Postdoctoral Position in Phylogenomics: Disentangling the Phylogeny and Evolution of Chemical Diversity in Willows

Workplace: Institute of Entomology, Biology Centre, Czech Academy of Sciences
Employment relationship: Employment contract
Job type: Post-doctoral Researcher
Duration: 1.1. 2021 – 30.11 2023, Fixed-term
Job status: Full-time

Job description:
We are looking for an enthusiastic postdoctoral researcher (max. seven years after obtaining a PhD degree) experienced in bioinformatics and phylogenomics to join our projects exploring plant-herbivore interactions and evolution of host-plant defences in willows. Using a series of complementary approaches, we aim at showing how chemical diversity in plants arises through biotic and abiotic pressures. Our studies combine field components, manipulative green-house experiments, with metabolomics and phylogenomics. The successful candidate will use WGS and RAD-seq data to reconstruct phylogenies of willow species from Europe and North America to dissect their evolution in response to the pressure of insect herbivory and abiotic factors. We expect the candidate to have an excellent background in bioinformatics and programming that will be required for developing a pipeline for handling the genomics data from both diploid and polyploid willow species. We also offer an opportunity to join our projects on the evolution of other plant genera, such as Ficus, Macaranga, and Syzygium.

Requirements:
• a PhD degree
• advanced skills in bioinformatics (polyploid and diploid genome assembly, RAD-locus contig assembly), phylogenomics, and programming (R, python, bash)
• a deep interest in the ecology of insects or plants
• fluency in spoken and written English
• an ability to work independently
• international experience (at least two years spent outside the Czech Republic within the last three years)

Benefits:
• 5 weeks of holiday
• Friendly international working environment
• Subsidized lunch
Other comments:
The successful applicant will join the Laboratory of Evolutionary Ecology led by Dr. Martin Volf at the Institute of Entomology, Biology Center of the Czech Academy of Sciences in Ceske Budejovice (Czech Republic). The project offers an opportunity to conduct the laboratory work in the Czech Republic and abroad, within a collaborative network of our colleagues from Europe and overseas. The Department of Ecology, where our laboratory is based, is a diverse, international team (11 nationalities) studying ecology, evolution and biogeography, and a world-class centre for interaction network research with regular publications in leading journals. The Laboratory of Evolutionary Ecology is a new perspective team successful in fundraising and with a good publication record.

The deadline for applications is August 5th 2020. Duration of the job contract is fixed (Jan 2021 – Nov 2023). Applicants from all countries are eligible. To apply, please send a CV including your publication record, contact details for three references, a copy of your PhD diploma, and a cover letter stating qualifications, previous work and motivation to Dr. Martin Volf (volf@entu.cas.cz) where you can also send any queries.

Additional information:
Institute of Entomology: https://www.entu.cas.cz/en/homepage/