Webinar report:
"Role of IPLCs and associated TK in the DSI debate"
Wednesday, 12 May at 12h CET

## I. Introduction

The webinar was to inform how databanks secure the rights of IPLCs (Indigenous Peoples and Local Communities) on their TK (traditional knowledge). In this webinar, some concrete examples of plant and animal GR (genetic resource) of IPLCs where related DSI (Digital Sequence Information on Genetic Resources) is in databanks were presented. Scientific reasons to work with traditional breeds and varieties were discussed. The webinar was aimed at clarifying which are the (legal) rights of IPLCs on TK with a focus on ensuring benefit sharing. Further, it was discussed how databanks could secure rights IPLCs on their TK and which benefit-sharing concepts may be developed. The informal exchange among the panellists took place between Christian Tiambo, Jane Anderson and Jennifer Tauli Corpuz. This report summarizes the input of the panellists and the following discussion. The recording of this webinar can be found on the website of the ABS Initiative: https://www.abs-biotrade.info/topics/specific-issues/dsi/#c4665 .

## II. Presentations

**Pierre du Plessis:** *Issues raised by DSI on GR for the rights of IPLCs to their TK associated with GR*

Du Plessis initiated the webinar explaining the fundamental rights of IPLCs. IPLCs have recognized rights to their territories, resources and knowledge. These rights are widely recognized nationally and internationally, e.g., through the Nagoya Protocol (NP) or the Convention on Biological Diversity (CBD). More precisely, IPLCs have the right to grant or refuse the exploitation of GR or TK and in case of commercial utilization, they own the right to benefit fairly from the utilization. The global recognition of these legal foundations is crucial in safeguarding biodiversity. The ABS model aims to secure these rights.

Du Plessis further elaborated that genetic sequences leave the traditional ABS model. Sequencing has become cheaper and easier whereby it is very probable all GRs worldwide will

be sequenced at some point and will be shared on open-access databases. This can create different types of problems. For example, DSI can be used to identify “embodied aTK” to the extent that these are genetically encoded. Currently, the databases have no provision or technical capacity for recording aTK or even resist efforts to add this related information. Additionally, most ABS laws do not apply to DSI. Therefore, a growing problem arises where ABS contracts is not part of the databases. Commercial products are rather done by third parties and not the initial researcher. Thus, TK runs the risk of becoming invisible and DSI can be used to bypass ABS regulations. In Du Plessis's opinion, a multilateral system for DSI benefit-sharing would be the best option.

**Shakeel Bhatti** *on behalf of WIPO (World Intellectual Property Organisation)*

Bhatti introduced the work of WIPO and presented its extensive work program on GR and TK. In his opinion, DSI is a pure information good and therefore it is an intellectual property (IP) issue and part of ABS. WIPO conducts training and capacity building sessions especially for IPLCs as well as seminars about new technologies on DSI in the context of IP with a view to creating a space and facilitating the exchange of ideas. Further, WIPO maintains an online database of ABS contracts that regulate DSI in an ABS context. The TK Division runs an international training programme on IP and GR. The TK Division runs an international training program on IP and GR and support and innovation as well as a learning course on DSI and GR in life sciences for IPLCs.

## II. Perspectives

**Christian Tiambo** *from the Centre for Tropical Livestock Genetics and Health (CTLGH) based at strategic alliance of the international livestock research institute (ILRI), Nairobi, scientific working on genomics and ABS officer, improvement of cattle and chicken breeding*

Tiambo introduced the scientific work of ILRI. The institute aims to improve people's lives in developing countries through livestock health and breeding. He highlighted the particular successes in genomic research, which accelerated breeding in breeding strategies. However, Tiambo emphasized that access to genomic resources highly depends on partners. His most important partners are the local communities as they provide the GR in the form of their livestock. ILRI aims to continuously inform scientists about the conditions of benefit-sharing and what is their duty when their research is completed or the data is being published; and, how to bring back knowledge to the communities. He continued that TK as a part of metadata plays an important role in genomic research because TK is the reason why this genetic information was conserved. The sequence itself does not mean anything without this metadata.

