



Innovative Approach to New SDG Metrics for Agri-food Innovation

A Collective Action within Key Focus Area (KFA) 4: *Demonstrating Impact and Improving Investments*

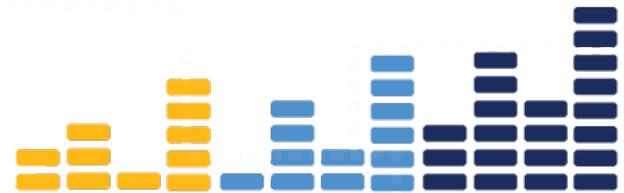
Agriculture is at a crossroads. The advent of the Sustainable Development Goals (SDGs) creates expectations that our agriculture and food systems will deliver effectively towards the multiple facets of development. Achieving global food and nutritional security remains our charge; but eliminating poverty, empowering women, making production and consumption sustainable, and dealing with the threats posed by climate change, are all interwoven into that goal. We strive to ensure no-one is left behind by development, but when 70% of the world's poor live in rural areas, it is an exacting challenge.

For decades, our agricultural research and innovation systems have been based largely on productive inputs and productivity returns alone. While productivity and cheap food have been a key driver of urban development and should in principle make food more accessible to the poor, direct input:output measures are short-term and transient. They do not consider the long-term cost and value of sustaining the system and its environmental, socio-cultural and nutritional impacts.

The net result has been that the drive for productivity tonnage alone has led to a trend towards extensive monocultures and to unsustainable, resource-depleting systems. Short-term economic production drivers favour bulk carbohydrates that are readily produced, stored and transported, rather than nutritious and diverse foods. While this

provides food availability, it also leads to many perverse effects, such as the chronic rise of obesity and non-communicable diseases such as diabetes, the healthcare cost of which now outweighs the value of agricultural production in some countries.

There are few good tools developed, let alone implemented, for measuring the true long-term cost and true value of agricultural systems and how agri-food innovations can contribute in a wider context. Our reliance on single metrics creates linear thinking and conventional solutions.



There are currently very poor measures for the real and long-term value of agriculture that:

- benefits women's economic empowerment
- helps reduce carbon emissions or captures carbon in soils
- reduces soil erosion, water resource depletion or deforestation
- educates young people or creates viable economic opportunity that avoids outmigration
- enables farmers to change their entire farming system to one more profitable for themselves
- sustains diversity of production systems and food quality
- reduces use of pesticides
- specifically benefits the poorest consumers

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Moreover, the complex realities of agriculture and rural development mean that one is seldom examining only one dimension of sustainable development. So as well as better metrics, these dimensions need to be examined in parallel to determine impacts in complex systems.



What we will do together

There are already many useful elements and existing studies that can be brought together among the Partners in GFAR, e.g. the Climate Smart Agriculture Compliance measures, the Women’s Empowerment in Agriculture Index, Science-Based Initiatives in the Caribbean, studies of the Economics of Ecosystems and Biodiversity for Agriculture and Food (TEEBAgriFood), the work of IFPRI and the CGIAR-ISPC Standing Panel on Impact Assessment on Research Impacts. The FAO Statistics Department coordinates agricultural

indicators of SDG impacts. The World Agriculture Watch (WAW) initiative is developing common methods and tools to map the diversity of farm types, compare the impacts of different forms of agriculture and document the importance of family farms in regard to the SDGs.

The programme will build on that developed through discussions on this theme at GCARD3. By considering the different dimensions of agriculture and rural development and their socio-cultural and environmental contexts, the indicators and tools being developed for the SDGs relating to agriculture and food, and the initiatives being taken by a range of funding and implementation organizations, this Collective Action aims to bring together, cross-compare and develop new metrics, both quantitative and qualitative. The framework created will allow for simple but robust determination and open documentation of impacts of agri-food innovation, aligned with delivery of the 17 SDGs.

The outcomes will be a greater ability to analyse any innovations against the 17 SDGs, as a common basis for mutual accountability in delivery, and a reinforced collective value system as GFAR. Indicators will need to be grounded in local realities and can be addressed on multiple scales.

You are invited to join Partners in GFAR including IFPRI, CGIAR-ISPC Standing Panel on Impact Assessment on Research Impacts, FAO, TEEBAgriFood, World Rural Forum, COPROFAM, FORAGRO, Barli Rural Development Institute, Committee on Sustainability Assessment and World Agriculture Watch in GFAR’s Collective Action *Innovative Approach to New SDG Metrics for Agri-food Innovation.*

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