



## A support platform for participatory science and research

Principle investigator: Pascale FREY-KLETT, UMR Interactions Arbres/Micro-organismes (IAM)

LabEx partners: Annick BRUN-JACOB, UMR Interactions Arbres/Micro-organismes (IAM)

**Context** — Faced with the growing demand of many citizens to be actors of science and knowledge production processes, academic research must mobilize and support the development of "research in a different way" conducted with and for citizens, with the same scientific rigor and the same quality and ethical requirements as traditional research. Thanks to the Tous Chercheurs laboratory in Nancy, under the joint supervision of INRAE and the University of Lorraine, we have the opportunity to take up this challenge. This laboratory is equipped like a real research laboratory but designed to welcome the public. We develop participatory science and research according to a new approach: citizens and researchers share their knowledge, jointly formulate research questions, experiment in the laboratory with real research equipment, produce, analyze and interpret their results together. Citizens trained in the scientific process are thus full-fledged actors in research. The CiTIQUE participatory research program, which relies on the Tous Chercheurs laboratory in Nancy, has enabled us to validate the concept of this "research in a different way" and we now wish to embark on an ambitious project to create a pilot platform to support the development of participatory research projects carried out with and for citizens (general public, professionals, companies, associations, students, elected officials).

**Objectives** — This platform should make it possible to (i) create a pool of citizen-researchers trained in the research process, and (ii) catalyze and incubate joint research projects at the interface between academic laboratories/civil society/companies.

**Approaches** — The creation of a pool of citizen-researchers requires the deployment of a strategy on two levels: training young researchers in the transmission of the research process to non-scientists, and setting up research internships allowing non-scientists, especially students, to learn this process by doing. This step is a prerequisite for developing quality co-investigations on new issues by capitalizing on the pedagogy, resources and skills of the Tous Chercheurs laboratory in Nancy.

**Key highlights** —

- The recognition of the Tous Chercheurs platform under construction is reflected on the one hand by a strong involvement in the project "Science with and for society" labeled by the Ministry of Higher Education and Research in 2022 (Tous Chercheurs is one of the three components of this project), and on the other hand by a support in the framework of the program of investment of the future Excellence carried by the University, winner in 2022.
- The CiTIQUE participatory research program carried out by INRAE and the Labex ARBRE in partnership with the Tous Chercheurs laboratory in Nancy, the CPIE of Nancy-Champenoux, the University of Lorraine and ANSES, received the participatory research prize from the Ministry of Higher Education and Research at the 2022 International Agricultural Show.
- Two new projects for the expansion of the concept of a support platform for participatory science and research are being considered/constructed in the Grand Est
- Three new participatory research projects are supported by the platform (two on varietal selection and one on soil drought mechanisms in forests)
- 15 doctoral students and post-docs have been trained in the transmission of the research process to non-scientific audiences since 2018
- 860 students from grade 6ème to grade terminal, but also 119 citizens from 10 to 73 years old, were welcomed for research internships at the Tous Chercheurs laboratory in Nancy since 2018

**Perspectives** — The year 2023 will be devoted to the construction of the future platform with a reflection to be carried out with the future supervisory authorities on the choice of the most suitable administrative structure.

**Valorization** —

- Durand J., Carravieri I., Lecomte P., Frey-Klett P., Brun-Jacob A., (2022) CiTIQUE : producing scientific quality-grade results with citizen on ticks in an open laboratory, Sfe<sup>2</sup> GfÖ EEF joint meeting, International Conference on Ecological Science, Metz, 24 Novembre 2022
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- Durand J., Carravieri I., Lecomte P., Frey-Klett P., Brun-Jacob A., (2022) CiTIQUE : analyse de tiques piqueuses de chiens et chats par des citoyens dans un laboratoire ouvert, Réunion annuelle du groupe Tiques et Maladies à Tiques, Nancy, 22 Mars 2022
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- Brun-Jacob A. (2022) Tous Chercheurs, des laboratoires de recherche ouverts aux publics, Réunion du Conseil Scientifique d'Institut de l'Institut des Sciences Biologiques du CNRS, 21 Mars 2022
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- Durand J., Carravieri I., Marchand J., Galley C., Cappizzi S., Vourc'h G., Frey-Klett P., Brun-Jacob A., (2021) Working with citizens to monitor tick-associated risk: lessons learned from the CiTIQUE project, European Wildlife Disease Association Network meeting, On-Line, August 30 2021

**Leveraging effect of the project** — This project is part of the "Des Hommes et des Arbres" project, a winner of the "Territoire d'innovation" program of the French government, which is co-financed by the Metropole du Grand Nancy. It also made it possible to obtain financial support from the Grand Est Region and the Ministry of Higher Education and Research (SAPS label).