es)). You will be responsible of analyzing the resulting data of the project, as well as existing data from related projects previously developed at the ECOFOR group. Finally and at the beginning of the work, you have to enroll in the PhD program named as Doctorado en Ciencias Agrarias y Ambientales (uclm.es) with the aim of become doctor at Castilla La Mancha University at the end of the projects.

## What do you have to offer

- A máster in Forestry, Ecology, Soil Science, or Environmental Sciences, or related.
- A thorough understanding of the topic of the selected positions.
- Experience in GIS analysis (e.g. Arcgis, Qgis, gvsig).
- Experience in analysis and interpretation of experimental data, including statistical analyses of large and complex datasets.
- Excellent computational, analytical and statistical skills, including proficiency in the use of programming languages such as R.
- Good written and spoken English.
- Effective interpersonal skills and ability to work with colleagues at all levels and doing fieldwork.
- Car driving license.

# Our offer

We offer 2 positions (37.5 hours per week). The first one is a 2-year position whereas the second one is 3-year. Salary will be according to Castilla La Mancha University rules.

The planned starting date is 1 January 2023.

#### How to apply

Send your CV (including publication record, and contact details of 2 referees) to: Manuel Esteban Lucas Borja (<u>manuelesteban.lucas@uclm.es</u>) or Jorge de las Heras (<u>jorge.heras@uclm.es</u>)

Deadline: 15 November 2022