European Commission Initiative for a legal framework for plants obtained by targeted mutagenesis and cisgenesis and for their food and feed products based on the findings of a Commission study on new genomic techniques.

FEEDBACK

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POLLINIS calls upon the EU Commission to:

1. Apply the precautionary principle to new genomic techniques and its products;
2. Maintain the current EU GMO legislation for all new genomic techniques and resulting products;

The EC must respect the ruling of the European Court of Justice (C-528/16) and enforce the Directive 2001/18/EC for new genomic techniques and its products. All new GMOs have to remain subject to environmental and food safety risk assessments and to traceability and labelling requirements, in accordance with the precautionary principle.

1. The precautionary principle (the Principle 15 of the Rio Declaration on Environment and Development) must be applied when addressing new and emerging gene editing techniques, including gene editing and gene drive. As for any European policy on the environment, regulation on new and emerging genomic techniques should be based on the precautionary principle and guarantee a high level of protection as stated in Article 191(2) of the Treaty on the functioning of the European Union. New and emerging gene editing techniques cannot be an exception.

“Plants obtained by targeted mutagenesis and cisgenesis can have the same risk profile as plants produced with conventional breeding”: this is incorrect. There is documented evidence of unintended changes that can lead to multiple other so-called unintended genetic modifications. Off-target modification of genes, production of novel aberrant proteins, accidental insertion of DNA at target sites, incomplete knock-outs of target sequences, genetic and chromosomal rearrangements, translocations, insertions and deletions, chromothripsis as well as erroneous DNA repair have all been documented and may impact food, feed and environmental safety.
A risk assessment has to establish the safety of each single new gene modified plant before it gets an EU market authorisation. It has to remain process-based, accompanied by a trait-based risk assessment, and carried out in accordance with the precautionary principle.

2. The current EU legislative framework for GMO is still fit for purpose, particularly for risk assessment and issues related to detection and identification. Directive 2001/18/EC was amended in 2018 so it could adapt to technical progress, as well as experiences gained in environmental risk assessment of GM plants. Moreover, 2001/18/EC allows for sufficient flexibility, in the case of environmental risk assessment it underlines that it should be done case-by-case basis understanding the actual type of GMO, its purpose and potential receiving environment.

3. Quick techno-fixes like pesticide tolerant varieties, drought resistant plants through new genomic techniques, including gene editing and gene drive, to achieve more resilient and sustainable agriculture offer solutions that ignore the real causes of these complex issues like biodiversity conservation, food security and increasing agricultural output. These problems are complex and multi-layered. We must understand better the root problems of these complex issues and re-pivot our focus to changing our current agricultural practices.

In this discussion surrounding risks is a constant asymmetry of risks versus benefits. There is a continuous promise of social benefits, including pest resistant plants; drought resistant plants; “de-extinction wildlife”, which so far has been far from delivered. This asymmetry sees benefits as future expectations and risk merely as hypothetical.

We must re-shift issues and re-define the current way of asking questions beyond quick fixes. It is time to take responsibility and analyse the current root causes of problems. We call upon the Commission to focus on holistic solutions that are already available and have shown their capacity to support the objectives of the Green Deal: organic and agroecological farming.