

CULTIVATED PLANT DIVERSITY - a description

assembled by the Dachverband für Kulturpflanzen- und Nutztiervielfalt e.V.

published on the international day for biodiversity on 22 May 2023

This description of cultivated plant diversity is supported by actors who work voluntarily or professionally in the field of traditional varietal diversity of vegetables, fruits, cereals and other cultivated plants.

We share the conviction that traditional cultivated plant diversity is a fundamental condition for agrobiodiversity, seed sovereignty and food security, and that varieties are a cultural commons because they originate from farmers' work.

Our objectives

- Preservation, development and enlargement of a broad diversity of varieties of cultivated plants in the various regions of the world and this especially in the area of food crops.
- Dynamic, evolutionary on-farm processes of seed multiplication of vegetables and cereals, in which the plants can continuously adapt to regional conditions and to ecosystemic changes
- Regional diversity of fruit varieties, allowing a wide range of flowering and harvesting times, uses, storage properties and flavours, as well as ecological regulation of harmful organisms
- Independence and self-sufficiency of the various regions of the world in terms of the availability of traditional seeds and plants in sufficient quantity and quality.

Our vision

A diversity of cultivated plant species and varieties as well as diversified, decentralised and community-based approaches to conservation and cultivation are indispensable for sustainable, crisis-proof food systems. Circular economy based on local seeds not only secures food, but also promotes local markets and social cohesion.

Inseparable from a broad cultivated plant diversity based on local varieties is the work of the many people who pursue it, as well as the expertise they apply, enlarge and pass on by networking with each other.

The work of seed savers serves the common good, not only today, but also in the long term. We believe that this important work needs to be recognised, valued and actively promoted by society and policy-makers, and we want to see this promotion in the form of concrete measures.

Our approach

We work with "traditional diversity varieties", which we define as follows:

Varieties and cultivars of cereals, fruits and vegetables and other cultivated plants that

1. have resulted from traditional, non-biotechnological breeding methods, and
2. are well suited for cultivation in extensive agro-ecological systems, and
3. can be propagated true to type via seed using traditional artisanal methods (vegetables), or
4. have a broad genetic intravarietal diversity as populations and evolve on farm and continuously adapt to local conditions (cereals and vegetables), or
5. contribute to intervarietal diversity as clonal varieties or as self-pollinators (fruit, potatoes, certain vegetables).

They can contribute to varietal diversity as regional varieties.

Not only old but also newly bred varieties, if they meet the above criteria, are diversity varieties.

We understand the term "traditional" in this context as the connection between past, present and future in seed multiplication, on farm development processes, seed exchange and trade as well as in the transfer of knowledge and experience.

In our understanding, traditional diversity varieties are not only genetic raw material for plant breeding, but rather the basis for regional diversity, as well as for adaptability and continuous development processes of cultivated plants.

Diversity varieties, which due to their genetic range can adapt both spontaneously and in the long term to regional site conditions and climatic changes, form an important basis for crisis-proof and sustainable food systems.

The conservation of cultivated plant genetic diversity in seed banks (ex situ) is necessary, but it does not have the same value as on-farm cultivation and marketing of diversity products. We speak of "living diversity".

Inseparable from this living diversity are both the actors and the necessary technical knowledge. It is precisely the personal commitment of the seed savers, the professional and human exchange between them and the sharing of their knowledge that make their seeds and plants a cultural asset and heritage of humanity.

According to our understanding, genetically uniform industrial varieties created in central breeding facilities far away from the agricultural context cannot meet the indispensable requirements for sustainable and crisis-proof crop diversity:

- Genetic inter- and intravarietal diversity,
- Continuous and progressive ecosystemic processes of evolution,
- Conservation, development and transfer of knowledge and practical experience.

Our demands on politics

Cultivated plant diversity cannot be sustained by seed companies and seed banks alone. It is precisely the small farms, associations and individual actors specialised in on-farm conservation that play an important role in the conservation, development and enlargement of traditional crop diversity.

We have concrete ideas on how this sector should be promoted and see the following major issues:

- **Guaranteed right to seed:** Seed sovereignty and autonomy of the world's regions is the best foundation for broad, developable and sustainable cultivated plant diversity. Article 19 of UNDROP provides a comprehensive description of the right to seed. The obligations set out in this article must be fulfilled by all UN member states so that independent farmers' seed systems, organic plant breeding initiatives, diversity networks and individual seed savers in developed and developing countries can make their contribution to cultivated plant diversity without hindrance.
- **Exemption from regulations:** The services of companies and associations for nature conservation, popular education and plant breeding are recognised as being of public benefit. Legal and administrative requirements for seed marketing and plant health, which are primarily intended to apply to industry and trade, can be a major impediment to the conservation of diversity and the distribution of small quantities of seed and planting material. Therefore, specialised small farms, associations and individual actors involved in on-farm conservation of traditional cultivated plant diversity need to be exempted from regulations.
- **Financial support:** In the conservation of traditional cultivated plant diversity, there are situations where economic livelihoods cannot be achieved through the sale of seeds and planting material of diversity varieties or through services related to diversity. The breeding of new varieties that are freely accessible and not protected by property rights, and the propagation of seeds that are not primarily commercial, need support from public funds so that those active in these areas can make a living.

Political declarations of intent and agreements at EU level and worldwide

- ITPGRFA: International Seed Treaty, which recognises farmers' contribution to cultivated plant diversity and states and defines their right to seed
- UNDROP: Article 19 on the right to seed (as well as the substantively linked Articles 5, 11, 15, 16, 18, 20, 25 and 26)
- Green Deal: Farm-to-Fork Strategie, point 2.1. and Biodiversity Strategy point 2.2.2. with reference to traditional, locally adapted varieties