Research Project

Project RUBIS (Agropolis) RUbber agroforestry Breeding Initiative for Smallholders

Website

https://www.rubis-project.org

Objectives

Conversion of agroforests into monospecific rubber plantation has enabled an increase of production at the expense of the regulating ecosystem services provided by agroforests. Conventional breeding programs are devoted to monospecific system. Researchers are confronted to biological and environmental constraints such as the long-term breeding cycle for perennial crops, and the adaptation to accelerating climate change.

The ambition of the project is to contribute to the adaptation to global change of Indonesian rubber smallholders. In that respect, the project aims at developing a participatory breeding process in Indonesia to design resilient rubber cropping systems for smallholders adapted to fast-changing socioeconomic and environmental conditions. An existing scientific consortium on plant genetics and breeding is being strengthened by integrating socio-economics and agroforestry experts to survey and model the evolution of agro-systems as well as to breed for rubber-based agroforestry systems. A participatory approach with all stakeholders will guarantee the co-construction of solutions and will facilitate the future support of national and local authorities by funding replanting programme with climate-smart packages for smallholders.

Duration

Jan 2022 – Dec 2023

Leader

Pascal Montoro (Cirad Leader, AGAPInstitut, BURST Team)

Involvement of PhenoMEn's Team (Denis FABRE & Raphael PEREZ)

Geographical Dimension

Indonesia

Partners

CIRAD-IRRI (Indonesian Rubber Research Institute)-UGM (Universitas Gadjah Mada)

Funding

Agropolis Foundation

Keywords

Rubber-Agroforestry, perennial crops, climate change, resilience, smallholders, cropping system.