



Position

Teacher-Researcher

Institution

University Polytechnic Centre of Tenkodogo, University Ouaga 2 Laboratory of Biology and Plant Ecology, University Joseph Ki-Zerbo

Country

Burkina Faso

Education

PhD, Botany and Phytoecology on Biodiversity and Functional Plant Ecology, University Ouaga I Pr Joseph Ki-Zerbo, Burkina Faso, 2018,

Mentor

Dr. Blandine Marie Ivette Nacoulma, Teacher-Researcher, University Joseph Ki-Zerbo, Adjunct Professor, University of California Davis

Research Area

Biodiversity and Plant Functional Ecology of Savannah Ecosystems

Issouf Zerbo

2019 One Planet Laureate Candidate

Born in Tougan, Issouf Zerbo studied in his hometown throughout his primary and secondary education. Tougan is located in the Boucle du Mouhoun region considered to be the granary of Burkina Faso. He obtained his Baccalaureate D in Dédougou, the city closest to Tougan.

Like all the children in the region, Zerbo helped his farming parents every day in the plantations and looking after the pasture. He became interested in these rural activities in his first year of sixth form.

In addition, the adolescent Zerbo noted the increasing scarcity of rainfall as well as the spectacular transformation of the vegetation. This is one of the reasons why he chose to study Biology at university. He already knew that he wanted to be a scientist.

"I remember perfectly the day when at University, as a new undergraduate, I told my classmates that I wanted to be a teacher-researcher. They all laughed." Unlike his classmates, some of whom dropped out of university, even in their first year, "I continued to cherish my dream by giving myself every chance to achieve it, by validating my diplomas with honours," he says with pride.

His full career at the University of Ouagadougou is linear: A bachelor's degree in Biological Sciences (2008), then a master's in Plant Biology and Physiology (2009).

His Diploma of Advanced Studies (DEA - Diplôme d'études approfondies) in Plant Biology and Ecology focused on the impact of climate change on the diversity and productivity of pastures (2011).

In the year of his DEA, he was given two scholarships: the Burkinabé state scholarship and the German GTZ scholarship.

Next, he followed up with a doctorate in Botany and Phytoecology on Biodiversity and Functional Plant Ecology (2018) for which he had his academic scholarship from the Burkinabé state and the scholarship from the German research foundation (DFG: Deutsche Forschungsgemeinschaft).

A Teacher-Researcher at the University Polytechnic Centre of Tenkodogo and at the Plant Biology and Ecology Laboratory at the University Joseph Ki-Zerbo in Ouagadougou, his research area is biodiversity, biology and plant ecology.

His research subject focuses on functional diversity and the impact of the climate, land use and different types of habitat on the responses of savannah vegetation.

This is because in recent decades, prediction models have forecasted drastic changes to the vegetation in West Africa. Research on the conservation of over-exploited plants by local populations in times of famine is of particular interest to him.

Therefore, he wants to develop innovative and resilient agroforestry and agroecological practices to strengthen the adaptation of smallholders to climate change through effective techniques for the conservation of substitute food plants used during lean periods in West Africa.

As part of his involvement in species conservation techniques, he works with rural communities made up of men and women of different age groups.

Zerbo aspires to become a full Professor. His career goals are as follows. First, establish leadership in his field. Second, obtain funding to enable effective participation in the training of young scientists. Third, find solutions that can help local populations adapt to the harmful effects of climate change.

He was informed of the existence of the One Planet Fellowship initiative by the RUFORUM Site and by fellow researchers from the Plant Biology and Ecology Laboratory.

Zerbo's research focuses on the conservation of plants that are overexploited during the famine. Thus, he is developing innovative and resilient agroforestry and agroecological practices to strengthen smallholder adaptation to climate change through effective conservation.

His career goals as well as the improvement of research work can be achieved thanks to the lessons from the programme developed within the framework of the One Planet Scholarship, more specifically personal development (leadership), the scientific skills to lead a team, widen his address book of professionals and get in touch with partners in order to facilitate project financing.

In terms of his institution, according to Zerbo, the One Planet scholarship will influence the sharing of knowledge with colleagues, in particular young researchers, and will increase the institution's reputation. While within the community, the research results and techniques put in place will enable local populations to adapt effectively to climate change and achieve food self-sufficiency.

Zerbo deplores the lack of honest collaboration between French-speaking African research organizations, which represents an obstacle to the development of science on the continent.

Issouf Zerbo is one of the growing number of candidates selected to participate in the One Planet Fellowship. The One Planet Fellowship is a career development initiative that is building a robust pipeline of highly connected, inter-generational scientists equipped to use a gender lens to help Africa's smallholder farmers cope with climate change. The One Planet Fellowship is funded by the Bill & Melinda Gates Foundation, the BNP Paribas Foundation, the European Union and Canada's International Development Research Centre (IDRC). African Women in Agricultural Research and Development (AWARD) and Agropolis Fondation are jointly implementing the Fellowship.

Do you have any further questions? Send an email to : oneplanet.award@cgiar.org