

Call for Applications: Two PhD Theses in Paludiculture and Sustainable Peatland Management

The mission of the Leibniz Centre for Agricultural Landscape Research (ZALF), as a nationally and internationally active research institute, is to deliver solutions for an ecologically, economically, and socially sustainable agriculture – together with society. ZALF is a member of the Leibniz Association and is located in Müncheberg, Germany (approx. 35 minutes by regional train from Berlin-Lichtenberg). The institute also maintains locations in Dedelow and Paulinenaue. The working group Sustainable Land Use in Developing Countries (SusLAND) focuses on analysing land-use and landscape systems in emerging and developing countries and developing interdisciplinary strategies to address challenges related to climate change adaptation, food security, land-use conflicts and rural livelihoods.

Peatlands are vital ecosystems that provide essential services for climate regulation, biodiversity conservation, and water management. They store about twice the carbon content of the Earth's forest biomass, provide unique habitats for species, minimize flood risk, and ensure safe drinking water. Despite their importance, peatlands are facing rapid degradation due to land use change, pollution and climate change. In Rwanda, peatlands are estimated to cover approximately 1,288 km², with around 46 % currently drained and degraded. Key drivers of peatland degradation include drainage for agriculture, peat extraction, and infrastructure development. These pressures not only undermine critical ecosystem services but also threaten the livelihoods of local communities who depend on peatlands for essential resources, including water availability and food security.

Paludiculture for Climate and Livelihoods in Rwanda (PaCLiR) is a research project that analyses which forms of paludiculture can create opportunities to support peatland ecosystems while delivering benefits for people and the climate. The project brings together scientific partners, policy actors, cooperatives, private-sector stakeholders, and women's and youth groups to co-design viable paludiculture value chains that contribute to sustainable peatland management and climate-resilient development in Rwanda. PaCLiR is implemented under the "Sustainable peatland management for people, climate and biodiversity" (Peat4People) initiative, funded by the German Federal Ministry for Economic Cooperation and Development (BMZ). Peat4People is jointly implemented by Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) GmbH, the Michael Succow Foundation (MSF) and the Food and Agriculture Organization of the United Nations (FAO). The initiative aims to enhance knowledge on tropical peatlands, strengthen technical capacities and promote sustainable peatland management.

Possible research questions:

- › What institutional, socio-economic, and environmental factors influence the successful adoption of paludiculture practices and sustainable value chains in Rwanda?
- › How can paludiculture-based eco-packaging products be scaled in Rwanda by aligning market demand, consumer preferences, plastic-reduction policies, and agricultural PES mechanisms to support early adoption and economic viability?
- › How do governance structures and participatory planning processes influence the adoption of paludiculture and sustainable peatland management?

PaCLiR offers supervision for two local PhD theses in close collaboration with universities in Rwanda. The PhD research will be fully integrated into the PaCLiR project and jointly supervised by Rwandan universities and the Leibniz Centre for Agricultural Landscape Research (ZALF).

Your responsibilities include:

- Development of a PhD research design aligned with project components on paludiculture value chains and/or sustainable landscape governance
- Design and implementation of field-based data collection (surveys, interviews, participatory workshops) in the project demonstration site
- Analysis of paludiculture products, and cooperative business models
- Contribution to the co-development and pilot testing of cooperative business plans and financing concepts
- Interpretation of results and preparation of scientific publications, policy briefs and applied project outputs
- Active participation in stakeholder dialogues, workshops and national policy exchange activities

Your qualifications

- Residence in Rwanda (mandatory)
- Completed Master's degree in a relevant field (e.g. agribusiness, agricultural economics, social sciences, environmental studies, development studies, circular economy)
- Strong academic or professional interest in peatlands, paludiculture or sustainable land-use systems
- Ability to conduct independent field research
- Very good command of English and Kinyarwanda

We offer

- Financial support for PhD research within the PaCLiR project
- Support for fieldwork, data collection and research activities in Rwanda
- International research exchange with ZALF (Germany), including support for travel and subsistence during research stays
- Joint academic supervision by ZALF, the University of Rwanda, and other universities in Rwanda
- Access to interdisciplinary training in paludiculture, value-chain analysis, and participatory research methods
- Opportunities to contribute to scientific publications and policy-relevant outputs

Application

Please send your application as one PDF file (max. 5 MB) including:

- Motivation letter (1 page)
- CV (max. 3 pages)
- Degree certificates or proof of enrolment
- Short research interest note (2 pages)

Applications should be sent to: **Fatima.Lehnhardt@zalf.de**

Women and youth are particularly encouraged to apply. Applications from persons with disabilities with equal qualifications are expressly welcomed.

Personal data will be processed in accordance with Articles 5 and 6 of the EU GDPR solely for the purpose of the application procedure and deleted after six months.