

Partnership AGROECOLOGY Concepts and Methods Symposium held in Brussels

The Horizon Europe co-funded European Partnership AGROECOLOGY brings together 72 partner institutions from 26 countries. The Department of Agroecology leads work package 7 '*Expanding the Capacities of Living Labs and Research Infrastructures*'. AGRO, on November 21 and 22, together with the Thünen Institute and University of Liege organized a symposium with the title '*Exploring methods for researching shifts in knowledge production for agroecology transition*'. The European Commission's Department for Agriculture and Rural development (DG-AGRI) as well as Agriculture and Agri-Food Canada (AAFC) took part in the symposium, which saw 20 contributions from leading research institutions in 9 European countries. AGRO contributed with 4 speakers.

The symposium aimed to advance on the conceptual and methodological groundings that guide research and interventions for agroecology transition. As such, it was a step towards developing the partnership's methodological toolbox. The focus on *shifts in knowledge production for agroecology transition* refers to a key proposition of Partnership AGROECOLOGY and related Horizon Europe agri-food missions and partnerships: that agroecology transition may be accelerated by means of co-created open innovation in living labs and decentralized research infrastructures, with agricultural knowledge and innovation systems (AKIS) playing major roles. The proposition implies the restructuring of centralized research models, into user-centered models, whereby farmer's and local communities' roles as sources of knowledge are strengthened. This represents a potential knowledge production shift, and perhaps even a paradigmatic shift in research.

Research based on co-creation and the recognition of farmers knowledge has for long been associated with participatory (action) research, for which widely used concepts and methods exist. However, the addition of a 'living labs, research infrastructures and AKIS in an agroecology transition context mix' represents new levels of complexity, for which concepts and methods are only just emerging.

The symposium:

Symposia allow for focused interactions on specialized themes, with targeted speakers and audiences. Contributions and discussions covered three major themes:

- Research paradigms, related to AKIS, living labs and research infrastructures, and shifts in knowledge production associated with agroecology transition
- Linkages between AKIS actors and the role of AKIS in accelerating agroecology transition
- Addressing barriers and levers to agroecology transition across Europe's diversity

Proceedings and Outcomes:

Most of the symposium's 18 contributions were from research institutions outside of the partnership. This served to provide useful external perspectives on the internal research initiatives and the conceptual development processes in the Partnership, as well as on approaches to monitoring, and to science-policy activities.

While several concrete frameworks and methods for addressing challenges associated with the themes were presented, the pervasiveness, as a relatively uniting and fundamental framework, of the Gliessman 'agroecology transition-transformation levels' combined with the High Level Panel of Experts (HLPE) agroecology principles framework was evident. This framework also informs the Agroecology Partnership

However, the need to critically advance on the utility and the interpretations of that framework also became evident in discussions on fundamental conceptual issues. In particular, the tendency to perceive the Gliessman levels as linear, neat categories, rather than overlapping and fluid ones, was noted. Likewise, the 'many things to many people' nature of the HLPE principles, were seen as a weakness. Here, specific attention was drawn to the risks of diluting the agroecology concept through cooptation of participatory and transformational principles.

Transdisciplinary methods, often embedded in social-ecological frameworks, also characterized the approaches that were presented. Likewise, attention was paid to co-creation and (actionable) knowledge generation, as processes for strengthening AKIS actors towards agroecology transition. However, arriving at conceptual frameworks that cover shifts in knowledge production with the idea of infrastructural AKIS as a central ingredient was seen as particularly challenging:

AKIS was seen as a problematic concept for several reasons: On the one hand, AKIS actors such as advisers may, in countries where AKIS is well integrated with underpinning regulatory frameworks, act as intermediaries between farmers and authorities in the pursuit of transition measures. On the other hand, it was argued that AKIS' take many forms across Europe that may be difficult to pin down and which are, from a political economy of knowledge perspective, not neutral sets of actors. The latter has bearings on the types of agricultures that different forms of AKIS may support, including the values embedded in these. In this light, it appeared that 'micro-AKIS' as hybrid or non-mainstream forms of innovation, need to be considered in any conceptualizations of AKIS for agroecology transition.

In a similar vein, attention was drawn to need for understanding farmer's agency as innovation actors in AKIS, particular as regards living labs, where room for maneuver for innovation on practices that go beyond incremental, substitutional changes in conventional farming practice, tend to be limited by severe structural constraints. This angle resonated with a concern, amongst the symposium participants, with the ability of relatively narrow technology experimentation innovation models, to contribute to higher levels of agroecology transition and transformation, and the need for conceptual approaches to consider this problematic.

Conclusions and Next steps:

The symposium highlighted the conceptual challenges, particularly 'what is missing' conceptually, for understanding enablers and barriers with respect to the partnership's knowledge production shift endeavor. While no grand unifying concept emerged, this was a first step towards advancing towards nuanced and refined concepts that may guide interventions towards agroecology transition.