



## Genetic Technology (Precision Breeding) Bill Briefing for Report Stage in the House of Lords 24 January 2023

The Consortium for Labelling for the Environment, Animal welfare, and Regenerative farming (C.L.E.A.R), Friends of the Earth (England Wales and Northern Ireland), The Landworkers' Alliance, Organic Farmers & Growers, The Organic Research Centre, The Soil Association and GM Freeze all have deep concerns about the Genetic Technology Bill, including:

- The bill does not provide the traceability and independent safety checks that are needed to protect our food, our farms and the natural environment when any form of genetic modification – including what the bill calls “precision breeding” – is used. The process by which a genetic change occurs has a huge influence on what can go wrong and all genetic engineering techniques can result in errors. The genome is more like an ecosystem than a code-book and even very small changes such as point mutations that can have far-reaching impacts.
- As currently drafted, the bill allows the insertion of “foreign” genes and sequences that override natural controls over a precision bred organism’s own genes.
- The bill removes our existing right to choose, ignoring citizens’ consistently expressed desire for robust regulation and the retention of clear labelling of all genetically engineered foods.
- The bill will create significant divergence between England and all three devolved nations of the UK, as well as with the European Union and many other territories. It is likely to disrupt trade and could constitute a breach of the non-regression clauses of the UK/EU Trade and Cooperation Agreement.
- The bill falls far short of fulfilling the Government’s stated commitment to protecting animal welfare, and risks further entrenching a system of intensive food production which has detrimental consequences for biodiversity.
- The bill text is poorly drafted and introduces significant legal ambiguity. Key elements of the regulatory regime are left for secondary legislation, and there are few checks or balances to either ensure that risks are mitigated or prevent the regression of environmental and safety standards.

We ask peers to **SUPPORT**, among others, **Amendment 12** to improve transparency around the release of precision bred organisms and **Amendment 6** that recognises the key role of regulatory sequences of DNA.

We also asks peers to vote **AGAINST Amendment 4** which would broaden the range of GMOs that could be classified as “precision bred organisms”.

These amendments will not resolve all of our concerns with the bill so we also ask peers to vote **AGAINST** the bill as a whole, regardless of the fate of the amendments that we support.

Contact address: 80 Cyprus Street, Stretford, Manchester, M32 8BE  
Tel: 0845 217 8992 Email: [Liz@gmfreeze.org](mailto:Liz@gmfreeze.org) Web: [www.gmfreeze.org](http://www.gmfreeze.org)

Twitter: @GMFreeze Facebook: /GMFreezeUK

Registered office: GM Freeze, c/o Slade & Cooper Ltd, Beehive Mill, Jersey St, Ancoats, Manchester, M4 6JG

**Why we support [Amendment 12](#), proposed by Baroness Bennett of Manor Castle, to improve transparency around the release of precision bred organisms.**

We are disappointed not to see amendments supporting labelling of precision bred organisms. As we have detailed in previous briefings<sup>1</sup>, Responses to [Defra's 2021 Consultation on the Regulation of Genetic Technologies](#)<sup>2</sup> and several research studies since<sup>3</sup> have demonstrated clear support for retaining existing mandatory labelling at the point of purchase.

In addition to supporting consumers' clear and strongly expressed desire to choose food that has been produced in ways that reflect their values and concerns, labelling at the point of purchase is an essential tool for tracking the impact of releasing novel organisms. Labelling allows consumers to close the traceability loop, facilitating the swift investigation of any novel allergies, sensitivities or other suspected impacts of the use of genetic engineering in their food. Indeed, if developers are so convinced that nothing can go wrong it is hard to see why they do not want consumers to play their part in proving that this is the case.

Amendment 12 will not give consumers what they have asked for but it will give those who are most concerned about this issue the facility to proactively seek information about their food. It will also give farmers, food producers, retailers and others who may wish to create and protect a supply chain free of genetically engineered organisms (including, but not limited to, the organic sector) access to key information.

Amendment 12 also ensures that developers carry out whole genome sequencing – a basic check to ensure that the only genetic changes that have occurred are those that were intended. The transparency provided by a detailed public register that identifies individual genetic engineering events and the affected organisms is also an essential tool in building public confidence in the application of this new technology to the food chain. Without the ability to track any unexpected outcome or unintended consequence to the particular precision bred organism responsible, an isolated unfortunate event could lead to wholesale public rejection of technology.

**Why we support [Government Amendment 6](#) that recognises the key role of regulatory sequences of DNA**

Debate on the Genetic Technology Bill has revealed significant confusion<sup>4</sup> among Parliamentarians (including Ministers) about the role of exogenous genetic material ("foreign DNA") in "precision breeding". Clause 1(6), page 2, lines 3-5 of the current bill text allows the deliberate and stable insertion into the target organism's genome of "foreign DNA" that can control and influence the expression of a wide range of genes with complex, and often unexpected, results. This amendment removes that provision. The Minister describes Amendment 6 as consequential on other amendments relating to the term "natural transformation" but we consider that Amendment 6 would improve the bill regardless of the fate of those other amendments.

In the event that Amendment 6 is not accepted by peers, we would also support Amendment 7, proposed by Lord Krebs. This amendment proposes a smaller change to the bill but one that would somewhat tighten the circumstances under which the stable insertion of exogenous genetic material is allowed within a "precision bred organism".

