

February 2017



**Food and Agriculture
Organization of the
United Nations**



The International Treaty
**ON PLANT GENETIC RESOURCES
FOR FOOD AND AGRICULTURE**

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**INTERNATIONAL TREATY ON PLANT GENETIC RESOURCES
FOR FOOD AND AGRICULTURE**

**SIXTH MEETING OF THE *AD-HOC* OPEN-ENDED WORKING GROUP TO
ENHANCE THE FUNCTIONING OF THE MULTILATERAL SYSTEM**

Rome, Italy, 14–17 March 2017

**CONSIDERATION OF ISSUES REGARDING GENETIC INFORMATION
ASSOCIATED WITH MATERIAL ACCESSED FROM THE MULTILATERAL
SYSTEM: NOTE BY THE CO-CHAIRS**

Note by the Secretary

At its Sixth Session, the Governing Body requested the Working Group “to consider the issues regarding genetic information associated with the material accessed from the Multilateral System” (Resolution 1/2015). The Working Group, at its fifth meeting, had an initial exchange of views on this matter and requested preparation of an information document for its next meeting.

The Co-chairs prepared this note to facilitate discussion of the matter at the sixth meeting of the Working Group. The note gives a brief overview of related discussions in other fora and suggests further activities in preparation for the Seventh Session of the Governing Body.

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SYSTEM: NOTE BY THE CO-CHAIRS**

Bert Visser and Javad Mozafari

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Mandate and Process

1. The Governing Body requested the *Ad Hoc* Open-ended Working Group to Enhance the Functioning of the Multilateral System (Working Group), among other matters, to consider the issues regarding genetic information associated with the material accessed from the Multilateral System.¹ In order to make the topic more understandable to all Contracting Parties of the Treaty and to stakeholders, the Friends of the Co-chairs on the scope of the Multilateral System have recently suggested that the Working Group propose the organization of a special event at the next session of the Governing Body on digital sequence information for plant genetic resources, and possible implications for the Treaty.² Pending the deliberations of the Working Group on this matter, the Secretariat has organized a side event on this topic for this sixth meeting of the Working Group, on Wednesday, 15 March 2017, at lunch time.

Considerations

2. Recent technological developments may in the near future provide the opportunity for actors developing products based on or containing plant genetic resources to develop such products by only using Genetic Sequence Data (GSD) rather than by accessing plant genetic resources whether or not in combination with genetic sequence data. The access to many GSD is normally free from access and benefit-sharing related obligations.

3. In the Sixth Session of the Governing Body, the Secretary of the Treaty and others raised the issue of the potential impact of the use of genetic sequence data not linked to access to the genetic material from which the genetic sequence data are derived. The Co-chairs of the Working Group believe this issue is also of relevance for the discussions in the Governing Body of the Treaty, in particular when predicting sustainable income to the Benefit-sharing Fund.

4. Related discussions have emerged in other relevant platforms. The Co-chairs refer to efforts currently undertaken in the framework of the WHO Pandemic Influenza Preparedness (PIP) framework, in which a technical working group (TWG) has addressed the features of a GSD sharing system that could promote the rapid, timely, and systematic sharing of GSD as well as fair and equitable sharing of benefits generated using GSD. The TWG was requested to identify the optimal characteristics and best practices of a GSD sharing system aligned with the objectives of the framework. A detailed overview is provided in the paper “Best process to handle genetic sequence data from influenza viruses with human pandemic potential (ivpp gsd) under the pip framework”³ and in the report “Optimal characteristics of an influenza genetic sequence data sharing system under the PIP framework”⁴. The report was developed from July 2015 to May 2016 and included consultation with WHO Member States and stakeholders. It was preceded by a survey conducted in July 2015 in order to better understand how GSD of influenza viruses are

¹ <http://www.fao.org/3/a-mo938e.pdf>, Appendix A, page 2.

² <http://www.fao.org/3/a-br411e.pdf>, para. 14

³ http://www.who.int/influenza/pip/advisory_group/gsdoptionspaper_revised.pdf

⁴ http://www.who.int/influenza/pip/advisory_group/twg_doc.pdf?ua=1

generated, shared and used by the WHO network of laboratories, academia, public health institutions and industry.

