RSB – ROUNDTABLE ON SUSTAINABLE BIOMATERIALS

RSB Proactive guidance on
RSB-STD-01-001 Principles & Criteria:

CLAIMS FOR NON-GMO USE IN CULTIVATION

(PRINCIPLE 11)

Approved

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1. OBJECTIVE

The objective of this guidance is to define requirements and claims for operators who wish to demonstrate that for the cultivation of biomass no genetically modified species were used. This guidance does not cover claims for products being free of GMO but it does cover claims that no GMO were used for the cultivation of the biomass.

2. BACKGROUND

RSB Criterion 11b requires:

The technologies used in operations including genetically modified: plants, micro-organisms, and algae, shall minimize the risk of damages to environment and people, and improve environmental and/or social performance over the long term.

Certified operators who do not use genetically modified species for cultivation may want to make a specific claim stating that no GMO species were used. This guidance specifies the requirements that need to be complied with in order to make those claims.

3. TERMS AND DEFINITIONS

Genetically modified organism (GMO) means any living organism that possesses a novel combination of genetic material obtained through the use of modern biotechnology;

Living organism means any biological entity capable of transferring and replicating genetic material, including sterile organisms, viruses and viroids;

Modern biotechnology means the application of

a) in vitro nucleic acid techniques, including recombinant deoxyribonucleic acid (DNA) and direct injection of nucleic acid into cells or organelles, or

b) fusion of cells beyond the taxonomic family

that overcome natural physiological reproductive or recombination barriers and that are not techniques used in traditional breeding and selection;

(Source: Adapted from the Cartagena Protocol on Biosafety to the Convention on Biological Diversity, 2000)

Note: Please see further examples of genetic modification in Annex I as well as examples for techniques that are not considered to result in genetic modification in Annex II.

4. REQUIREMENTS

4.1 Requirements for biomass cultivation

The following requirement shall be applicable to agricultural and forestry operations:

The operator shall implement a system that ensures that no genetically engineered seed stock, vegetative propagation materials (for example cuttings) and no other genetically modified organisms are used intentionally in the scope of certification, including at least the following activities:

- The operator shall ensure that no incoming seed stock and, or vegetative propagation material (e.g. cuttings using in clonal forestry) to be used within the scope of certification does contain any GMO.

  Please note: In the EU, this can be documented, for example, by the absence of a label in accordance with Directive 98/95/EC on seed documents / declarations

- The operator shall implement practices to prevent any carry-over of GMO used in other operations, such as a periodic assessment if GMO cultivation or GMO experimental releases are taking place in the immediate vicinity of the fields and if this is affecting the operator`s own crops and, if applicable, whether the necessary cultivation distances are met.

- The operator shall implement appropriate training systems for relevant staff.

4.2 Requirements for traceability and claims

The following requirements shall be applicable to all types of operators (i.e. biomass cultivation, processing and trade):

The operator shall implement one of following traceability systems as described in RSB-STD-20-001 RSB Standard for Traceability or RSB-STD-11-001-20-001 RSB EU RED Standard for Traceability to track material with the additional claim “no GMO used for cultivation”:

a) Identity preserved

b) Product segregation

The following requirements apply to operators using an identify preserved chain of custody system:

- Document each batch of “no GMO used for cultivation”- material in each internal processing step included in your RSB certification scope separately

- Do not mix a batch of “no GMO used for cultivation”-material tracked under this system with a batch of “no GMO used for cultivation” material from a different place of origin or a batch of products that does not meet this characteristic

For operators using a product segregation chain of custody system the following requirements apply:

- Document “no GMO used for cultivation” separately from products that do not meet this characteristic.
- Keep “no GMO used for cultivation” material physically separate from products that do not have this characteristic.

The operator shall not refer to the product being non-GMO or free of GMO or use a claim that could be interpreted by the customer as a product being non-GMO.

Please note: A product-related claim implies that the product is free of GMO. This would require robust testing protocols and risk management procedures along the entire chain of custody which are not in the scope of this guidance.

The operator may use a claim that refers to the cultivation of the biomass, for example:

“Our corn growers do not plant bioengineered seeds”

“We do not use seeds that were produced using modern biotechnology”

ANNEX I TECHNIQUES OF GENETIC MODIFICATION

Techniques of genetic modification are, *inter alia*

(1) recombinant nucleic acid techniques involving the formation of new combinations of genetic material by the insertion of nucleic acid molecules produced by whatever means outside an organism, into any virus, bacterial plasmid or other vector system and their incorporation into a host organism in which they do not naturally occur but in which they are capable of continued propagation;

(2) techniques involving the direct introduction into an organism of heritable material prepared outside the organism including micro-injection, macro-injection and micro-encapsulation;

(3) cell fusion (including protoplast fusion) or hybridisation techniques where live cells with new combinations of heritable genetic material are formed through the fusion of two or more cells by means of methods that do not occur naturally.

ANNEX II TECHNIQUES NOT CONSIDERED TO RESULT IN GENETIC MODIFICATION

(1) in vitro fertilisation,

(2) natural processes such as: conjugation, transduction, transformation,

(3) polyploidy induction

(4) use of markers (biochemical and molecular), marker-assisted selection and marker-assisted breeding

(5) cloning techniques, including macropropagation (e.g. cuttings) and micropropagation (tissue and cell culture *in-vitro* techniques)