**Why we oppose [Amendment 4](#) proposed by Lord Krebs, to broaden the range of GMOs that could be classified as “precision bred organisms”**

The Government’s explanation of the intent behind the Genetic Technology Bill has consistently focused on the idea that certain types of genetic manipulation are equivalent to those that can occur in nature (or through the use of interventions which are exempt from genetic modification regulations in recognition of a long history of safe use). This approach lacks scientific rigour because the method by which a genetic change is generated has a significant impact on what else may have been changed along the way. In addition, no limit is given for the period of time or number of generations over which such a hypothetical event “could have” occurred.

Amendment 4 compounds this problem by adding the words “in principle” such that a genetically engineered organism may be deemed “precision bred” if it “could, *in principle*, have resulted from” a less invasive process. The rich diversity of life on earth demonstrates that almost anything *can* happen and this amendment would make it easier for those with a vested interest to argue that plants and animals subjected to unprecedented and highly disruptive genetic changes should be released into the environment and the food chain without proper safety checks.

In addition, we support and encourage peers to vote in favour of:

- [Amendment 1](#) to remove animals from the scope of the bill.
- Amendments [13](#), [14](#), [15](#), [16](#), 17, 18, [24](#), [25](#) and [26](#) to increase the level scrutiny by requiring that regulations made under the provisions of this bill are subject to the affirmative procedure.
- [Amendment 28](#) to delay the commencement of other provisions in the bill until there has been further consideration of uncertainties and research priorities relevant to the bill.

Liz O’Neill  
GM Freeze  
[liz@gmfreeze.org](mailto:liz@gmfreeze.org)  
07811 211 404

Gareth Morgan  
Soil Association  
[gmorgan@soilassociation.org](mailto:gmorgan@soilassociation.org)

Charlotte Bickler  
The Organic Research Centre  
Charlotte Bickler  
[charlotte.b@organicresearchcentre.com](mailto:charlotte.b@organicresearchcentre.com)

Steven Jacobs  
Organic Farmers & Growers  
[steven@ofgorganic.org](mailto:steven@ofgorganic.org)

Jyoti Fernandes MBE  
The Landworkers’ Alliance  
[jyoti.fernandes@landworkersalliance.org.uk](mailto:jyoti.fernandes@landworkersalliance.org.uk)

Kierra Box  
Friends of the Earth  
(England, Wales and Northern Ireland)  
[kierra.box@foe.co.uk](mailto:kierra.box@foe.co.uk)

Fidelity Weston  
CLEAR  
[romshed@weald.co.uk](mailto:romshed@weald.co.uk)

## ABOUT THE SIGNATORIES

[The Consortium for Labelling for the Environment, Animal welfare, and Regenerative farming \(C.L.E.A.R\)](#) is a diverse range of 45 farming, food and civil society organisations and businesses with expertise in animal welfare, agroecological, environmental, social and consumer interests.

[Friends of the Earth \(England Wales and Northern Ireland\)](#) exists to create a just world where people and nature thrive.

[The Landworkers' Alliance](#) is a grassroots union representing farmers, growers and land-based workers.

[Organic Farmers & Growers](#) were the first UK organic certification body to be approved by the Government and now certify more than half of UK organic land.

[The Organic Research Centre](#) is the UK's leading independent research organisation for agroecological farming approaches, working to deliver the transition to naturally healthy and resilient farming systems.

[The Soil Association](#) is the charity that digs deeper to transform the way we eat, farm and care for the natural environment.

[GM Freeze](#) is the UK umbrella campaign for a responsible, fair and sustainable food system, focused on concerns around the use of genetic engineering in food and farming.

## REFERENCES

---

<sup>1</sup> GM Freeze, Soil Association and Friends of the Earth briefing for Lords Committee stage of the Genetic Technology Bill, December 2022 <https://www.gmfreeze.org/publications/genetic-technology-bill-lords-committee-stage-joint-briefing/>

<sup>2</sup> Defra Summary of responses to a consultation on the regulation of genetic technologies, September 2021 [https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment\\_data/file/1021309/genetic-technologies-regulation-summary-of-responses.pdf](https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/1021309/genetic-technologies-regulation-summary-of-responses.pdf)

<sup>3</sup> See, for example:

The Food Standards Agency's (FSA) *Consumer perceptions of genome edited food* study, July 2021

<https://www.food.gov.uk/research/behaviour-and-perception/consumer-perceptions-of-genome-edited-food>

The first phase of the FSA's ongoing social research project:

<https://www.food.gov.uk/sites/default/files/media/document/FSA.FSS-Precision%20Breeding%20Report%20.pdf>

The Nuffield Council on Bioethics, BBSRC and Sciencewise Public Dialogue on genome editing and farmed animals, October 2022, Executive Summary, downloaded from <https://www.nuffieldbioethics.org/publications/public-dialogue-on-genome-editing-and-farmed-animals-2>

<sup>4</sup> See, for example:

[https://hansard.parliament.uk/lords/2022-12-14/debates/318A724E-A72B-402F-A144-9989FA6B087B/GeneticTechnology\(PrecisionBreeding\)Bill](https://hansard.parliament.uk/lords/2022-12-14/debates/318A724E-A72B-402F-A144-9989FA6B087B/GeneticTechnology(PrecisionBreeding)Bill)

and

[https://hansard.parliament.uk/lords/2022-12-12/debates/AE904A12-2F68-4992-8BCE-AF885A45DE8B/GeneticTechnology\(PrecisionBreeding\)Bill#contribution-6F48656A-7DC1-4A3E-BE25-9D459F54D45B](https://hansard.parliament.uk/lords/2022-12-12/debates/AE904A12-2F68-4992-8BCE-AF885A45DE8B/GeneticTechnology(PrecisionBreeding)Bill#contribution-6F48656A-7DC1-4A3E-BE25-9D459F54D45B)