5. In addition, the Convention on Biological Diversity addressed the issue of GSD in the context of synthetic biology at its last Conference of the Parties (CoP) held in Cancun, Mexico, in December 2016. The CoP recognized the importance of addressing the matter in the framework of the Convention in a timely manner and decided to consider any potential implications of the use of digital sequence information on genetic resources for the three objectives of the Convention, thus including benefit-sharing. The CoP requested a fact-finding and scoping study to clarify terminology and concepts (some State Parties followed the terminology “digital sequence information on genetic resources” while others referred to “genetic information” or “information arising from genetic resources”), and to assess the extent and the terms and conditions of the use of GSD. The CoP also established an *ad hoc* technical working group (AHTEG) to consider, among other matters, the technical scope, and legal and scientific implications of existing terminology, as well as to identify the different types of GSD that are relevant to the Convention and the Nagoya Protocol.⁵

6. The FAO Commission on Genetic Resources for Food and Agriculture in its recent sixteenth meeting in January 2017 established a new work stream on “digital sequence information on GRFA” within its Multi-year Programme of Work. The Commission requested an exploratory fact-finding scoping study on “digital sequence information on GRFA” to provide information on, among others, the actors involved and the types and extent of uses such as: characterization; breeding and genetic improvement; conservation; identification of GRFA in order to facilitate future consideration by the Commission of the implications of the use of “digital sequence information on GRFA” for the conservation and sustainable use of GRFA, including exchange, access and the fair and equitable sharing of the benefits arising from their use.⁶

7. The generation and publication of GSD obtained from plant genetic resources for food and agriculture accessed from the Multilateral System in open source public databases (below referred to as “PGRFA GSD”) will become increasingly common. It is in line with often set conditions by funding agencies and scientific journals alike. Publication of PGRFA GSD in open source public databases has become the norm. It is relevant to note that the Standard Material Transfer Agreement is silent on this practice.

8. Third parties can access the PGRFA GSD freely, and use the information to adapt their own genetic resources (including commercial varieties) and create new traits by technological means based on the information obtained from the public databases. This implies that (1) it is not known which (natural or legal) persons use PGRFA GSD; and (2) that under current conditions such use does not generate any benefit-sharing obligations and no contract needs to be signed to obtain access to the relevant PGRFA GSD. Therefore, these technological developments impact on the benefit-sharing arrangements which are part of several international instruments, including the International Treaty.

Relation to the Subscription System

9. At this time, the Governing Body is seeking to enhance the functioning of the Multilateral System, and in this context, the feasibility of a subscription system is being considered, in particular in the work of the Working Group. If in future such a subscription system would be adopted, the consequences of the use of PGRFA GSD in further product development by third parties would be much easier to manage. Since the subscriber gains access to plant genetic resources for food and agriculture (of a given crop) in the Multilateral System, and pays a benefit-

⁵ <https://www.cbd.int/doc/decisions/cop-13/cop-13-dec-16-en.pdf>

⁶ <http://www.fao.org/fileadmin/templates/nr/documents/CGRFA/CGRFA-16/ms565.pdf>

sharing fee over all its products, it is no longer relevant how such new end-products would have been developed and if PGRFA GSD would have been used for such purpose.

10. The Co-chairs believe that any further policy development on this issue within the International Treaty would benefit from a co-ordinated approach with these other international processes.

11. The other international processes (CBD, FAO Commission, WHO) have one common feature, that is, they have highlighted the need to find out more about the actual use of GSD. The other processes are seeking the inputs of qualified experts. In that respect, further studies, subject to the availability of financial resources, could be undertaken in order to explore policy-relevant issues and inform the Governing Body. Those studies should be customized to the International Treaty by taking into account its overall policy direction, which is to favour multilateral solutions in order to lower transaction costs. In addition, the Working Group may wish to request the Secretariat, subject to the availability of financial resources, to organize expert meetings, including joint expert meetings with the other international processes, as well as to promote other forms of knowledge generation, exchange of views and study of policy options.

12. Future policy may include various options, including options to monitor and control the use of PGRFA GSD, as well as the option, taking into account the expected costs and benefits, that monitoring the use of PGRFA GSD should not be undertaken.