**Jane Anderson** *is an Associate Professor of Anthropology and Museum Studies at New York University, Lenapehoking. Co-founder of Local Contexts which supports indigenous people with the management of IP and digital data, co founded the biocultural label initiative*

Anderson presented her work on Local Contexts in collaboration with Maui Hudson. The Initiative is an intervention that focuses on the value of contextual metadata, particularly within the DSI context. Local Contexts developed so-called biocultural labels. Those are supposed to help to recognize the inherent sovereignty that indigenous people have over their knowledge and data that comes from their territories.
Anderson explained that the labels are responding to 3 key issues:

1. How to recognize indigenous tribes and interesting raw data on DSI within an open data environment?
2. How to share DSI and how to collaborate around ethical access and use?
3. How to negotiate equitable outcomes from the use of DSI?

Afterwards, Anderson presented six labels they developed together (referenced on https://localcontexts.org/).
Anderson emphasized that databases currently have very limited capacity for enhanced metadata but technically it is relatively easy to implement it. She deepened that the value of data is in the capacity to compare and contrast, and contextual metadata is one more characteristic that helps to make that difference. Labels are supposed to make TK visible and thus make the data more valuable. The developed labels show where the data comes from and where the data goes to and at the end, facilitates the distribution of benefits in multiple directions.

**Jennifer Tauli Corpuz** *from the Kankana-ey Igorot People of Mountain Province in the Philippines, policy adviser of Tebtebba – Indigenous Peoples' International Center for Policy Research and Education*

Corpuz presented the position of the International Indigenous Forum on Biodiversity (IIFP). She strongly advocated that DSI should be covered within the NP and criticized that many people were not included in the discussion. As NP recognizes IPLCs rights and their associated TK over GR, the following rights models should be integrated into the discussions around DSI.

1. **Moral rights model:** the recognition that indigenous people develop the knowledge based on the close relationship that indigenous people have with their resources.
2. **The economic rights model:** indigenous people have the right to benefit from the use of GR as well as from the information attached.
3. **PIC – exclusive rights model, the right to consent**. In the opinion of many scientists, it is unworkable when they need consent each time they use DSI that can be traced back to indigenous people. However, indigenous people have the right to consent when the link to indigenous people is indisputable. Methodologies have been developed to label sequences to associate sequences with IPLCs who own the knowledge or the resource.

Corpuz explained, that the reason why IPLCs do not want to focus only on multilateral-benefit sharing mechanisms is that it might bypass entirely the requirement for consent. Corpuz proposed that there should be a multiplicity of approaches such as revised terms and conditions attached to these open-access databases. Once there is commercial use there

should be an obligation that kicks in to share the benefits. She emphasized that IPLCs do want to participate in the policy setting and the negotiations, but also in terms of administration.

## IV Discussion

Paul Oldman opens the floor for discussion by asking the following questions: Who is genomics for? We got the impression that DSI and genomics are for scientists. Who gets the benefits from this and who gets to decide on the benefits?

**Do indigenous people determine the priorities in research?**

Christian Tiambo strongly affirmed this question, as the main objective of ILRI and CTLGH is to answer the demands coming from local communities – as they are the ones who also need the end product from their research. He mentions the example that local farmers observe that some breeding lines of their cattle are resistant to specific diseases. But they do not know how to incorporate this specific property into their other cattle breeding lines. These observations are important to scientists. Following this observation, genomic tools can be applied to identify the trade of importance. Through workshops, this result can then be given back to the local communities together with advice on how to improve the breeding program to obtain the desired properties. The specific GR is then a value for the community. Therefore, the exchange and close work with the local community are indispensable.

**Question to Maui Hudson and Jane Anderson: Where does value lie in this data? Who gets to be recognized?**

Maui explained that there can be different levels of benefits, such as benefits arising from the initial project which is taking place or through scientific projects such as the one mentioned by Christian. It has to be ensured that data is coming back. Then it can have a feedback loop for local communities.

Jennifer commented that there have been many different funds that have been established. The benefits being generated are coming from users or DSI are closely attached to the TK of indigenous people. How can we ensure that the right people receive the benefits and not NGOs? Are there enough procedures and safeguards in place?

**How do you see the scalability of initiatives who try to make the provenance of TK more transparent?**

Jane presented her work of labelling again as one possible option for more transparency. Machine-learning tools are required for this to track provenance across systems. Jane considered that it is an important question on how we track and trace the provenance that is important if we talk about where benefits have to go.

Maui indicated that the use of open collaboration and open commercialization label is about trying to ensure that the next users can connect back to the communities around the projects. It is not just to show where the data comes from. More benefit is coming out if subsequent users with other projects can also connect back to the community.